UNIVERSITY OF TECHNOLOGY SYDNEY

The Baby Friendly Health Initiative in Australia: a case study of the uptake and development of a global programme into a national setting

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Certificate of original authorship

I certify that the work in this thesis has not previously been submitted for a degree nor has it been submitted as part of requirements for a degree except as part of the collaborative doctoral degree and/or fully acknowledged within the text.

I also certify that the thesis has been written by me. Any help that I have received in my research work and the preparation of the thesis itself has been acknowledged. In addition, I certify that all information sources and literature used are indicated in the thesis.

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I've been doing all these years, or why I think breastfeeding is important, but you have finally got a "doctor" in the family.

Table of Contents

List of Tables

List of Figures

Abstract

Background: Breastfeeding has many known benefits. In 1991, the United Nations International Emergency Children's Fund launched a global health strategy to help maternity facilities create a safe environment that supported women's infant feeding decisions and practice; the Baby-friendly Hospital Initiative. In Australia, the Baby Friendly Health Initiative is governed by the Australian College of Midwives and receives 'in principle' policy support from the Commonwealth government. There are currently 70 maternity facilities (approximately 24%) registered as 'baby friendly accredited'.

Aim: To analyse the past and current policy support of breastfeeding in Australia with a specific focus on the Baby Friendly Health Initiative.

Methods: The study used an instrumental case study design by examining a 'case' to provide insight into a particular issue of interest and facilitating the understanding of 'something else'. The case was the Baby Friendly Health Initiative (BFHI) in Australia, the issue of interest was the dissemination of a global health strategy in a national setting; and the 'something else' was the ongoing and future support of breastfeeding in Australia. Data collected, reviewed and thematically analysed included: 14 participant interviews, organisational minutes and correspondence, international and national policy documents and government reports. A modified knowledge translation model provides a conceptual framework.

Findings: Triangulation of the findings revealed common themes. The conceptual model demonstrated the presence of enablers and barriers to the translation of knowledge and evidence into practice. Enablers for the uptake and development of the Baby Friendly Health Initiative in Australia are intangible, consisting of an altruistic belief in breastfeeding support as important for women, babies and the world. Barriers are tangible: widespread inadequate resourcing has constrained delivery of the Baby Friendly Health Initiative at local levels and created internal tensions. Future expansion requires authentic government engagement and tangible incentives in collaboration with key stakeholders.

Conclusion: The political decision to fragment breastfeeding policy and situate it within a nutrition framework rather than as a standalone programme with a whole of government approach has had far-reaching consequences. The future of the Baby Friendly Health Initiative in Australia is heavily reliant on political will and level of resourcing.

Publications during candidature

Peer Reviewed Papers

1. **Atchan M**., Davis, D. & Foureur, M. 2017, 'An instrumental case study examining the introduction and dissemination of the Baby Friendly Health Initiative in Australia: participants' perspectives', *Women and Birth*, http://dx.doi..org/10.1016/j.wombi.2017.08.130 in press, corrected proof
2. **Atchan M.,** Davis, D. & Foureur, M. 2016, 'An historical document analysis of the introduction of the Baby Friendly Hospital Initiative into the Australian setting.' *Women and Birth,* vol. 30, pp. 51-62. http://dx.doi.org/10.1016/j.wombi.2016.07.004
3. **Atchan M.,** Davis, D. & Foureur, M. 2016, 'A methodological review of qualitative case study methodology in midwifery research.' *Journal of Advanced Nursing* 72, vol.10, pp. 2259-2271. doi: 10.1111/jan.12946
4. **Atchan M**., Davis, D. & Foureur, M. 2014, 'Applying a knowledge translation model to the uptake of the Baby Friendly Health Initiative in the Australian health care system.' *Women and Birth*, vol. 27, pp. 79-85. http://dx.doi.org/10.1016/j.wombi.2014.03.001
5. **Atchan M.,** Davis, D. & Foureur, M. 2013, 'The impact of the Baby Friendly Health Initiative in the Australian health care system: a critical narrative review of the evidence.' *Breastfeeding Review,* vol. 21, no. 2, pp.15-22.
6. **Atchan M.,** Foureur, M. & Davis, D. 2011, 'The decision not to initiate breastfeeding – women's reasons, attitudes and influencing factors – a review of the literature.' *Breastfeeding Review,* vol. 19, no. 2, pp. 9-17.

Conference/Poster Presentations

1. **Atchan M.,** Davis, D. & Foureur, M. 2017, 'Exploring the barriers to the uptake and development of the Baby Friendly Health Initiative (BFHI) in Australia from its beginnings in 1992.' International Confederation of Midwives (ICM) 31st Triennial Congress *"Midwives - Making a Difference"* 18-22 June 2017 Toronto, Canada
2. Perriman, N., **Atchan, M.,** Duursma, L. & Thoms, D. 2016, 'The *Baby Friendly Health Initiative Australia*: Building a supportive and sustainable process one step at a time.' Baby-friendly Hospital Initiative 3.0 Congress 24-26 October 2016 World Health Organization, Headquarters Geneva, Switzerland
3. **Atchan M.,** Davis, D. & Foureur, M. 2016, 'Is the Baby Friendly Health Initiative (BFHI) essential to the support of breastfeeding in Australia?' Lactation Consultants of Australia and New Zealand (LCANZ) *"Essential Breastfeeding"* National Conference 7-8 October 2016, Melbourne, Victoria
4. **Atchan M**., Davis, D. & Foureur, M. 2015, 'Trying to Translate Research into Practice: the Baby Friendly Health Initiative in Australia – twenty years on.' *"Super Midwives: Making a Difference"* Australian College of Midwives 19th Biennial Conference 5-8 October 2015 Gold Coast Queensland
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6. **Atchan, M.,** Davis, D. & Foureur, M. 2014, 'The Baby Friendly Health Initiative Australia: early influences on uptake and development.' The Australian Breastfeeding

Association *"Liquid Gold, the 50th Anniversary Conference*" 1-3 August 2014. Melbourne, Victoria

7. **Atchan, M.,** Davis, D. & Foureur, M. 2014, 'The early days of the Baby Friendly Health Initiative (BFHI) in Australia.' Lactation Consultants of Australia and New Zealand (LCANZ) ACT Annual seminar 24 June 2014. Canberra, ACT
8. **Atchan, M.,** Davis, D. & Foureur, M. 2013, 'The Baby Friendly Health Initiative in Australia: Desirable strategy or lame duck?' (Poster) The Australian College of Midwives 18th Biennial Conference *"Life, Art & Science in Midwifery"* 30 September-3 October 2013. Hobart, Tasmania
9. **Atchan, M.,** Davis, D. & Foureur, M. 2012, 'The translation of breastfeeding knowledge into breastfeeding practice: understanding the choices that women make.' The Australian College of Midwives 4th Biennial Conference *"Breathing New Life into Maternity Care. Working Together: Balancing the Risk in Maternity Care"* 24-26 May 2012. Melbourne, Victoria

Publications included in this thesis

This thesis consists of six papers, incorporated as Chapters Two, Three, Four, Five, Seven and Eight. These papers have been published during my PhD candidature. Publication details for each chapter are outlined below, together with a statement of contribution and percentage contribution for each author.

Incorporated as Chapter Two: Literature review

Atchan, M., Davis, D. & Foureur, M. 2011, 'The decision not to initiate breastfeeding - women's reasons, attitudes and influencing factors - a review of the literature.' *Breastfeeding Review,* vol. 19, no. 2, pp. 9-17.

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Concept and design Writing of initial manuscript Manuscript revisions through provision of detailed commentary	MA 60% DD 10% MF 30%

Incorporated as Chapter Three: Literature review

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Incorporated as Chapter Four: Theoretical framework

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Statement of contribution	Percentage of contribution
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Abbreviations used in this thesis

ABS	Australian Bureau of Statistics
ACM	Australian College of Midwives
ACT	Australian Capital Territory
AIHW	Australian Institute of Health and Welfare
BFHI[1]	Baby Friendly Health Initiative
BFHIAC	Baby Friendly Health Initiative Advisory Committee
BFHI[2]	Baby-friendly Hospital Initiative
CFHS	Child and Family Health Service
CALD	Culturally and Linguistically Diverse
CEO	Chief Executive Officer
COREQ	Consolidated Criteria for Reporting Qualitative Research
CSR	Case Study Research
CIAP	Clinical Information Access Portal
FHC	Family Health Centre
IBFAN	International Baby Food Action Network
LHD	Local Health District
MAIF	Marketing in Australia of Infant Formulas
MF	Infant/child milk-based formula
NCG	National Consultative Group
NGO	Non-Government Organisation
NHMRC	National Health and Medical Research Council
NSQHS	National Safety and Quality Health Service Standards
NSG	National Steering Group
NSW	New South Wales
PROBIT	Promotion of Breastfeeding Intervention Trial
QLD	Queensland
RACOG	Royal Australian College of Obstetricians and Gynaecologists
RCT	Randomised Controlled Trial
SA	South Australia
SRQR	Standards for Reporting Qualitative Research
TAS	Tasmania
UN	United Nations
UNICEF	United Nations International Children's Emergency Fund

VIC	Victoria
WABA	World Alliance of Breastfeeding Action
WHA	World Health Assembly
WHO	World Health Organization
WIC	Women, Infants and Children

1 Introduction

This thesis by publication presents a detailed examination and analysis of historical and contemporary influences that acted as enablers and barriers to the introduction, implementation and development of a global breastfeeding strategy and its embedded accreditation programme into a national setting.

This chapter provides background to the research undertaken for this thesis. The overall aims, objectives and methodology are outlined followed by a description of the structure of the thesis.

1.1 Defining the global health strategy in support of breastfeeding

The Baby-friendly Hospital Initiative was the World Health Organization (WHO) and the United Nations International Children's Emergency Fund's (UNICEF) direct response to calls from other international aid agencies to publicly support breastfeeding. The response was the design and implementation of a global health strategy for maternity facilities. The *Ten Steps to Successful Breastfeeding,* is described in Figure 1. The *"Ten Steps"* is the underpinning framework first published in 1989 and represents a set of minimum quality standards for maternity facilities to implement. The Baby-friendly Hospital Initiative is designed to encourage the translation of knowledge and evidence, through the development of policies and practices within the hospital system to optimally support women and their families. The aims of the Baby-friendly Hospital Initiative are to increase exclusive breastfeeding from birth and create a breastfeeding culture that enables women to make informed infant feeding decisions. Each *"Step"* addresses a clinical or organisational practice. The steps can be introduced and implemented as a whole project or individually using a staged approach.

The Ten Steps to Successful Breastfeeding

1. Have a written breastfeeding policy that is routinely communicated to all health care staff.
2. Train all health care staff in the skills necessary to implement this policy.
3. Inform all pregnant women about the benefits and management of breastfeeding.
4. Help mothers initiate breastfeeding within a half-hour of birth.
5. Show mothers how to breastfeed and how to initiate lactation if they are separated from their infants.
6. Give newborn infants no food or drink unless medically indicated.
7. Practice rooming-in and allow mothers and infants to stay together 24 hours a day.
8. Encourage breastfeeding on demand.
9. Give no artificial teats or pacifiers (also called dummies or soothers) to breastfeeding infants.
10. Foster the establishment of breastfeeding support groups and refer mothers on to them on discharge from the hospital or clinic.

FIGURE 1: THE TEN STEPS TO SUCCESSFUL BREASTFEEDING
Source: (World Health Organization and the United Nations Children's Fund 1989)

An accreditation programme was embedded into the Baby-friendly Hospital Initiative framework, as a natural end point to the implementation process. Successful accreditation constitutes formal global recognition of a maternity facility's level of commitment in achieving excellence in breastfeeding support (World Health Organization 1991). Successful accreditation also signifies that the maternity facility now 'belongs' to a global community, one which values the integral role of breastfeeding in optimising women and children's health. The desirability and value attached to global recognition is a further incentive for hospitals considering or already in the process of BFHI implementation.

While the strategy is known internationally as the Baby-friendly Hospital Initiative, or BFHI, country variation exists in name and content (World Health Organization 2017). There is also variation between countries around the accreditation process. Australia, for example, has renamed the strategy the Baby Friendly Health Initiative. Accreditation lasts three years and the maternity facility is invited by the national authority, the Australian College of Midwives (ACM), to reapply.

1.2 My Journey to This Point

For most of my professional life I have been a clinical midwife. My personal philosophy is that it is my professional responsibility to promote and model best practice in midwifery. My professional practice, attending conferences and reading widely and deeply about infant feeding related issues informs this philosophy.

I am a midwife academic, International Board-Certified Lactation Consultant and chairperson of the Australian Baby Friendly Health Initiative Advisory Committee (BFHIAC). The BFHIAC provides advice to the Chief Executive Officer and Board of the Australian College of Midwives (ACM) on all matters relating to breastfeeding, infant feeding and the BFHI. I started my Doctoral studies by examining women's infant feeding decisions. My findings from a review of the literature revealed the influences on decision-making and practice existed at multiple levels (Atchan, Foureur & Davis 2011). What was interesting was what the published literature was not telling me. The global public health strategy designed to support breastfeeding, the Baby-friendly Hospital Initiative, did not feature. What the literature did reveal was a general lack of supportive knowledge on the part of health professionals. I decided to pursue this line of enquiry further. The gap in the literature led me to question the impact of the strategy at a global and national level, particularly within the Australian context.

As I read and reflected further on the issues that emerged my faith in the BFHI as a means of effecting change was challenged by the findings of the Australian research that had already been attended. My research focus consequently shifted to become an examination of the reasons why the BFHI has not become an integral part of the Australian health system landscape. I wanted to understand how a global health programme becomes embedded and embraced at a national level. The question that has guided my study is "What are the factors that have influenced the development and uptake of the Baby Friendly Health Initiative since its introduction to Australia in 1992"? The next section presents background information to provide a rationale for the BFHI's existence and importance.

1.3 Background

1.3.1 Establishing the importance of breast milk/breastfeeding

Breastfeeding and breast milk have well documented benefits at all levels of society (Victora et al. 2016). Some of the many benefits of breastfeeding include a statistically significant risk reduction in infant respiratory tract infections, gastrointestinal illnesses, diabetes, obesity and cardiovascular disease (Ip et al. 2007). Maternal benefits include a risk reduction in premenopausal breast cancer, ovarian cancer and osteoporosis (Kramer 2010). Community benefits include decreased health care costs, increased workplace productivity due to decreased parental absenteeism and a positive impact on family income and lifestyle (Australian Health Ministers Conference 2009). There is a reduction to the environmental burden due to the decrease in production of artificial breast milk substitutes and feeding equipment as well as its subsequent need for disposal (American Academy of Pediatrics 2012). International and Australian national guidelines have

identified breastfeeding as a valuable contribution to society's health and made recommendations for practice (National Health and Medical Research Council 2012; World Health Organization 2003). The Australian recommendations are for exclusive breastfeeding to six months, the introduction of appropriate, complementary foods, and continued breastfeeding till 12 months or beyond, or as long as both mother and baby wish (National Health and Medical Research Council 2012).

Not breastfeeding and/or early weaning has been shown to result in increased risks of adverse health outcomes, not only in infancy and childhood but also throughout the life continuum (Smith & Harvey 2011). The ripple effect is also seen through the financial burden on the health care system (Renfrew et al. 2012) and attitudes to breastfeeding in society (Australian Institute of Health and Welfare 2011). Studies have identified the proportional risk of breast milk substitutes (also known as infant formula, artificial baby milk, infant and young child formula milk or baby milk formula) and preventable illnesses (Bartick & Reinhold 2010), including a greater risk of hospitalisation for infectious causes (Black, Morris & Bryce 2003; Hengerstermann et al. 2010; Quigley, Kelly & Sacker 2007; Talayero et al. 2006) and an increased prevalence of chronic disease (Smith & Harvey 2011). The most recent study of paediatric health outcomes and costs indicates that for every 597 American women who optimally breastfeed, one maternal or child death is prevented (Bartick et al. 2017). The costs of sub-optimal breastfeeding in the United States in 2014 were estimated at US$3.0 billion for total medical costs, $1.3 billion for non-medical costs and $14.2 billion for premature death costs.

Women may decide to: (a) not initiate breastfeeding; (b) breastfeed and introduce a formula milk or (c) discontinue breastfeeding altogether, for a variety of reasons that may not be readily apparent even to themselves (Atchan, Foureur & Davis 2011). The value of a supportive environment for breastfeeding is crucial to women being enabled to achieve their feeding goals (Victora et al. 2016). It is worth reviewing the historical antecedents of breastfeeding practice and support to help with understanding current practices.

Not breastfeeding is not a new phenomenon; in fact the search for a viable alternative to breastfeeding/breast milk has taken place since recorded history (Stevens, Patrick & Pickler 2009). More recently, in the nineteenth century, advances in technology resulted in the discovery of methods that would produce a sustainable product and feeding utensils. Consequently, in the twentieth century, powdered infant formula milks were heavily marketed worldwide as a convenience food that provided a 'superior nutrition' to breast milk. Formula milks were touted as a means to free women from the 'shackles' of domesticity and enable them to enter or re-enter the workforce (Thorley 2003, 2012).

Unethical product promotion activities flourished within the moral vacuum that occurred due to the lack of regulation. Globally, but particularly in low-income nations, infant morbidity and mortality rose synchronously with formula milk sales while the rates of breastfeeding plummeted (Minchin 1998).

Women and midwives lost breastfeeding knowledge and skills. Australian women felt let down by the health system with many unable to achieve their breastfeeding goals (Sheehan, Schmeid & Cooke 2003). Successive Australian national surveys have also identified that infant and young child formula milk feeding became the norm in many sectors of society, particularly in younger women with lower education and socio-economic circumstances (Amir & Donath 2008). Australian public opinion now views infant formula milks as a comparable product to breast milk (Australian Institute of Health and Welfare 2011). Breastfeeding has become a highly emotive subject. Women's opinions about breastfeeding and stories of their support vary widely (Schmied et al. 2011; Sheehan, Schmeid & Cooke 2003). Multiple generations of women have had distressing experiences, with residual guilt and acute sensitivity about the subject, an outcome of unmet needs.

1.3.2 An international response

The presence of free and/or highly subsidised infant formula in the hospital environment was seen as a major barrier to the promotion of exclusive breastfeeding (Minchin 1998). International aid agencies responded to the growing crisis through several international Declarations that introduced the health promotion concept of the right of women to breastfeed and the right of babies to be breastfed. A critical Declaration to increase all government's awareness of and engagement in the importance of breastfeeding is the *Innocenti Declaration on the Protection, Promotion and Support of Breastfeeding* (United Nations International Children's Emergency Fund 1990). The *Innocenti Declaration* contains core targets to increase the potential for a supportive environment for breastfeeding, including: creating a dedicated national stakeholder group and coordinator, implementing legislative protection for the rights of breastfeeding women who return to work, adopting the WHO *International Code for the Marketing of Breast-milk Substitutes (WHO Code)*and fully implementing the *Ten Steps to Successful Breastfeeding*. A further international response is the *Global Strategy for Infant and Young Child Feeding* (World Health Organization 2003). This strategy's specific objectives include raising awareness of the main problems affecting infant and young child feeding. It provides a framework of essential interventions aiming to revitalise and increase the commitment of governments, international organisations and other concerned parties, ensuring appropriate infant and young child nutrition. Creating an enabling environment is expected to facilitate informed

decision-making about optimal feeding practices (Akre 2009). Full implementation of the global health policies represents significant investment in changing awareness, attitudes and behaviour, resulting in a transformed society where breastfeeding is the norm and all children are appropriately nurtured and nourished.

1.3.3 The Australian context

The Baby-friendly Hospital Initiative was launched in Australia in 1992 under the governance of UNICEF Australia. The initial impetus was from UNICEF International (hereafter known as Head Office) combined with some support from local breastfeeding advocates. The programme experienced a number of challenges with implementation and did not gain early momentum. UNICEF Australia transferred governance of the BFHI to the ACM in 1995 where it continued to struggle for financial and professional viability for many years.

1.3.3.1 Maternity services

In Australia, a disconnect exists with regards to the comprehensive support of breastfeeding. Pregnancy is a period during which a woman may be amenable to hearing positive messages and willing to adopt healthy lifestyle behaviours and practices such as breastfeeding. However, at an organisational level there appears to be a lack of evidence and knowledge transferring into practice. The BFHI's uptake has been less than expected by breastfeeding advocates although a positive association between breastfeeding prevalence and the BFHI is apparent (Atchan, Davis & Foureur 2013). The BFHI has been identified as a desirable strategy in national policy (National Health and Medical Research Council 2012) and a number of state policies, such as New South Wales (New South Wales Department of Health 2011), Queensland (Queensland Health 2016) and Victoria (State Government of Victoria 2014). However, only 70 (24%) of Australian public and private hospitals from a potential 296 are currently accredited as 'baby friendly' (Baby Friendly Health Initiative 2017).

Table 1 reveals the state-to-state variation in BFHI accreditation in maternity facilities. The denominator, or number of maternity facilities in Australia is a combination of data from the Australian Institute of Health and Welfare public and private hospital statistics. Percentages and raw numbers are included in the numerators. Significant variance exists. For instance, Tasmania has six maternity facilities in total, with 100% accreditation of all facilities in the state. In contrast, New South Wales has 88 facilities in total, of which 10 are accredited resulting in only an 11% accreditation rate for the entire state.

TABLE 1: STATE AND TERRITORY VARIATION OF ACCREDITED BFHI PUBLIC AND PRIVATE MATERNITY FACILITIES

State/Territory	Maternity facilities (total)[1, 2]	Accredited maternity facilities[3]	Percentage[4]
Tasmania	6	6	100
Northern Territory	5	4	80
Australian Capital Territory	3	2	66
South Australia	30	14	46
Queensland	57	20	35
Victoria	70	9	13
New South Wales	88	10	11
Western Australia	36	4	11
Total	**296**	**70**	**24**

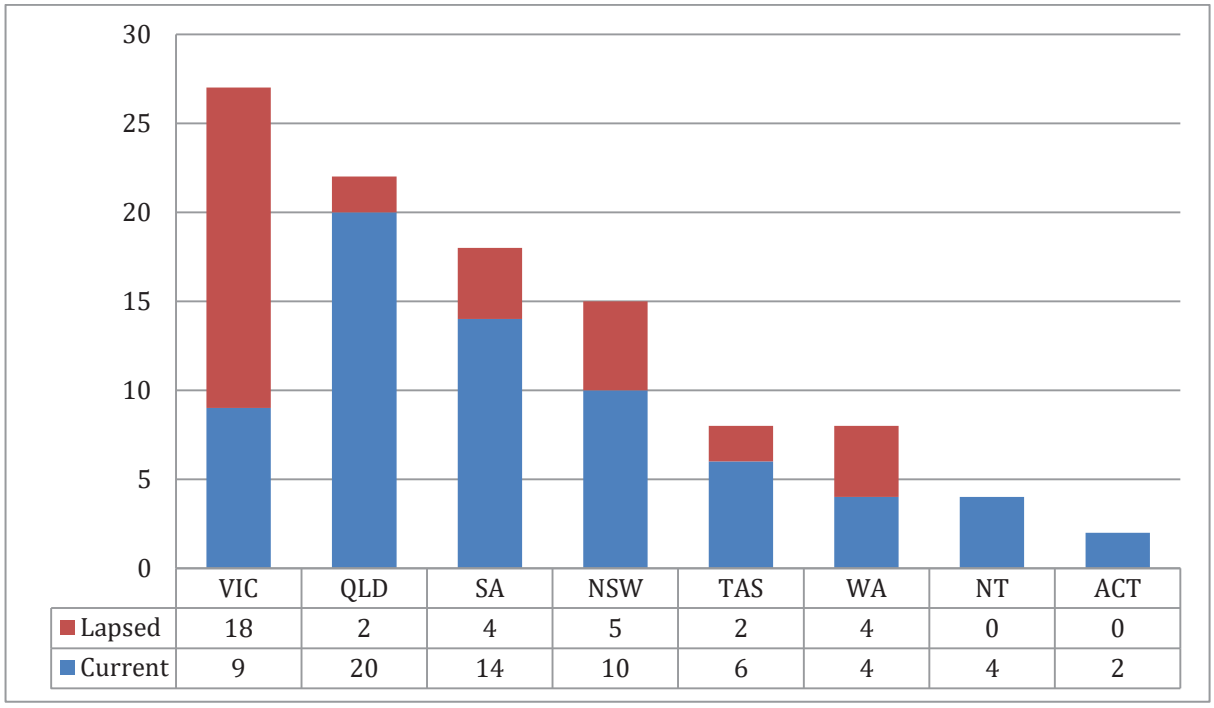
Sources:

1. AIHW, *Hospital resources 2014-15: Australian hospital statistics,* Chapter 3 at http://www.aihw.gov.au/publication-detail/?id=60129556122
2. AIHW, *Australian hospital statistics 2012-2013: private hospitals,* Table 2.3 at http://www.aihw.gov.au/WorkArea/DownloadAsset.aspx?id=60129548953
3. Baby Friendly Health Initiative (BFHI) Accredited Facilities at https://www.midwives.org.au/baby-friendly-health-initiative-bfhi (Accessed 5th September 2017)

Legend:

4. Percentages rounded up or down

Figure 2 provides further detail, identifying state to state variation in the number of facilities that have been ever accredited and those currently accredited as 'baby-friendly' since 1994 (when the first hospital was accredited). Queensland would appear to have the lowest number of 'lapsed' facilities. The figures are confusing however as Tasmania appears to have two 'lapsed' facilities. These facilities and services have been absorbed into larger health services, so Tasmania remains 100% accredited. In total, 105 Australian maternity facilities have 'ever' been accredited (approximately 35%).



	VIC	QLD	SA	NSW	TAS	WA	NT	ACT
Lapsed	18	2	4	5	2	4	0	0
Current	9	20	14	10	6	4	4	2

FIGURE 2: CURRENT VERSUS EVER ACCREDITED BFHI PUBLIC AND PRIVATE MATERNITY FACILITIES.
Source: Australian College of Midwives BFHI Manager, 16.10.2017

Drilling down even further, Figure 3 provides a graphical visual representation of the reaccreditation pattern of currently accredited maternity facilities from 1994 to 2016. The graph reveals that although reaccreditation outweighs initial accreditation, the BFHI's sustainability is observable, albeit on a small scale. By way of example, the Royal Women's in Melbourne, Victoria was initially accredited in 1994 (Atchan, Davis & Foureur 2016), it has recently undergone its seventh successful assessment (Baby Friendly Health Initiative 2017). The BFHI would appear to be deeply embedded in the system and an integral part of this hospital's 'fabric'.

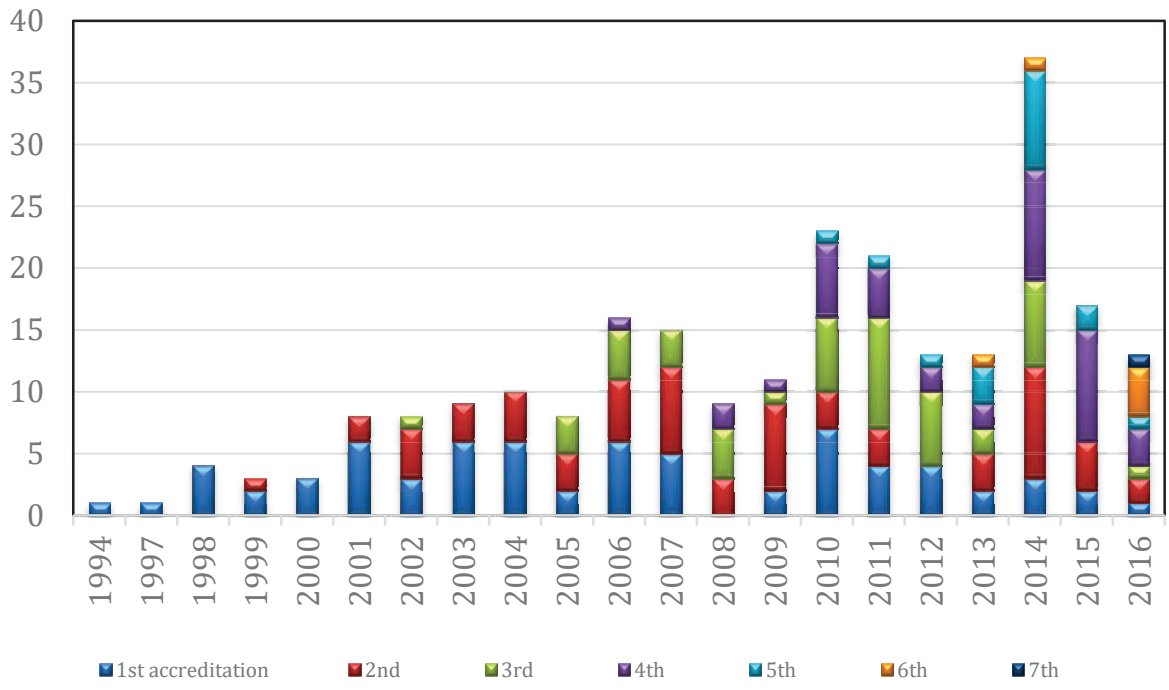


FIGURE 3: CURRENTLY ACCREDITED PUBLIC AND PRIVATE FACILITIES, ACCREDITATION BY YEAR 1994 TO 2016 AND NUMBER OF TIMES ACCREDITED
Source: produced by the Australian College of Midwives BFHI Manager 09.06. 2017

1.3.3.2 Community services

The ACM changed 'hospital' to 'health' in 2006 to demonstrate the importance of community services in the BFHI strategy. The ACM then expanded the BFHI into the community setting. Figure 4 outlines the *7 Point Plan for the Protection, Promotion and Support of Breastfeeding in Community Health Services* released in 2008 (Baby Friendly Health Initiative Australia 2016). It combines organisational and clinical standards. Similar to maternity services the community plan can be implemented in a staged approach, accreditation is via an assessment team appointed by the BFHI National Manager and lasts for three years.

There is significant state-to-state variation in infrastructure and terminology across the States and Territories. There are currently two BFHI Community accredited services. The child and family health services (CFHS) of the entire state of South Australia are BFHI community accredited, comprising 113 services embedded within one state-wide 'umbrella organisation'. In New South Wales there are 15 Local Health Districts (LHD), each with a varying number of Family Health Centres (FHC). St George and Sutherland FHC comprises 16 of the 28 FHC in South East LHD. St George and Sutherland FHC is the only BFHI community health service accredited in the state. This study acknowledges that the uptake of the *"7 Point"* community services programme may be influenced by similar issues to those found in the *Ten Steps to Successful Breastfeeding* in Australian maternity

services. This research is focused however solely on an examination of the influences pertaining to the dissemination of the BFHI within maternity services.

The 7 Point Plan for the Protection, Promotion and Support of Breastfeeding in Community Health Services

Point 1: Have a written breastfeeding policy that is routinely communicated to all staff and volunteers.

Point 2: Educate all staff in the knowledge and skills necessary to implement the breastfeeding policy.

Point 3: Inform women and their families about breastfeeding being the biologically normal way to feed a baby, and about the risks associated with not breastfeeding

Point 4: Support mothers to establish and maintain exclusive breastfeeding for six months.

Point 5: Encourage sustained breastfeeding beyond six months with appropriate introduction of

complementary foods.

Point 6: Provide a supportive atmosphere for breastfeeding families, and for all users of the child health service.

Point 7: Promote collaboration between staff and volunteers, breastfeeding support groups and the local community in order to protect, promote and support breastfeeding.

FIGURE 4: THE 7 POINT PLAN FOR THE PROTECTION, PROMOTION AND SUPPORT OF BREASTFEEDING IN COMMUNITY HEALTH SERVICES
Source: Baby Friendly Health Initiative (2016)

There is a growing body of research on the support of breastfeeding and the BFHI in Australia. Research has centred on attitudinal and systems-level issues. The number of BFHI supportive practices as described in Figure 1 being implemented by individual hospitals has not been investigated and facilities' reasons for choosing accreditation over implementation is unknown. An evidence-practice gap has been identified by previous researchers, with barriers including a lack of policy support (Walsh et al. 2011) and funding and a misunderstanding of the BFHI's aims and outcomes (Schmeid et al. 2011). The exact cause for this situation is unknown. What is known is that the BFHI in Australia did not realise significant momentum in its early implementation phase. To date no research has examined the historical reasons for the lack of early traction or attempted to examine the various parts that make up the whole story of the BFHI's dissemination in Australia. The following section will describe my programme of research.

1.4 Thesis structure

1.4.1 Aims, objectives and research questions

The aim of this thesis is to analyse the past and current policy support of breastfeeding in Australia, with a specific focus on the Baby Friendly Health Initiative (BFHI). To achieve this aim three broad objectives were formulated:

1. Examine women's decision-making around their infant-feeding practices.
2. Examine the relationship between a global public health strategy and breastfeeding practice.
3. Determine elements key to the policy support of breastfeeding in the Australian national setting.

The aim and objectives led to the development of two research questions, as follows:

1. How has the implementation and dissemination of a global health programme, the Baby-friendly Hospital Initiative into the Australian setting been achieved?
    a. What enabling factors and barriers have influenced its dissemination?
2. How do enabling factors and barriers influence any demonstration of the Baby Friendly Health Initiative's (BFHI) relevance and currency in the current Australian socio-political setting?

Table 2 demonstrates the linkage between the publications to each of the chapters, research objectives and research questions in this study. The thesis follows a process of inquiry to achieve its aim and objectives: reviewing the published evidence, describing the methods of inquiry and analysis of the findings which revealed the existence of a policy-practice gap. The study used an instrumental case study design by examining a 'case' to provide insight into a particular issue of interest and facilitating the understanding of 'something else'. In this study, the 'case' is the BFHI in Australia, the issue of interest is the dissemination of a global health strategy in a national setting and the 'something else' is the ongoing and future support of breastfeeding in Australia. Purposive sampling techniques accessed relevant participants, public data and archival private and personal documents to reveal information about enablers and barriers that exerted an influence on the BFHI in Australia.

TABLE 2: THESIS STRUCTURE AND LINK OF PUBLICATIONS TO CHAPTERS, RESEARCH OBJECTIVES AND RESEARCH QUESTIONS

Process of inquiry	Chapter	Research Objective	Research Questions
	Chapter 1: *Introduction*		
Reviewing the evidence	**Chapter 2**: *Examining the infant-feeding decision* Paper #1: The decision not to initiate breastfeeding - women's reasons, attitudes and influencing factors - a review of the literature.	1	
	Chapter 3: *Examining a global strategy designed to support breastfeeding* Paper #2: The impact of the Baby Friendly Health Initiative in the Australian health care system: a critical narrative review of the evidence.	2	
Methods of inquiry	**Chapter 4**: T*heoretical Underpinnings* Paper #3: Applying a knowledge translation model to the uptake of the Baby Friendly Health Initiative in the Australian health care system.		
	Chapter 5: *The Methodological Approach* Paper #4: A methodological review of qualitative case study methodology in midwifery research.		
	Chapter 6: *Study Design and Methods*		
Analysis of the findings policy-practice gap	**Chapter 7**: *Presenting the Findings (1)* Paper #5: An historical document analysis of the introduction of the Baby Friendly Hospital Initiative into the Australian setting.	3	1
	Chapter 8: *Presenting the Findings (2)* Paper #6: An instrumental case study examining the introduction and dissemination of the Baby Friendly Health Initiative in Australia: Participants' perspectives.	3	1, 2
	Chapter 9: *Summary, Discussion and Recommendations*		

1.4.2 Structural framework

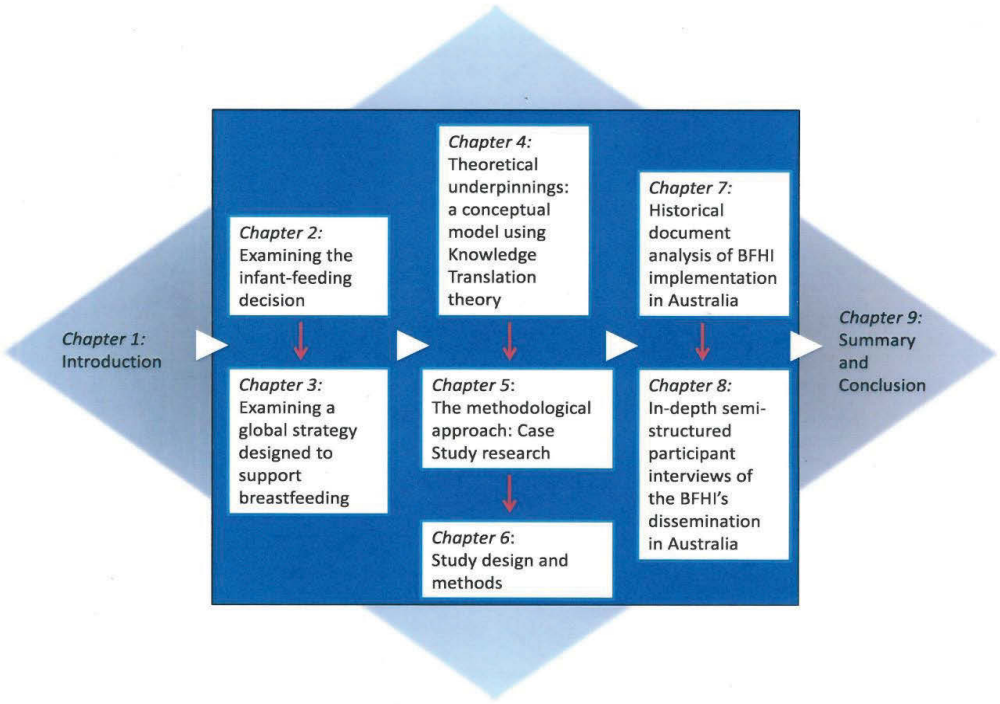


FIGURE 5: A VISUAL REPRESENTATION OF HOW THE DISCRETE CHAPTERS CONTRIBUTE TO THE THESIS AS A WHOLE

This is a thesis by publication. Figure 5 is a visual representation of the research 'journey.' It is read in conjunction with Table 2 and illustrates how the published papers in the study are interconnected with the research objectives and research questions. Narrative reviews of two bodies of evidence; exploring women's decision-making in relation to breastfeeding and the BFHI as a supportive health strategy are presented in Papers One and Two (Chapter 2 and Chapter 3). These reviews revealed gaps in knowledge on the part of women who decide not to breastfeed and on the part of governing bodies responsible for the health of infants and children who failed to understand the importance of the BFHI. The methods of inquiry used to investigate the identified gaps in knowledge that informed the research questions are described in Papers Three and Four (Chapter 4 and Chapter 5). The outcomes of this examination, the policy-practice gap, are presented in Papers Five and Six (Chapter Seven and Chapter Eight).

1.4.3 Chapter structure

This thesis comprises six publications, presented either whole as or part of Chapters Two, Three, Four, Five, Seven and Eight. Written permission has been obtained to include the papers, they form part of the Appendices. A bibliography listing all references is provided at the end of the thesis.

In Chapter Two, *Examining the infant-feeding decision,* a narrative review of the literature on women's decision-making around breastfeeding is presented, published as:

- Atchan M., Davis, D. & Foureur M. 2011, 'The decision not to initiate breastfeeding - women's reasons, attitudes and influencing factors - a review of the literature.' *Breastfeeding Review,* vol. 19, no. 2, pp. 9-17.

Primary research was identified, synthesised and analysed on the reasons, attitudes and influencing factors on women's decision-making processes about whether or not to breastfeed. The main findings highlighted that the reasons women give for not breastfeeding are varied and complex. Partners and societal commentary factor significantly in decision-making and actual practices. Health professionals do not feature in the decision process however they are influential in the provision of timely, appropriate and accurate support, or lack thereof. Despite the importance of health professional support, the contribution and impact of the Baby-friendly Hospital Initiative, a primary health promotion message and framework, was conspicuous by its absence.

The outcomes of the first literature review provided an opportunity to focus the study's aims on the factors enabling and inhibiting the implementation and dissemination of a global health strategy into a national setting. Conducting a second literature review provided an opportunity to situate the revised proposed research study. Chapter Three: *Examining a global strategy designed to support breastfeeding* comprised a critical narrative review of the evidence underpinning the Baby-friendly Hospital Initiative internationally and in the Australian context. The critical narrative review was published as:

- Atchan, M., Davis, D. & Foureur, M. 2013, 'The impact of the Baby Friendly Health Initiative in the Australian health care system: a critical narrative review of the evidence.' *Breastfeeding Review,* vol. 21, no. 2, pp. 15-22.

The literature review revealed that an ongoing positive relationship exists between the Baby-friendly Hospital Inititiative, changes in practice and breastfeeding incidence rates. Individual, group and societal factors, plus other potentially complementary government and non-government programs have all exerted an influence on the development and

uptake of the BFHI. Although sparse in number, Australian studies reflected the international findings.

Chapter Four: *Theoretical underpinnings* presents the details of the theoretical framework used in this study published as:

- Atchan, M., Davis, D. & Foureur, M. 2014, 'Applying a knowledge translation model to the uptake of the Baby Friendly Health Initiative in the Australian health care system.' *Women and Birth,* vol. 27, pp. 79-85. http://dx.doi.org/10.1016/j.wombi.2014.03.001

A theoretical framework is an essential inclusion as it provides a particular perspective or lens that is useful to examine a topic. A theoretical underpinning linked the study's separate elements by maintaining focus and directing analysis (discussed in later chapters). Knowledge Translation Theory (Glasziou & Haynes 2005) was identified as useful and discussed in detail. A model was subsequently developed to examine where and how barriers occur, resulting in a gap between evidence and practice in the uptake of the BFHI in Australia. A lack of awareness, understanding, acceptance and perception of applicability of the BFHI and support of breastfeeding was demonstrated at all levels of the health system. Recommendations to facilitate knowledge transfer and supportive practices were included.

An interpretative methodology was considered appropriate due to its focus on the what, how and why of human behaviour. A gap was identified during the consideration of different approaches to use, namely literature was lacking on case study research in the midwifery context. Chapter Five: *The methodological approach* explores the published literature to identify the usefulness of the case study research method to midwifery research and is published as:

- Atchan M., Davis, D. & Foureur, M. 2016, 'A methodological review of qualitative case study methodology in midwifery research.' *Journal of Advanced Nursing,* vol. 72, no. 10, pp. 2259-2271. doi: 10.1111/jan12946

Case Study Research is able to meaningfully 'privilege' participants' voices through its use of a wide range of complementary data collection methods however it is not widely used by midwifery researchers. The methodological review of the current literature used a specific framework (Whittemore & Knafl 2005). Four questions were used to analyse the application, strengths and limitations of case study methods found in the published midwifery literature. The findings revealed that case study research investigated a broad array of issues and research questions demonstrating its versatility. The case study

research approach was identified as applicable to midwifery research in general and in this thesis in particular, due to the nature of the research questions.

Chapter Six: *Study designs and methods* provides the detail of 'how' the study was conducted. Case study research as a study design is discussed. The sources of data, sampling strategy, inclusion criteria, data collection and analysis are provided in detail. Ethical considerations, rigour and researcher reflexivity are also discussed in detail in this section.

The reporting and detailed description of analysis used takes the reader on a journey that reveals the emerging story. Case study research uses complementary data collection processes. Data collection included analysis of relevant documents produced and in use at the time of the initial implementation of the BFHI into Australia. The second form of data comprised of the analysis of 14 participants' experiences with the BFHI in Australia at one or more time points since its implementation. Employing the strategy of triangulation increased methodological rigour and provided greater confidence in the answers to the research questions.

Chapter Seven: *Presenting the Findings (1)* is the first of two chapters describing the findings of the case study. This chapter presents a focused historical document analysis to provide insight into individual and collective social practices that were otherwise unobservable:

- Atchan, M., Davis, D. & Foureur, M. 2016, 'An historical document analysis of the introduction of the Baby Friendly Hospital Initiative into the Australian setting.' *Women and Birth,* vol. 30, pp. 51-62. http://dx.doi.org/10.1016/j.wombi.2016.07.004

Analysis used a “documents as commentary” approach (Miller & Alvarado 2005). The early implementation period and influencing factors were clearly mapped. Findings that influenced the degree of early traction included a lack of clear leadership; there was no tangible support for the BFHI at a national level. Findings also revealed ambivalence on the part of a number of key stakeholders as well as resource limitations at multiple levels.

The experiences of participants associated with the BFHI at some point since its introduction to Australia were examined to further develop the story found in the historical data analysis. The results of this examination are found in Chapter Eight: *Presenting the Findings (2)* and published as:

- Atchan M., Davis, D. & Foureur, M. 2016, 'An instrumental case study examining the introduction and dissemination of the Baby Friendly Health Initiative in Australia:

Participants' perspectives.' *Women and Birth,* http://dx.doi.org/10.1016/j.wombi.2017.08.130 in press, corrected proof

Thematic analysis (Braun & Clarke 2006) was used for analysis of the data. NVivo software was also used as a data management tool. Findings supported the results of the document analysis presented in Chapter Seven and added further depth. Enablers and barriers were identified as being interrelated and dependent on context. A perceived lack of clear leadership by the Commonwealth government emerged as a strong theme and negatively impacted on momentum. Participant's views on the future of the BFHI were presented with specific recommendations for action to further the support of breastfeeding and the BFHI in Australia by both the Commonwealth government and the Australian College of Midwives.

In the final chapter *Discussion, Conclusion and Recommendations* key findings from the previous chapters are synthesised and discussed. I demonstrate how my research relates to my aims by revisiting the research questions and reviewing them in line with my results. I reaffirm the interrelatedness of Knowledge Translation theory to my study and results. The significance of the research is explained, an opportunity is presented to highlight agreements and disagreements between my data and that of others as well as alternative interpretations. The contribution of this work to the body of midwifery knowledge is considered and presented. Reflecting on the findings from my programme of research I propose a way forward for the BFHI in Australia through the inclusion of key recommendations.

In summary

This chapter has provided background information for the thesis. The importance of breastfeeding and health benefits of breast milk have been affirmed. The global BFHI has been defined. The BFHI in Australia has also been discussed, showing the variability that exists in accreditation status at a national, state and territory level plus across the time span since its implementation. The study's overall aims, objectives and methodology have been outlined followed by a description of the structure of the thesis. Chapter Two presents the first of six published papers that comprise this thesis, namely an examination of the infant feeding decision.

2 Examining the infant-feeding decision

Overview

Chapter One introduced the issues that this PhD study is using as its premise, namely the importance of breastfeeding and the need to protect, promote and support this public health measure. This chapter presents the first of two papers that provide further contextualisation for the study. Understanding the myriad of factors influencing women's infant-feeding decision is crucial to designing and implementing interventions that will have the greatest potential for success. This literature review therefore focuses on the influences on women's decision-making around infant feeding both nationally and internationally – the situational context in which the BFHI operates. The BFHI is not mentioned in the paper as it did not appear to feature in the decision-making process. This absence demonstrates the level of public profile the BFHI appears to have in the wider literature with regards women's decisions. The paper, as published, is transcribed below with a copy also located in Appendix Number Seven, all references are included in the thesis bibliography.

Peer reviewed paper #1: The decision not to initiate breastfeeding – women's reasons, attitudes and influencing factors: a review of the literature.
Atchan, M., Foureur, M. & Davis, D. 2011, *Breastfeeding Review*, vol. 19, no. 2, pp. 9-17.

2.1 Introduction

This paper provides a narrative review of the current understanding of factors surrounding the infant feeding decision. While key findings are highlighted the main focus is an examination of the literature that has explored the reasons why women decide not to initiate breastfeeding.

The rationale for this review of the literature stems from the premise that breastfeeding is the biological norm and human breastmilk is the optimal source of nutrition for human newborns, infants and young children. The decision not to breastfeed carries inherent short and long-term risks for the mother and her child, the family, the workforce and society. There is strong evidence supporting breastfeeding at all levels and it is a significant primary health promotion strategy (Kent 2006). To understand the current situation, it is necessary to review literature describing the processes and influences driving the infant feeding decision. This paper is a narrative review that will explore what is known about this question. The main focus is the review of studies that examine the infant feeding decision. The influence of health professionals on the infant feeding decision and practice; the impact of the social context and culture with regards to infant feeding

decisions and the influence of support on women's decisions will be considered, and how attitudes that determine support are informed by the media and public opinion. The review also considers the support of health professionals and the father/partner. The review identifies gaps in the literature that will assist in defining future research questions.

The paper is divided into seven sections. The first describes the breadth and depth of the search for relevant literature to be included. Section two identifies the evidence in support of breastfeeding while section three describes the risks of breastmilk substitutes. Section four outlines breastfeeding practices in Australia. Section five discusses studies that examine the infant feeding decision and practice while section six reviews the various factors that may influence it. Finally, section seven outlines gaps in the literature and directions for future research.

2.2 Searching the Literature

The initial search strategy included searching relevant databases (Medline, CINAHL, Psych Info) using the terms: mothers, formula, formula feeding, bottle feeding, not breastfeeding, artificial feeding. Limitations were: abstracts with full text available, English language and reports published between the years 1990 and 2010 (inclusive). The rationale for this large date range was to fully explore all work on the topic. Initially 45 abstracts were perused, and the full text selected if deemed relevant. A review of the reference lists of these articles, searching the contents pages of lactation/infant feeding journals plus previous knowledge and contributions by colleagues of other relevant articles yielded further documents of interest – essentially a snowball effect with 86 articles and documents eventually utilised. Ten further articles were excluded as the content was not relevant to the topic.

2.3 The evidence in support of the importance of breastfeeding

All babies have the right to adequate nutrition, the right to the highest attainable standard of health and the right to life i.e. the right to breastmilk (Ball 2010). The World Health Organization (WHO) has made carefully considered global recommendations for breastfeeding as best practice in regard to optimal infant feeding (World Health Organization 2003). The weight of evidence from a wide range of studies has demonstrated both the short and long-term health benefits and importance of breastfeeding, and breastmilk, for mothers, infants, the family, society, the workforce and the environment. A range of authors and organisations (for example American Academy of Pediatrics 2005; Horta et al. 2007; Kramer et al. 2008; Leon-Cava et al. 2002; National Health and Medical Research Council 2003) have reviewed evidence from well-designed

cohort and case-control studies and used systematic reviews and meta-analyses to make the sum of evidence more convincing. While there are very few contraindications to breastfeeding, there are significant issues associated with artificial feeding and artificial breastmilk substitutes.

2.4 The risks of artificial breastmilk substitutes

The risks of artificial breastmilk substitutes (commonly known as infant formula or artificial baby milk) have been clearly identified. If breastfeeding leads to a risk reduction in many otherwise preventable illnesses then the risk of not breastfeeding, or formula feeding, is directly inversely proportional. There is a strong association between the intake of formula and the risk of hospitalisation for infectious causes (Hengerstermann et al. 2010; Quigley, Kelly & Sacker 2007; Talayero et al. 2006). Increasing breastfeeding rates in the United States to the recommended levels would produce significant savings and prevent infant deaths (Bartick & Reinhold 2010). To date a similar paediatric cost analysis has not been performed in Australia however the proportion attributable to chronic disease in the Australian population is estimated at 6-24% for a 30% exposure to premature weaning (Smith & Harvey 2011).

2.5 Breastfeeding in Australia

A range of policy documents demonstrate government support of breastfeeding in Australia (for example, Commonwealth of Australia 2001, 2007; National Health and Medical Research Council 2003). Australia's goals and targets for the year 2000 and beyond (National Health and Medical Research Council 2003) appear to have not been met, but the lack of a national monitoring system, and the current fragmented approach to monitoring, are barriers to adequately reviewing breastfeeding data (Australian Health Ministers Conference 2009). Further potential data issues include the validity of long-term maternal recall of feeding practices (Australian Health Ministers Conference 2009) and interpretation of the concept of the questions (Australian Bureau of Statistics 2007). A review of Australian National Health Surveys (NHS) (Amir & Donath 2008) indicated that there has been little change in the overall initiation rates since 1995: 87.8% in 2004-05 compared with 86% in 1995. These data sets are a combined measure of fully, exclusive or complementary feeding – 'any' breastfeeding. What is clear from the data is that a socioeconomic gradient exists with regards to initiation with fewer infants in the lowest socioeconomic quintiles being breastfed (Amir & Donath 2008). Low socioeconomic status is also identified by the National Breastfeeding Strategy 2010-2015 as a barrier to the initiation of breastfeeding (Australian Health Ministers Conference 2009).

The situation is similar when data from individual states are examined. For example, in New South Wales the percentage of infants 'ever breastfed' was estimated at 90% in 2001 (Hector, Webb & Lymer 2004) and 87% in 2003-4 (Garden et al. 2007). These data were gathered using random phone survey techniques and are subject to similar limitations as the national surveys discussed above. Based on the data available, it would appear that, despite the range of strategies that support breastfeeding, at least 10% of Australian women decide not to initiate breastfeeding.

2.6 Studies examining the infant feeding decision and practice

Losch et al (1995 p510) stated that, in the profiles of women who decided not to breastfeed, one of the most consistent findings was that: "women who decide to formula feed are not so much embracing this method of infant feeding as rejecting breastfeeding."

2.6.1 The infant feeding decision

Demographically women have been identified as less likely to initiate breastfeeding if they are younger than 25 when they have their first child, have not received tertiary education and are in a lower socio-economic group (Productivity Commission 2009). This data does not however provide any reasons as to how, why or when this decision was made.

Studies that have investigated the infant feeding decision have identified a range of reasons offered by women for their decision not to breastfeed. These reasons include:

- Convenience (Dix 1991)
- Dislike (of the breastfeeding act) (Losch et al. 1995)
- Embarrassment (at feeding in public) (Forste, Weiss & Lippincott 2001)
- Personal health concerns (Sheehan, Schmeid & Cooke 2003)
- Fear of pain (Wambach & Cole 1999)
- Concerns about ability to produce enough milk (Anderson et al. 2004)
- Partner involvement/approval (Earle 2000)
- Early return to work (Lee & Furedi 2005)
- Previous experience (Wojcicki et al. 2010)
- Preference (Wen et al. 2009)
- Comparability/superiority of formula (Murphy 1999)

Less commonly recognised factors such as body image (Wambach & Cole 1999) and maternal obesity may also be linked to decreased rates of initiation (Donath, Amir & The ALSPAC Study Team 2003; Dykes & Griffiths 1998). Previous childhood sexual assault (CSA) has been suggested as another factor however this is not supported in the literature (Bowman, Ryberg & Becker 2009; Kendall-Tackett 1998; Prentice et al. 2002) although

underreporting of CSA may be a confounding issue. The literature does support the suggestion however that maternal characteristics play a role.

2.6.2 Maternal characteristics

The reasons cited by mothers for breastfeeding appear to be infant-centred while the reasons offered for bottle-feeding with infant formula would appear to be predominantly mother-centred (Britton & Britton 2008; Giugliani et al. 1994; Wagner et al. 2006); these reasons being motivated primarily by concerns about the impact of the feeding process (Losch et al. 1995) as opposed to the feeding process itself. Certain maternal personality traits (e.g. being reserved, sceptical, less likely to try new things) have been independently associated with the initiation of breastfeeding (Wagner et al. 2006). Women with lower self-concept (self-confidence) (Britton & Britton 2008) and decreased personal knowledge about breastfeeding (Ordway 2008) are less likely to breastfeed. While maternal characteristics are associated with the infant feeding decision, the need to justify that decision also exists.

2.6.3 Responsible motherhood

As a social construct, there is the issue of 'responsible motherhood'; however, mothers decide to feed their babies, infant feeding is a highly accountable matter. Shaker, Scott & Reid (2004) suggest that parents of formula fed infants, in particular mothers, may feel required to excuse or justify their feeding choices. Murphy (1999) stated "formula feeding women are concerned to demonstrate that an act which, superficially, seems irreconcilable with responsible motherhood, is perfectly justified." (p205). Lee & Furedi (2005) also suggest that the use of infant formula has become a measure of motherhood. 'Good' is assessed by breastfeeding – departing from what is 'best' (breastfeeding) is perceived as questionable, and symptomatic of a woman's failure as a mother. As there is a paucity of research in this area it is not possible to defend or refute these claims. There has however been research into the timing of the infant feeding decision.

2.6.4 The timing of the infant decision

The infant feeding decision is made well prior to conception or in the early stages of pregnancy (Earle 2000; Lawson & Tulloch 1995; Lee 2008), with figures suggesting 30-50% before conception (Wagner et al. 2006). Numerous studies have found that behavioural intentions assessed before the birth of a child are very closely linked to mothers' actual feeding practices (Bonnuck, Freeman & Trombley 2005; Donath, Amir & The ALSPAC Study Team 2003; Scott & Binns 1998; Shaker, Scott & Reid 2004). It is important to describe the processes and influences on women's decision making.

2.7 Factors that may influence the infant feeding decision

The factors influencing the decision not to initiate breastfeeding, apart from the perceived barriers cited above, are varied and complex. In the United States, it has been identified that the mother of Hispanic women tends to exert the most influence; for African-American women their friends are most important while for Caucasian women it is their husband or partner (Losch et al. 1995).

2.7.1 The partner (father of the baby)

While Sheehan, Schmied and Cooke (2003) found that the father did not appear to play an integral role in women's breastfeeding decisions and Scott, Shaker & Reid (2004) failed to find an independent association between infant feeding choice and paternal attitudes, other literature is quite consistent and conclusive that the woman's partner is a primary influence in her infant feeding decision (Arora et al. 2000; Earle 2000; Freed, Fraley & R 1992; Hauck & Irurita 2003; Rempel & Rempel 2004; Scott & Binns 1998; Tohotoa et al. 2009). The results of other studies (Giugliani et al. 1994; Scott et al. 2001) utilising multivariate analysis support and strengthen these findings as they have controlled for potentially confounding demographic and clinical variables. A partner's influence is a constant variable, irrespective of maternal age, educational level, ethnic group and/or marital status.

Fathers participate in, and influence, the infant feeding decision by acting as a key support or deterrent. Socio-demographically, partners of formula feeding women, in comparison to partners of breastfeeding women, are more likely to be from a lower social class, be younger and have a lower level of education and demonstrate less knowledge of the benefits of breastfeeding (Shepherd, Power & Carter 2000) however they display some similar attitudes i.e. that women breastfeeding in public is embarrassing and unacceptable (Pollock, Bustamante-Forest & Giarratano 2002; Shaker, Scott & Reid 2004). This attitude is due to the difficulty in the required shift in male perception from a sexual to functional use of the breast (Tohotoa et al. 2009).

The mother's perception of the father's preference has been found to be a significant factor in her infant feeding decision (Arora et al. 2000). Men's prescriptive breastfeeding beliefs can cause women to behave more in accordance with what their partners thought they should do than what they originally intended to do (Rempel & Rempel 2004). The importance of paternal support both emotionally and physically is also a common theme (Tohotoa et al. 2009); with some women choosing not to initiate breastfeeding in order to further engage the father in the relationship (Earle 2000).

While women may seek direction from their partner in their feeding decisions, they may not necessarily seek the same support from health professionals (Sheehan, Schmeid & Cooke 2003), who are uniquely placed to provide a positive influence.

2.7.2 Health professionals

Unfortunately, the literature is unclear on the issue of health professionals' influence. This is confounded by a lack of clarification in terminology. Various studies have reported the following:

- Minimal impact (Giugliani et al. 1994; Scott & Binns 1998)
- Perception of attitude and support affected initiation and duration (DiGirolamo, Grummer-Strawn & Fein 2003)
- Strong attitude towards breastfeeding/not supportive of decision to bottle feed (Lakshman, Ogilvie & Ong 2009; McIntyre, Hiller & Turnbull 1999)
- Doctor's opinion/support positively associated with breastfeeding duration (Bentley et al. 1999; Zhang, Scott & Binns 2004)
- Part of midwives' role to recommend breastfeeding (Cantrill, Creedy & Cooke 2003), support hampered by knowledge deficits

In most studies on infant feeding formula use is the standard for comparison (McNiel, Labbok & Abrahams 2010; Smith, Dunstone & Elliott-Rudder 2009) which is inconsistent with the accepted use of the proved optimal treatment approach (breastfeeding/breastmilk) as the standard, or control, group in research design. The explicit and implicit attitudes of medical professionals may also be positive or ambivalent due to a perceived equivalence between breastfeeding and artificial feeding (Brodribb et al. 2009). Their advice may be influenced by their personal attitudes and experiences, which have been formed by their social context and culture.

2.7.3 Social context and culture

Social and cultural norms predict breastfeeding initiation. There are major differences in the incidence of breastfeeding amongst various ethnic groups (Ryan, Wenjun & Acosta 2002; Scott & Binns 1998) with lower rates of breastfeeding consistently found among African-American and Hispanic women when compared with Caucasian women in the United States. The free formula provided to women enrolled in the US government funded program known as the Special Supplemental Food program for Women, Infants and Children (WIC) has had a significant deleterious impact on young women's infant feeding decisions (Fooladi 2001). For young black American women bottle feeding with infant formula appears to have become the cultural norm. Australia may be experiencing some similarities due to the variances in race and culture in this country.

Australia's multi-culturalism is evidenced by the population characteristics in the 2006 Census (Australian Bureau of Statistics 2007). It has been identified that there is limited research in Australia into the infant feeding practices of women from culturally and linguistically diverse backgrounds (CALD) (Dahlen & Homer 2010) however it is known that initiation rates are not consistent across all ethnic groups (Li et al. 2004; Rossiter 1992; Sheehan, Schmeid & Cooke 2003).

The *NSW Mothers and Babies Report 2007* (Centre for Epidemiology and Research. NSW Department of Health 2010) indicates 60.8% of Aboriginal/Torres Strait Islander women in NSW were fully breastfeeding on discharge from hospital in comparison with 78.8% of non-Indigenous women. However, maternal underreporting of Aboriginality has been recognised as an issue, so these results need to be interpreted with some caution. Notwithstanding, being Indigenous and urban has been identified as a factor that may hinder initiation (Australian Health Ministers Conference 2009). Support received by women of different cultures could be quite variable and it would appear that support is another influencing factor in the infant feeding decision.

2.7.4 Available support

The infant feeding decision is affected by the support a woman has access to within her social and cultural context. Sources of support may vary in different populations (Giugliani et al. 1994) according to the woman's age, social class, ethnic group or culture (Matich & Sims 1992). Support may be tempered by the prevailing knowledge, opinion, approval and perception of infant feeding methods and practices (Hannan et al. 2005) of a particular demographic group.

Matich & Sims (1992) measured tangible (e.g. money, time, services), emotional (e.g. affection, empathy, love) and informational (e.g. facts, knowledge, advice) aspects of social support and identified them as having the capacity to affect infant feeding outcomes. A link has been identified between socio-economic status and breastfeeding initiation (Australian Health Ministers Conference 2009; Hector, Webb & Lymer 2004) with lower socio-economic women utilising friends and family to a greater degree for support and to inform their infant feeding attitudes (Lawson & Tulloch 1995).

2.7.5 Attitudes

Being breastfed as an infant or having a friend who breastfed generates a positive attitude (Anderson et al. 2004; DiGirolamo, Grummer-Strawn & Fein 2003; Donath, Amir & The ALSPAC Study Team 2003), increases confidence (Mossman et al. 2008) and may outweigh the demographic variables typically associated with breastfeeding i.e. age and education (Bonnuck, Freeman & Trombley 2005). Similarly, women who perceive their own mother

to prefer breastfeeding are more likely to initiate breastfeeding (Scott et al. 2001). The lack of a positive attitude towards breastfeeding is especially significant within the adolescent pregnant/new mother population. The decision to breastfeed in this group is also related to the prevailing attitude and degree of support from their families (Mossman et al. 2008).

Positive attitudes are a more important predictor of initiation than knowledge (Losch et al. 1995). An early study in the US (Dix 1991) included mostly young single women enrolled in the WIC program who were living with their families. "From their families, they learnt about feeding methods, observed how other women fed their infants, listened to their opinions and problems, developed attitudes, and chose a method of feeding their own infants" (p224). The majority (84%) of the 81 young women in this study bottle fed with infant formula.

2.7.6 The media

The infant feeding decision-making process may be undertaken in isolation (Lee 2008) or after seeking information from a variety of sources including the media. Different socio-economic groups access different resources (Lawson & Tulloch 1995) with higher socio-economic groups using written materials such as books and magazines to inform their views.

The eroticism of breasts and idolisation of slim and immature bodies is incompatible with motherhood, breastfeeding and fertility (Rodriguez-Garcia & Frazier 1995). Breastfeeding and male sexual privilege have all been subject to much discussion (Maher 1995) and there has long been the suggestion that women do not breastfeed due to their awareness of the erotic value of breasts to men. Public opinion in the United States considers it inappropriate to show breastfeeding on television (Hannan et al. 2005). Although many children and young adults are never or rarely exposed to breastfeeding, most will be exposed to bottle feeding through the media (Van Esterik 2002) often in the form of advertising.

Through advertising, media not only alerts the public to new merchandise, but also teaches people why they need the product (Foss & Southwell 2006). Market researchers have estimated that 20% of Australian women read a monthly glossy magazine (Handfield & Bell 1996) with magazines often seen for years after their publication in a variety of settings. The content of these magazines may help formulate some negative ideas amongst women, particularly young women who do not have the benefit of additional education. A recent Australian study of women's' understanding of toddler milk advertisements (Berry, Jones & Iverson 2009) indicated that women clearly understood that the advertisements

were not just for a single product but an affiliated range of products that undermined breastfeeding - yet they accepted their claims quite uncritically. The use of scientific or technical sounding language was most persuasive. Supporting the findings of other studies, some of the women in the study indicated they would seek advice from other mothers to assist with verification of claims i.e. to inform their attitude and determine their infant feeding behaviour. This also suggests a practice of aligning behaviour in accordance with perceived public opinion.

2.7.7 Public Opinion of Breastfeeding

Research findings within sociology literature suggest that social perception can automatically influence behaviour and the development of social norms (Ferguson & Bargh 2004), in this case the public opinion of artificial formula as an attractive or at least comparable alternative to breastfeeding (Merewood & Heinig 2004). Regional variation in public knowledge, attitudes, and support of breastfeeding as demonstrated by Hannan et al (2005) has implications for the approval and support of women's infant feeding decisions and practice.

2.8 Gaps in the literature – directions for future research

This literature review has confirmed the importance of breastfeeding and the risks of formula feeding (Horta et al. 2007; McNiel, Labbok & Abrahams 2010). Cost analyses have been performed in several nations where suboptimal breastfeeding has occurred (Bartick & Reinhold 2010; Black, Morris & Bryce 2003). Australia, which also has suboptimal breastfeeding would benefit from a similar review.

The review has clearly identified the reasons women decide not to initiate breastfeeding (convenience, dislike, embarrassment, personal issues, fear of pain, returning to work, partner involvement/approval, simple preference, comparability of infant formula). However, there are few studies that have investigated this decision as a social construct (Lee & Furedi 2005; Murphy 1999) and not in the Australian context.

There are studies examining issues such as attitudes, knowledge and supports on the infant feeding decision and practice in a variety of settings (for example Arora et al. 2000; Giugliani et al. 1994; Losch et al. 1995; Shaker, Scott & Reid 2004). In the majority of literature however formula feeding mothers are a subgroup and the focus of the study is on the promotion of breastfeeding or a comparison of 'breastfeeders' and 'bottle feeders' (mother/father/couples) on some aspect of infant feeding decision/practice.

There is little published research that specifically investigates the experiences of women who decide not to initiate breastfeeding, in particular first-time mothers. This conclusion is supported by a systematic review of qualitative and quantitative studies of mothers'

experiences of bottle-feeding (Lakshman, Ogilvie & Ong 2009) that identified that only six qualitative studies explored mothers' experiences, of which only one study (Lee & Furedi 2005) focussed exclusively on formula feeding mothers (although a proportion of these women had started out breastfeeding). Australian studies to specifically examine the influences on, attitudes and experiences of first-time mothers who decide not to initiate breastfeeding are lacking.

While there is quite a lot of literature on the influence of the partner/father of the baby with regards to infant feeding decisions and practices (for example Earle 2000; Pollock, Bustamante-Forest & Giarratano 2002; Rempel & Rempel 2004), there is a scarcity of studies specifically on father's experiences of formula feeding.

As the literature seems to suggest that women make their infant feeding decision prior to conception or early in pregnancy, outside the scope of health professionals research to evaluate strategies aimed at altering public opinion would be useful. Public opinion of American families with regards to their attitudes and support of breastfeeding (Merewood & Heinig 2004) indicated a perception that breastfeeding was healthier and better, but formula was 'good enough' and while breastfeeding was seen as ideal formula was standard (not inferior). This research has not been replicated in the Australian context to determine if similar opinions exist.

This review has also highlighted that other issues impact on public opinion. The sexualisation of the breast as described by Rodriguez-Garcia & Frazier (1995) and the resulting conflict is another area that has not been thoroughly investigated in women who decide not to initiate breastfeeding and would be a worthwhile area of exploration.

While numerous studies have explored infant feeding in recent years most have either adopted a quantitative approach or focussed on obstetric/socio-economic/demographic factors. Although this information has been valuable there has been only minimal research to clarify how and why women make either their infant feeding decisions or the meaning of this decision for women, especially in contemporary Australian society.

2.9 Conclusion

The evidence is clear that breastmilk confers a wide range of benefits at all levels of society while the risks of artificial breastmilk substitutes are numerous. Australia's progress in monitoring breastfeeding rates has been hampered by a fragmented monitoring system.

The reasons women give for deciding not to initiate breastfeeding are varied and complex. The decision appears to be mother-centred as opposed to infant-centred and the mother

may well have to justify her initial decision. The common influencing factors include: previous exposure to breastfeeding/attitude to breastfeeding, personality/self-concept, the influence of the partner/mother/peer group and accessibility to formula. Age, income and education level also may influence the decision.

The woman's partner is the primary influencing factor in the infant feeding decision and practice. Fathers' degrees of support are informed by their level of knowledge and cultural influences, which in turn affects their attitudes and practices. A woman also bases her decisions on her perception rather than actual knowledge of her partner's preference. One attitude that many fathers share however is the approbation of women breastfeeding in public.

Health professionals have been identified as seeming to provide support once a woman is breastfeeding but not necessarily with the decision process. They would appear to be hampered by a lack of clear and unbiased published information available. Their advice may also be influenced by their personal attitudes and experiences.

Social norms significantly predict breastfeeding initiation. Norms are influenced by culture and the woman's social context or culture. Culture is not easily defined, meaning different things to different people. Some cultural groups such as African-American women in the United States have identified they 'prefer' bottle feeding. Within Australia two cultural groups have been identified as requiring more support – Aboriginal & Torres Strait Island and CALD women (Productivity Commission 2009). Indigenous women may experience difficulties accessing appropriate support systems. Migrant women face unique challenges when trying to assimilate into a new culture without knowledge of the available health care system and support services.

The effect of support and attitudes is a recurring theme in the literature. The presence of support increases confidence, while absence decreases it, both of which influence the initiation and duration of breastfeeding. Sources of support vary according to age, social class, ethnic group or culture.

The media has influenced attitudes and public opinion. The sexualisation of the breast, especially within cultures where bottle feeding is the norm has resulted in conflicting social and sexual values for women. The attitude towards breastfeeding as displayed in parenting and women's' magazines has been described as destructive.

It would appear from the literature that the experiences of women who decide not to initiate breastfeeding, as a separate specific group, have largely been ignored. The majority of research includes both breastfeeding and formula feeding mothers. Any

research on formula feeding mothers that has occurred has incorporated women who are having either their first or subsequent children. There are no studies exclusively focussing on women having their first baby, who have decided not to initiate breastfeeding. This is an important group to investigate as women having their first baby may well experience confidence and commitment in a different way to mothers who have a past experience of infant feeding.

In summary

This chapter has examined women's infant-feeding decisions and demonstrated that they are varied, complex and contextual. There are few studies that explore Australian women's experiences. Drawing on the wider published literature the complexities and pragmatism of the decision-making process and external influences were discussed, many of which women may not be aware. The feeding decision appears to be mother rather than infant centred. The review identified that formula baby milks and bottle feeding are considered comparable or even preferable to breastmilk and breastfeeding due to the ease of accessibility and perceived instant gratification. Women's feeding decisions are consequently subject to overt and covert influence from the breastmilk substitute industry. The formula industry has consciously developed a highly visible profile and desirable product despite the presence of international recommendations to regulate its marketing activities and influence. Health professionals were not identified as influencing the decision however maternal judgement of the quality of their support for breastfeeding women was a common theme.

The Baby-friendly Hospital Initiative, a global health strategy has been designed as part of a multi-pronged effort to create a 'space' for women to make freely informed decisions, yet it did not feature as a source of information or support. My reflection on the findings of this review led to a refocus of the study's aim and purpose to an examination of the impact of global health strategies in a national setting. Chapter Three presents an exploration of the literature about a structured global health strategy to support women's feeding decisions and practices.

3 Examining a global strategy designed to support breastfeeding

Overview

An examination of the strategies that are present in the healthcare system to protect, promote and support breastfeeding was warranted. This chapter presents further background and context to the study undertaken. The justification for the Baby-friendly Hospital Initiative (BFHI) as a global programme is analysed with Australia used as a case study exemplar. The critical narrative review compared and contrasted available published evidence and identified gaps for future research. Significant variation in uptake exists however a positive association is demonstrated between the number of *"Steps"* (Figure 1) implemented by maternity facilities and women's breastfeeding outcomes - a dose dependent response. The paper, as published, is transcribed below with a copy also located in Appendix Number Eight, all references are included in the thesis bibliography.

***Peer reviewed paper #2*:** The impact of the Baby Friendly Health Initiative in the Australian health care system: a critical narrative review of the evidence
Atchan, M., Davis, D. & Foureur, M. 2013, *Breastfeeding Review*, vol. 15, pp. 15-21.

3.1 Introduction

The evidence supporting the importance of breastfeeding is significant (Ip et al. 2007). Breastfeeding promotion is an important public health strategy although women's breastfeeding decision-making processes and practices do not necessarily follow recommendations. Obtaining accurate data through the implementation of robust reporting systems to determine infant feeding trends and further support the impetus for implementing improvements in this area is challenging. Globally, key stakeholder meetings resulted in the development and dissemination of recommendations, supportive policy documents, strategies and resources such as the Baby-friendly Hospital Initiative (BFHI). In Australia, the Initiative is governed by the Australian College of Midwives, who endorsed a name change from 'Hospital' to 'Health' in 2006 with the aim of including the community within the initiative, it is now known and referred to as the *BFHI Australia*.

Impact studies propose that implementation of the BFHI and accreditation of maternity facilities as 'baby friendly' have positively influenced breastfeeding prevalence and practice (Abrahams & Labbok 2009), although a direct causal relationship has not been established and critics suggest conflict exists between the assumptions of the BFHI and the individual woman (Gottschang 2007). In Australia, uptake and implementation of the

Initiative in maternity facilities has been variable. Attitudinal studies have identified both organisational and cultural barriers (Walsh, Pincombe & Henderson 2011) including a lack of policy support and funding as well as a misunderstanding of the aims and outcomes of the Initiative (Schmeid et al. 2011). To date research on the Initiative has tended to focus on seemingly disparate aspects. This narrative review presents a synthesis of various issues related to breastfeeding and the BFHI – the sum of the parts that make up the whole. The paper discusses the issue of beneficence as it relates to women's experiences of breastfeeding support. It explores the state of evidence on which the initiative in high-income nations is based. The challenge of successfully developing and reporting on breastfeeding indicators is examined in detail. Finally, the impact of the Initiative on breastfeeding is also explored in order to examine the relationship between breastfeeding and BFHI practices using the Initiative in Australia as an illustrative case study.

3.2 Searching the literature

An initial search was attended using the Clinical Information Access Portal (CIAP) maternal and infant care database of NSW Health and the Cochrane database using the following search terms: 'Baby Friendly Hospital Initiative', 'Baby-friendly Hospital Initiative', 'Baby Friendly Initiative' and 'Baby Friendly Health Initiative'. Limitations included full text, human subjects and English language, with a date range of 1991 to current. This located around 70 articles which reduced to 38 after abstracts were reviewed for relevancy and duplicates removed. Further references were obtained from the reference lists of articles or were previously known to the author. The volume of material located was divided into two major categories. Category 1 data which is presented in this paper focussed on the impact of the Baby Friendly Hospital Initiative in international studies and the impact of the Baby Friendly Health Initiative in the Australian health care system.

3.2.1 The beneficent assumption that 'breast is best'

Breastfeeding is the biological norm for human infants yet globally, maternal resistance to exclusive breastfeeding remains. Motherhood carries social responsibilities, with the infant feeding decision and practice being one of the most outwardly visual. 'Breast is best' is a message given to pregnant women and new mothers by well-meaning people, including health professionals. Paternalism in healthcare provision occurs where there is a genuine beneficent assumption made that the recommended intervention will provide a health benefit (Cody 2003), and that people are obliged to do what is good for them. Within the social context of infant feeding, potential for conflict then arises between health professionals' beliefs in their moral obligation to promote breastfeeding and the rights of the individual woman to make her own pragmatic infant feeding decision/s. "New mothers

make infant feeding decisions in an increasingly consumer-oriented society that values choice and individuality" (Gottschang 2007 p.65). Mothers may view their healthcare provision as paternalistic (Nelson 2006) and identify 'disconnection' as opposed to 'authenticity' in their experience of breastfeeding support (Schmied et al. 2009). 'Good' mothers breastfeed (Marshall, Godfrey & Renfrew 2007); therefore, women who act in opposition to this moral view are required to justify their decision within their social context (Lee 2007). Yet human rights law supports the infant's right to be breastfed/receive breastmilk while simultaneously supporting the woman's right to make a fully informed and supported free choice (Ball 2010), even if that decision is considered, in a public health context, to be less than optimal. Significant resources have been allocated to strengthen the evidence and reaffirm exclusive and sustained breastfeeding as a desirable infant feeding goal.

3.2.2 Reconsidering the evidence supporting breastfeeding

A review of the evidence-base supporting breastfeeding prevalence reveals the evidence has been drawn mostly from observational studies. The inability to identify all variables that could affect or explain differences in outcomes when using an observational study design limits the evidence (Wolf 2011). Other methodological limitations include inadequate sample sizes, poor quality of data sets and ambiguity of operational definitions. Further potential for bias exists due to the differing characteristics of mothers who initiate breastfeeding and those who do not (Atchan, Foureur & Davis 2011). Consequently, the published evidence of individual studies is not considered compelling. Pooling data from many individual studies into systematic reviews and meta-analyses several health benefits achieves statistical significance and demonstrates greater credibility (Ip et al. 2007). A randomised controlled trial (RCT) study design however significantly minimises bias and provides the most robust evidence.

One such RCT was undertaken in Belarus (the PROBIT study) (Kramer et al. 2001). This large prospective study used a cluster randomisation design with long-term follow up to "assess the effects of breastfeeding promotion on breastfeeding duration and exclusivity and gastrointestinal and respiratory infection and atopic eczema amongst infants" (p.413). The intervention was a structured breastfeeding support program. Hospitals and associated clinics throughout Belarus were randomised to the intervention or control arms of the study. All staff in the intervention group received significant training and support. Only women who were breastfeeding (17,046 mother-infant pairs) were enrolled into the study. Eligibility criteria included: the baby was born healthy, greater than 37 weeks gestation, weighed at least 2500gms, with an Apgar score of greater than 5 at five minutes.

There were several contextual conditions that acted as enabling factors for the success of the PROBIT study. The recruitment period was 1996 to 1997 and the country's maternity hospital practices were undeveloped. The intervention was implemented quickly into health care facilities with little resistance to policy change; many women came from a higher education group; caesarean section rates were low, as were smoking rates; discharge from hospital was commonly six to seven days and the breastfeeding initiation rate was already 95%. Analysis consisted of multivariate techniques on the observational cohort studies nested within the RCT to control for potential biases. The Belarus study has continued to demonstrate a range of improved health outcomes (Kramer 2010) including short term support for a reduced risk of gastrointestinal infection but not asthma and allergy. Long term analysis has yielded mixed results: supporting previously found relationships between breastfeeding and neurocognitive development whilst contesting any protective relationship between breastfeeding and obesity (Kramer, Moodie & Platt 2012). The Belarus study also provides robust evidence of the context bound, positive influence of a structured breastfeeding support program in a supportive environment. However, the almost 'utopian' conditions that contributed to the success of implementing the intervention limit the generalisability of the findings to other contexts. Furthermore, as there were no non-breastfed babies enrolled in the study caution is required in interpreting the results; there is no comparison drawn between breastfed and non-breastfed infants.

The intervention used by the PROBIT study was a structured breastfeeding program modelled on the global, Baby-friendly Hospital Initiative standards and used the World Health Organization/United Nations Children's Fund (WHO/UNICEF) lactation management training courses (Kramer et al. 2001). The validation of this intervention in a RCT has provided supportive evidence for its inclusion in health policy at national levels.

3.2.3 The Baby-friendly Hospital Initiative

As maternal breastfeeding prevalence declined and a 'bottle feeding culture' emerged in the twentieth century there was a corresponding negative impact on infant mortality and morbidity. The WHO and UNICEF encouraged maternal healthcare providers and authorities to review their policies and practices related to breastfeeding support and make changes accordingly (World Health Organization and the United Nations Childrern's Fund 1989). After successful testing, the Baby-Friendly Hospital Initiative was officially launched in 1991 (Kyenkya-Isabirye 1992): a multi-faceted programme designed to guide the recommended health service change. The *Ten Steps to Successful Breastfeeding* (Baby Friendly Health Initiative 2012b) serve as the foundation of the Initiative.

The expected result of implementation is an increase in breastfeeding prevalence; the Initiative does not presume to significantly affect duration. As a multilateral program, some of the Initiative's elements are prescriptive, highlighting how women should adjust to their role as a breastfeeding mother. Gottschang (2007) related the experience of women in China in the 1990s who identified a conflict between the rhetoric and assumptions of the Initiative and their contextual experiences. Similarly Burns et al (2010) suggests that Australian women are adversely influenced in the way they see their body and their baby via 'biomedical discourses' (p.215) concerning the BFHI and public health messages. Nevertheless, since its inception significant work has gone into providing supportive evidence for the BFHI's interventions.

3.2.4 Reconsidering the evidence supporting the Initiative

Structured breastfeeding promotion interventions have been demonstrated in systematic reviews by the prestigious Cochrane Collaboration and others, to show a statistical increase in exclusive and 'any' breastfeeding rates: reviewing randomised, quasi-randomised, non-randomised, cross sectional, cohort and descriptive studies and meta-analyses (Beake et al. 2012; Britton et al. 2007; Fairbank et al. 2000). The effect is more obvious in nations with pre-intervention low breastfeeding uptake and duration. A number of impact studies have occurred in a variety of settings to assess the influence of BFHI interventions. An examination of global trends, population-based as well as regional and local studies follows.

3.3 Global assessment of BFHI impact

Demographic and health surveys, plus UNICEF BFHI reports have compared pre-and post-Initiative trends in exclusive breastfeeding, indicating a statistically significant annual increase in exclusive breastfeeding rates in a number of low income countries (Abrahams & Labbok 2009). Worldwide approximately 27.5% of all maternity facilities have 'ever' been designated 'baby friendly' (Labbok 2012). There is acknowledged limitations to the conclusions that can be drawn from this survey for the following reasons: only two thirds of countries provided information and data were not collected originally for research purposes. Definitive statements on statistical associations were not drawn, rather "chronological, ecological correlates, open to discussion and alternative interpretations are presented" (p.220). There is also no way of knowing the currency of BFHI designations as only 'ever designated' data was requested for the assessment. Despite these acknowledged limitations the strength of the assessment is that this is the only continuous global data available for the Initiative. Population-based studies are more numerous. A number of population-based studies (Bartington et al. 2006; Broadfoot et al. 2005; Chalmers et al. 2009; Chien et al. 2007; Declercq et al. 2009; Merten, Dratva & Ackermann-

Liebrich 2005; Venancio et al. 2012) in a variety of countries have used large, randomly selected cohorts and proportional probability sampling methods to assess breastfeeding prevalence and duration and the influence of BFHI implementation on breastfeeding success. The studies all used either a postal survey and or interview at one or more points in time to collect data based on 24-hour maternal recall. Limitations of these methods will be addressed in the next section. Multivariate analysis was used to identify significant determinants of breastfeeding. In all studies, there was a positive association between birthing in, or experience of, a number of baby-friendly practices in the birthing facility. There was a corresponding reported increase in breastfeeding rates, both in exclusivity and, to a lesser extent, duration. Studies at the regional and local level have also investigated links between breastfeeding prevalence and practice and the BFHI.

3.3.1 Regional and local studies

At the regional and local level, studies using surveys of maternal recall have investigated breastfeeding indicators pre-and post-implementation of the Initiative (Braun et al. 2003; Caldeira & Gonçalves 2007; Çamurdan et al. 2007). These studies recruited smaller sample sizes than the population studies but also surveyed at several similar time points. Analysis likewise indicated a positive impact post implementation. Evidence also suggests the degree of positive impact on breastfeeding rates at the hospital level is influenced by the number of interventions actually implemented in clinical practice (Merten, Dratva & Ackermann-Liebrich 2005). This further suggests a cumulative effect and dose-related response (DiGirolamo, Grummer-Strawn & Fein 2008). The average breastfeeding duration is reportedly longer in babies born in a BFHI hospital that maintains good compliance with the Initiative's strategies once implemented. However, variations in the degree of compliance amongst BFHI accredited hospitals may negatively impact on breastfeeding practices. There is also a correlation between the number of 'baby friendly' hospital practices implemented and breastfeeding prevalence (Declercq et al. 2009; DiGirolamo, Grummer-Strawn & Fein 2008). The greater the number of hospital practices experienced by mothers, the more positive the reported association with any breastfeeding. In contrast mothers who reported experiencing no baby friendly practices in the hospital setting were 13 times more likely to cease breastfeeding before six weeks than mothers who had experienced at least six practices (Chien et al. 2007). Links between breastfeeding and BFHI implementation have also been assessed by other means.

3.3.2 Other studies linking changes in breastfeeding practices with BFHI implementation

A large observational study in Scotland (Broadfoot et al. 2005) used a mixed methods approach to examine the effects of the BFHI on breastfeeding rates in Scotland. Multivariate analysis was used to determine associations. An increase in breastfeeding

rates at one week of age was linked to the level of BFHI implementation and accreditation obtained. Limitations included only measuring breastfeeding at one point in time and omitting standardised breastfeeding definitions. The potential for hospital reporting bias also existed but was not identified or discussed.

A 2001 examination of 29 'baby friendly' hospitals in the United States of America indicated higher breastfeeding rates than the general population (national average) in the same year, regardless of demographic factors (Merewood et al. 2005). Significant variation was exhibited in definitions of exclusivity used as well as methods of data collection and analysis to establish breastfeeding rates. A further identified limitation was that the National survey that was used as a data comparison utilised maternal recall whilst the study accessed hospital records. Finally, analysis was limited due to the small number of hospitals in the sample.

The studies described above have utilised a variety of indicators at one or more time points to assess breastfeeding characteristics, prevalence and duration and the influence of BFHI implementation on breastfeeding 'success'. Methodological limitations are apparent, and a direct causal link has not been demonstrated although a positive association is highly probable. As the proportional risk of artificial baby milks and preventable illness (Bartick & Reinhold 2010) and the increased risk of hospitalisation for infectious causes (Quigley, Kelly & Sacker 2007) are well established, an accurate and consistent measurement and reporting system for infant feeding is essential to comprehensively determine the effects of breastfeeding promotion activities and inform health policy.

3.3.3 Developing and reporting on breastfeeding indicators

Infant feeding practices vary widely during the first six months of life and breastfeeding indicators are hard to define. To be accurate, the definition of an indicator needs to remain constant each time it is measured and reported. Few countries have successfully implemented an accurate and consistent measurement and reporting system (Hector 2011) with significant disparity between reported breastfeeding rates occurring when different data sources are used (Chapman & Perez-Escamilla 2009; Flaherman et al. 2011). Confounding issues include the clarity of the wording of indicators, the boundaries of ages reported against and the interpretation of data gathered.

On WHO recommendations (World Health Organization 2008), surveys routinely gather data using 24-hour maternal recall at one or more separate points in time, known as 'current status.' Current status is used to minimise the potential for recall bias. It collects data within a relatively short period of time and is cost effective. The acknowledged and

accepted outcome is a potential overestimation of exclusivity in the first six months and a misinterpretation at measured time points thereafter as accuracy of the data measured for exclusivity is questionable if the infant received artificial baby milk in the time periods not assessed (Noel-Weiss, Boersma & Kujawa-Myles 2012). Other limitations include misunderstanding of the question, intentional deception on the part of the respondent who provides the answer he or she thinks the interviewer wants to hear, and the large sample sizes required to precisely estimate subpopulation practices (Australian Institute of Health and Welfare 2011a). A Swedish study (Aarts et al. 2000) compared the breastfeeding practices of 506 mother-infant pairs who completed daily recordings on infant feeding for nine months. This data was analysed using both 'current status' and 'since birth', that is, how the infant was fed over time. There was a wide discrepancy between the two indicators and a significant overestimation of breastfeeding prevalence at all time points. Notwithstanding the above, the use of 'current status' appears to be the accepted indicator measure (Hector 2011).

Despite reporting against the established WHO definition of exclusive breastfeeding (World Health Organization 2008) it is also apparent that some researchers have accepted data that skews results, for example ignoring the use of early pre-lacteal feeds while simultaneously classifying the baby as exclusively breastfed (Hector 2011; Perez-Escamilla et al. 1995). Finally, the current WHO definitions merely address the needs of statisticians and policy makers where determination of infant feeding trends, that is, 'what' the baby is fed, are required to help determine health policy. This presents a dilemma for breastfeeding and lactation researchers who argue that the current definitions do not accurately describe 'how' breastfeeding occurs within the complex relationship that exists between the breastfeeding mother and her baby (Noel-Weiss, Boersma & Kujawa-Myles 2012). Breastfeeding is highly complex physically, emotionally and socially. The method of feeding, the context in which it occurs as well as the 'product' consumed could be equally important in influencing health outcomes.

Australian studies support many of the findings in the studies described above, both in the divergence from international breastfeeding recommendations, the need to establish an accurate reporting mechanism and variance in uptake of the BFHI. A description of the Australian context follows.

3.4 Australia as a 'case study'

The *National Breastfeeding Strategy 2010-2015* (Australian Health Ministers Conference 2009) has been commissioned by the Federal government to increase the percentage of babies exclusively breastfed in the first six months. An identified socioeconomic

discrepancy in breastfeeding duration is apparent (Amir & Donath 2008) although significant effort has since gone into developing accurate indicators to measure breastfeeding practices (Australian Institute of Health and Welfare 2011b). Using a random sample of 28,759 women, 'current status' and statistical adjustment weighting, the *2010 Australian National Infant Feeding Survey* (Australian Institute of Health and Welfare 2011a) identified that while over 90% of mothers initiated breastfeeding, only 39% of infants were exclusively breastfed to three months and 15% to five months. Furthermore, artificial baby milks were identified as being an attractive or at least a comparable alternative to breastfeeding. Twenty six percent of women surveyed stated they did not breastfeed/continue to breastfeed because "infant formula was as good as breastmilk" (p.39). The demonstration of comparability supports other studies' illustration of the success of formula industry advertising in Australia (Berry, Jones & Iverson 2009) plus raises questions about the efficacy of the current monitoring systems and the accuracy of information sources of health care workers (Berry, Jones & Iverson 2011). The lack of government protection negatively impacts on women's capacities to make fully informed infant feeding choices, a human right. Finally, whilst a recent Australian study did not identify any association with the BFHI it clearly demonstrated that midwives' language and practices when providing breastfeeding support and assistance was not necessarily cognisant or accommodating of women's context and needs (Beake et al. 2012).

In Australia, the BFHI is supported 'in principle' at a national level (Australian Health Ministers Conference 2009). Implementation is also encouraged through its inclusion in health policy in several, but not all, states. Similar to other middle and high-income nations (Philipp & Radford 2006) accreditation of Australian facilities has been protracted and implementation is varied. Currently 74 or approximately 19% of the 394 maternity facilities in Australia are accredited as 'baby friendly' (Baby Friendly Health Initiative 2012a) with variability in accreditation rates across states demonstrated in Table 3.[1]

[1] Note: in 2011 when this paper was published the ACM used data from AIHW's *Australia's mothers and babies 2009* to determine the number of maternity facilities. Since 2016 the ACM has used data from an alternate, more accurate AIHW source, please refer to Tables 1 and 18.

TABLE 3: BFHI ACCREDITED PUBLIC AND PRIVATE MATERNITY FACILITIES IN EACH STATE USING DATA FROM AUSTRALIA'S MOTHERS AND BABIES 2009 AND BFHI AUSTRALIA
Sources: [a] (Li et al. 2011); [b] (Baby Friendly Health Initiative 2012a)

State	Maternity facilities [a]	BFHI accredited [b]	Percentage*
New South Wales	105	9	8.5%
Victoria	83	14	17%
Queensland	104	19	18%
Western Australia	39	3	7.5%
South Australia	43	15	35%
Tasmania	10	8	80%
Australian Capital Territory	4	2	50%
Northern Territory	6	4	66%
Total	394	74	19%

*Percentages have been rounded up or down for convenience

Whilst these achievements are applauded it has not been identified to what extent Australia provides a consistent standard of BFHI practices irrespective of accreditation status. It is therefore difficult to fully determine the degree of impact of BFHI in Australia. Allocating funds to support BFHI implementation and accreditation has been questioned due to the already high rate of initiation (Fallon et al. 2005). However, full implementation of Step 10 (Baby Friendly Health Initiative 2012b) is vital for supporting duration as it is encouraging the development of community-based peer support, an identified evidence-based strategy.

Australian studies have revealed further barriers at all levels of the health system. Managerial support within health facilities for BFHI accreditation is hampered by a lack of funding with the result that seeking accreditation is a low priority (Walsh, Pincombe & Henderson 2011). A lack of formal breastfeeding management training for midwives (Cantrill, Creedy & Cooke 2003) has resulted in a deficiency in the understanding and practice of BFHI standards (Cantrill, Creedy & Cooke 2004). Furthermore, midwives have identified using divergent practices while working in a hospital preparing for accreditation (Schmeid et al. 2011) and in a facility already designated as baby friendly (Reddin, Pincombe & Darbyshire 2007).

3.5 Conclusion

In summary, despite the complexities of researching infant feeding and a number of identified limitations, the sum of impact studies attended at all levels provide enough evidence to strongly suggest an ongoing positive relationship between the Baby Friendly Hospital Inititiative, changes in practice and breastfeeding prevalence. The relationship between a single national program and breastfeeding behaviour change will always be challenging to accurately measure. It is naïve to expect that one program will single-handedly have an ongoing positive impact on breastfeeding determinants and outcomes as it is not necessarily able to address the complex priorities of women's infant feeding decisions and practice. Individual, group and societal factors, plus other potentially complementary government and non-government programs, all exert an influence. The lack of clearly worded and sensitive indicators, inaccurate reporting against accepted indicators and the lack of studies with sufficient sample sizes and has reduced the capacity for researchers to make conclusive statements about the existence of direct causal effects between breastfeeding practices and the Initiative, although a positive association is clearly apparent. Australian studies reflect many of the international findings. The degree of comprehensive ongoing support in the national agenda to protect, promote and support breastfeeding in Australia appears to be minimal. Further research to identify the extent of BFHI implementation in Australia and the impact on breastfeeding is required urgently to provide policy makers with evidence on which to base specific recommendations and facilitate governmental support for women to achieve their breastfeeding goals.

In summary

This chapter presented a critical narrative review of the published evidence in support of the BFHI. A direct causal effect has not been established however known evidence about the positive health benefits of increased breastfeeding at a population level suggests that BFHI implementation and accreditation could be a desirable strategy for committed health facilities.

However, determining the impact of the BFHI both globally and in the Australian setting is complex. This critical narrative review revealed a number of barriers to the BFHI in Australia suggesting a disconnect between the growing evidence base and current clinical practice. The strategy has struggled to gain traction in Australia and similar to infant feeding decisions the reasons are varied, complex and contextual. Women's experiences of support and perception of 'success' are interrelated with the practices of maternity facilities and health professionals. Local, regional and population-based studies have demonstrated that where the BFHI is well integrated a measurable increase in

breastfeeding prevalence, indicating a positive association exists. It is difficult to accurately measure breastfeeding prevalence without a clear ongoing reporting system and an ongoing national monitoring system is absent. There is a lack of uniformity in the BFHI's uptake suggesting a barrier exists in the transfer of knowledge and evidence into clinical practice. Questions asking how and why are very applicable to this situation.

Examining where and how barriers are occurring in the gap between evidence and practice is the logical next step. Chapter Four introduces the theoretical underpinnings of the study, namely the conceptual framework and describes the underlying theory of the methodology chosen to answer the questions that arose from the critical literature review.

4 Theoretical Underpinnings: a conceptual model using Knowledge Translation theory

Overview

This chapter identifies and describes a theory and conceptual model to inform the research study. A conceptual model using Knowledge Translation theory is presented. It provides a structured framework for the translation of knowledge into the Australian health care system and midwifery practice with regards BFHI implementation and accreditation. The paper, as published, is transcribed below with a copy also located in Appendix Number Nine, all references are included in the thesis bibliography.

***Peer reviewed paper #3*: Applying a Knowledge Translation model to the uptake of the Baby Friendly Health Initiative in the Australian health care system**
Atchan, M., Davis, D. & Foureur, M. 2014, *Women and Birth*, vol. 27, pp. 79-85.
http://dx.doi.org/10.1016/j.wombi.2014.03.001

4.1 Introduction

Protecting, promoting and supporting breastfeeding is an important public health strategy. There is international evidence that implementation of the global strategy known as the Baby Friendly Hospital Initiative and accreditation of maternity facilities as 'baby friendly' has positively influenced breastfeeding initiation and short-term duration (Abrahams & Labbok 2009; Bartington et al. 2006).

In Australia, the Initiative changed its name in 2006 to demonstrate its inclusion of the community and is now known as the Baby Friendly Health Initiative (BFHI). Implementation of the Initiative in maternity facilities has been variable indicating an evidence-practice gap at all levels of the health care system. Although the Initiative is supported 'in principle' in Australia, studies have identified organisational and cultural barriers to implementation (Walsh, Pincombe & Henderson 2011). Barriers include a lack of policy support and funding as well as a misunderstanding of the aims and outcomes of the Initiative. This theoretical paper seeks to provide a model for understanding the issues influencing the translation of knowledge into the Australian health care system and midwifery practice with regards to BFHI implementation.

This paper is organised in four sections. A brief description of the BFHI and the evidence supporting its implementation is presented, namely the positive association between the Initiative's practices and breastfeeding prevalence. The BFHI is then situated in the

Australian context. Knowledge Translation Theory is proposed as a means of understanding the issues that influence the translation of knowledge into practice in healthcare. Finally, an adaptation of a Knowledge Translation conceptual framework (Glasziou & Haynes 2005), which also considers the process of change management is utilised to explore issues that influence the translation of evidence underpinning the BFHI into the Australian healthcare system and midwifery practice. Recommendations in the form of specific targeted strategies to facilitate knowledge transfer and supportive practices into the health care system and current midwifery practice are included.

4.2 The evidence supporting the implementation of the BFHI

The BFHI is a multifaceted intervention. *The Ten Steps to Successful Breastfeeding* (Baby Friendly Health Initiative 2016b) are intended to present the complexities of the strategy in a simple, easy to understand format. Each *"Step"* comprises a minimum quality standard to achieve and maintain. Full implementation is designed to provide a framework for clinical practice and enable a breastfeeding culture in maternity facilities. The expectation is that hospital policies that do not support breastfeeding are replaced with evidence-based strategies to promote best practice and facilitate maternal informed infant feeding decision-making and practices. The anticipated result is an increase in breastfeeding and breastfeeding-related health outcomes at a local and national level.

Impact studies to demonstrate the effectiveness of the Initiative have been undertaken internationally at population, national and local levels. There are a number of complexities in researching infant feeding. The sum of research findings however provides enough weight of evidence to strongly suggest an ongoing positive relationship between the Initiative, changes in practice and breastfeeding prevalence (Atchan, Davis & Foureur 2013). When added to the well documented health outcomes BFHI implementation and accreditation is a desirable strategy for policy makers and health service managers to actively pursue and implement.

The evidence supporting the benefits of implementing the BFHI has been drawn from a single large randomised controlled trial (the PROBIT study). The PROBIT study (Kramer et al. 2001) minimised multiple sources of potential bias to provide robust evidence of the impact of the Initiative with follow-up data on breastfeeding and health outcomes. This study, together with two large systematic reviews and meta-analyses of many small, individual studies of breastfeeding have established there are clinically and statistically significant health benefits for breastfeeding (Ip et al. 2007; Renfrew et al. 2012).

The World Health Organization (WHO) has made strong recommendations for exclusive breastfeeding for the first six months of life followed by continued breastfeeding (with the

addition of nutritious family foods) until well into the second year or beyond (World Health Organization 2003). In Australia, despite national health policy endorsement (National Health and Medical Research Council 2012) the WHO recommendations are not being met (Australian Institute of Health and Welfare 2011). One reason may be that commercially produced artificial baby milks have been identified as being an attractive or at least a comparable alternative to breastfeeding. The marketing practices of the breastmilk substitute industry promote and maintain a high public opinion of their products (Berry, Jones & Iverson 2009) and encourage uncritical acceptance of their health statements (Stang, Hoss & Story 2010; Tarrant et al. 2011). Therefore, the efficacy of the voluntary regulation to protect breastfeeding that currently exists in Australia is questionable (Smith & Blake 2013). Since infant feeding is highly emotive and contextualised for each woman and her family, women turn to midwives for advice and support with their decisions and practice. However, it is clear that midwives are also subject to situational influences. It is within this context that the Baby Friendly Health Initiative in Australia is operationalized.

4.3 The Baby Friendly Health Initiative in Australia

The Initiative in Australia is supported 'in principle' at a national level (National Health and Medical Research Council 2012). BFHI implementation is also encouraged through its inclusion in health policy in several states. Similar to other middle and high-income nations (Philipp & Radford 2006) accreditation of Australian facilities has been protracted and implementation varied. Currently 74 or approximately 19% of the 394 maternity facilities in Australia are accredited as 'baby friendly' (Baby Friendly Health Initiative 2013).[2] The number of maternity facilities applying for re-accreditation appears to outnumber those seeking accreditation for the first time.

Currently it is not possible to determine the extent to which a consistent standard of BFHI practices is provided across Australia, irrespective of accreditation status (Walsh, Pincombe & Stamp 2006). Published data on implementation are found in the Victorian maternity service performance indicators (Department of Health 2012). The internal audit process and report indicates a high level of implementation is achieved in the majority of Victorian maternity facilities. If researchers, policy makers and health service managers are unable to determine the degree of impact of the BFHI in Australia this may further hamper its uptake. What is apparent is the existence of a gap between the international

[2] Note: in 2014 when this paper was published the ACM used data from AIHW's *Australia's mothers and babies 2009* to determine the number of maternity facilities. Since 2016 the ACM has used data from an alternate, more accurate AIHW source, please refer to Tables 1 and 18.

evidence supporting the Initiative's implementation and its integration into Australian practice. In order to increase our understanding of why the gap exists and how to address it the following section examines the problems associated with, and barriers to, the translation of evidence into practice.

4.4 How does evidence translate into practice in healthcare settings?

The aim of evidence-based practice is to provide clinicians and patients with choices about the most effective care based on the best available evidence. However, a gap exists between acquired knowledge and actual practice. The progress of adopting evidence-based therapies and implementation of guidelines has been described as both slow and random (Davis et al. 2003). Results of the ensuing gap are poorer health outcomes, health inequalities and wasted time and money (Ward, House & Hamer 2009). Both time and resources have been invested in studies attempting to ascertain why the introduction of new technologies and practices are not readily integrated into the practice of most workers (Kitson 2008). To successfully introduce a new innovation that involves practice change, strategies that address both organisational and individual concerns are required. Common and effective interventions used to support change in midwifery practice must include active participation, goal setting and planning for change (Russell & Walsh 2009): regrettably there is still a paucity of research in the field. We propose that the theory of knowledge translation can provide valuable assistance and insight into understanding the change process and change management.

There are multiple terms in the literature to describe all or part of the concept of the knowledge translation process (Graham et al. 2006) causing confusion to both researchers and users of knowledge. Knowledge translation is about creating, transferring and transforming knowledge from one social or organisational 'unit' to another; it is an intricate, interactive process that depends on human beings and their context (Landry et al. 2006). The knowledge translation process is the promotion of practice-based behaviour building on evidence-based research. It concerns health outcomes and changing behaviour, focussing on all possible healthcare participants. International studies reveal the importance of identifying and working to the strengths of all potential stakeholders to achieve 'synergy' in the knowledge translation process and overcome challenges (Nabyonga et al. 2013). The knowledge translation process is particularly useful for population health, an area within which infant feeding decisions and practices and the BFHI squarely sit, and health outcome gaps have already been documented.

It is beyond the scope of this paper to discuss the full range of knowledge translation models depicted in the literature (Estabrooks et al. 2006; Rogers 2003) however one that

appears to be useful is the research to practice 'pipeline' (Glasziou & Haynes 2005). The strength of this model is that it provides a simple but clearly structured method to systematically review barriers to the use of evidence. As with all models it has limitations that require discussion to evaluate applicability. The unidirectional, linear knowledge transfer flow (Ward, House & Hamer 2009) would appear to be at odds with the innovation journey, described elsewhere as a non-linear and unruly process (Ferlie et al. 2005). On face value, the pipeline model does not appear to take into account the complexity of human nature and the challenges of effecting change. However, if the model is interpreted with these limitations in mind it is possible to examine the issues in greater depth. It is a practical model to identify influences on midwifery practice that may influence BFHI implementation and accreditation.

An early model of the research to practice pipeline (Pathman et al. 1996) utilised a medical paradigm to describe the cognitive and behavioural steps physicians take when they comply with clinical practice guidelines, namely the movement from awareness of, to taking action on evidence. The model was further developed conceptually (Glasziou & Haynes 2005) with extra elements added. The extra elements were the cognitive and behavioural steps the patient or consumer of health care takes when complying with medical recommendations. These processes are shown in Figure 6:

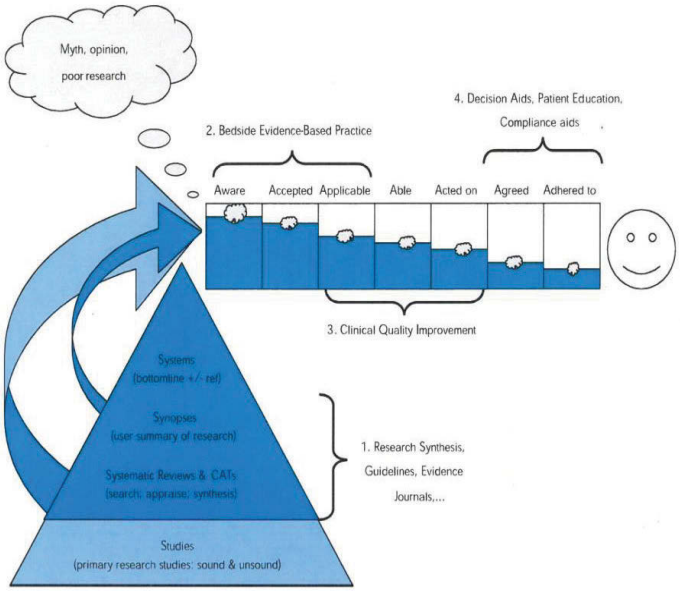


FIGURE 6: THE RESEARCH TO PRACTICE PIPELINE (REPRODUCED WITH PERMISSION)
Source: (Glasziou & Haynes 2005)

The original authors of the pipeline model asserted that new knowledge in the form of original or translated research is constantly being generated but not necessarily entering practice in a timely manner to produce improved health outcomes (Glasziou & Haynes 2005). The authors identified five stages clinicians (in this case meaning doctors) go through in translating knowledge into action before advice is given (to a patient): awareness, acceptance, applicability, ability and acted upon. The major assumption of the model itself is that at each stage from awareness to adherence there is 'leakage' or decrease in uptake, resulting in a reduction in the transfer of knowledge and action between implementation stages. Consequently, the patient or clinical outcome impact may be very low and health outcomes are less positive than originally expected. The model has previously been used as a means to discuss the barriers in implementing breastfeeding evidence in general, with suggestions included for practice improvement (Brodribb 2011). The pipeline model has also been used to promote discussion about effective ways of tracing and identifying the impact of evidence and its implementation (Wimpenny et al. 2008).

The pipeline model can be adapted to other populations or professional groups quite easily. We propose that this model has significant applicability in identifying the issues that impact on the uptake of the Baby Friendly Health Initiative by midwives and maternity service managers in Australia. To illustrate its applicability the model has been situated within a midwifery context. It describes the behavioural and cognitive steps taken by both health service management and clinical midwives in translating evidence into practice. The final two cognitive and behavioural steps are situated in the context of the consumer; in this case the women who access the service. These processes are shown in Figure 7:

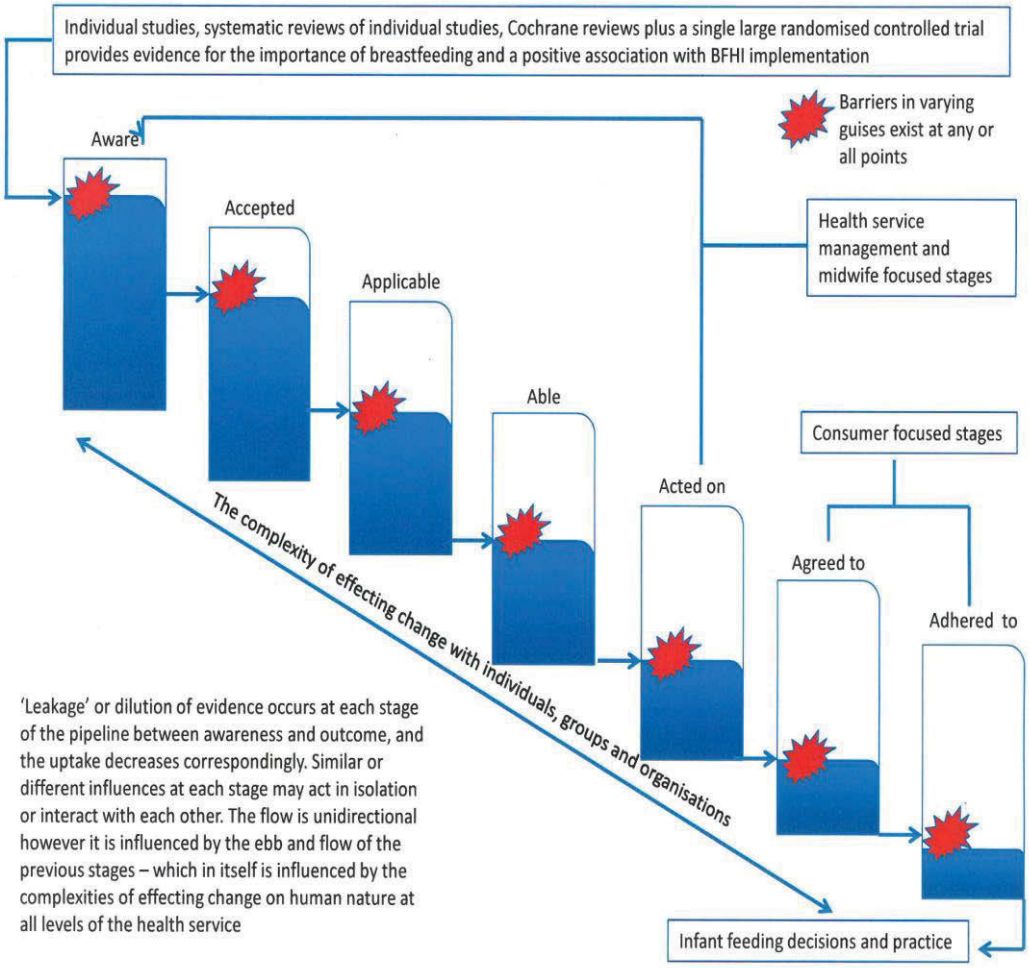


FIGURE 7:THE BFHI RESEARCH TO PRACTICE PIPELINE MODEL (ADAPTED BY FIRST AUTHOR)

Compared to the international literature there are relatively few studies pertaining to the BFHI in Australia however the findings are consistent cross nationally. The following section utilises the adapted pipeline model (illustrated above) to identify issues that may be relevant to midwifery practice and the low uptake of the Initiative at all levels within the Australian healthcare system. Recommendations that could potentially increase the uptake of evidence are also provided for consideration.

4.5 Issues impacting on the implementation of the BFHI in the Australian context

4.5.1 Awareness (of relevant, valid research by the midwife)

Research clearly demonstrates the importance and positive health outcomes of breastfeeding and practices supportive of breastfeeding as demonstrated in the BFHI standards. Therefore, midwives' awareness of contemporary, relevant and accurate research is the first large hurdle in the flow of evidence through the pipeline. Midwives are

expected to be involved in research and education as part of their competency requirements (Nicholls & Webb 2006). There are a number of systematic reviews and clinical guidelines developed to assist and inform practice. Nevertheless, for a variety of contextual reasons it can be a challenge for many midwives to remain current in their practice.

The structure of published research is important in assisting midwives to increase knowledge and inform practice. It is globally accepted that the breastfeeding of infants and young children is optimal and the desired standard. The changes in and changes resulting from breastfeeding practice and international strategies have long been chronicled for midwives' reflection (Dykes 2011) and critical changes in practice have been noted. However, midwives need to seek a wide range of knowledge to support practice.

In the broader health care arena, it has been proposed that an odds ratio model be used on research published on preventable infant conditions (McNiel, Labbok & Abrahams 2010). This type of information message uses 'loss framing' rather than 'gain framing' (Edwards et al. 2001); for increased effectiveness, the risk of not breastfeeding rather than the benefit of breastfeeding is emphasised. In Australia, the risks of commercially produced artificial baby milk use at a population health level have been identified (Smith & Harvey 2011) using this language to convey risk information. Using the same framing method Smith and colleagues reviewed the titles and abstracts of 78 scientific studies of health impacts of breastfeeding versus formula feeding (Smith, Dunstone & Elliott-Rudder 2009). Only 4% made a clear reference to health risks and infant formula in the title. Two thirds were neutral statements and one third misleadingly associated breastfeeding with illness or disease. Of the abstracts 11% clearly communicated an association between artificial infant feeding and increased risk of illness. Seventeen percent used the terms "advantages of breastfeeding" while seventy-two percent made no mention of formula or did not compare formula feeding to breastfeeding other than when describing the method. Using a revised risk ratio model will further highlight the risks of formula feeding rather than the 'benefits of breastfeeding' in the minds of health care providers resulting in increased encouragement of exclusive breastfeeding.

Australian midwives' general level of knowledge and management about practices supporting BFHI implementation has also been studied (Cantrill, Creedy & Cooke 2004). Results indicated Step 4 of the *Ten Steps to Successful Breastfeeding* (Baby Friendly Health Initiative 2013a), which promotes immediate and prolonged skin to skin contact after birth, was not clearly understood or well-practised. The responses of over a third of the sample demonstrated poor practice suggesting the research findings that guide this

practice were not known or not accepted by many of the midwives. To date midwives' understanding of the evidence underpinning the *"Ten Steps"* has not been studied.

Recommendation: Facilitate midwives' knowledge and capacity to access and appraise research findings to optimise care provision.

To assist with capacity building: (a) conduct an evaluation of midwives' current knowledge and understanding of BFHI and the underpinning evidence; (b) encourage, lobby, facilitate and support health researchers to analyse, review and publish current and future evidence with clear operational definitions and breastmilk/breastfeeding as the standard and (c) encourage publication of a document that provides an update of the evidence for the *Ten Steps to Successful Breastfeeding*.

Capacity building will increase Australian midwives' breastfeeding knowledge, their awareness of the BFHI's principles and philosophy and potentially facilitate the next stage, acceptance.

4.5.2 Acceptance (of the evidence by the midwife and or health manager)

Within the healthcare system the impact of the degree of midwifery acceptance of the Initiative is demonstrated through practice. For any number of reasons, both personal and or organisational, midwives may choose to maintain familiar practices regardless of knowledge and experience with BFHI practice standards. In Australia, there is a discrepancy between BFHI philosophy and practice. Australian midwives have identified using divergent practices despite working in a facility supporting the BFHI (Schmeid et al. 2011) or in an organisation committed to maintaining BFHI standards (Reddin, Pincombe & Darbyshire 2007).

The BFHI has prescriptive elements that require 'hard evidence' to demonstrate uptake, compliance and organisational change. The organisation may decide not to provide resources to audit practice and collect the evidence required. The individual midwife may perceive practice change as being irrevocably linked to procedure adoption rather than behavioural adaptation. Furthermore, without sustained attention and assistance via inspirational leadership, change may be difficult to achieve and maintain.

***Recommendation*:** Support change management at a local level.

To facilitate effective change, appoint a dedicated BFHI coordinator or team to act as change agents. The identification, use of and organisational support of champions at all levels will facilitate acceptance and influence the perception of applicability across the health service in the Australian setting.

4.5.3 Applicable (to the maternity service and the midwife's practice)

Arguably, a variation exists in the interest and number of *"Steps"* implemented in non-BFHI accredited facilities across the country. This suggests that multi-level barriers may exist. One barrier could be a perception that the resource allocation outweighs the benefit (Philipp & Radford 2006) although this has not been confirmed by any Australian cost analysis. If the healthcare facility does not identify any, or supports only limited applicability of the BFHI within their organisation and practice it may also be difficult for midwives to perceive value and act as champions to effect change. A key finding of an examination of maternity staff attitudes towards implementing the BFHI in Australia (Walsh, Pincombe & Henderson 2011) found that "BFHI is valued by those who use it and misunderstood by those who do not" (p.606). Furthermore, similar to other studies on knowledge translation and health policy (Nabyonga et al. 2013), stakeholders may choose to ignore evidence they regard as unconvincing.

Recommendation: Identify the specifics of the investment required to create an enabling environment for breastfeeding and BFHI implementation.

To detail the investment: (a) conduct and publish a cost analysis of the package of interventions that supports breastfeeding in Australia and (b) encourage administrators to include and /or maintain BFHI implementation as part of their suite of maternity performance indicators and regularly report on them to provide comparability across states and territories.

Include the BFHI in the costing analysis and compare not only the financial outlay required by facilities to achieve and maintain accreditation but also the expected outcomes and health care savings that will demonstrate cost recovery. The recently released *IBFAN World Breastfeeding Costing Initiative Report* (Holla et al. 2013) includes a tool that may be helpful as it is designed to support project coordinators and personnel in preparation of project budgets and undertaking costing analyses. This costing will provide health service managers with accurate data to use to create an environment that supports women to breastfeed and midwives to provide optimal care. When cost is weighed against the potential healthcare savings resource allocation may be more achievable.

4.5.4 Ability (of resources and ability to carry out the intervention in the maternity services context)

Funding has not been attached to the national endorsement of BFHI implementation, nor to most states and territories. Australian managers have identified the lack of funding as a significant impediment (Walsh, Pincombe & Henderson 2011). An independent government inquiry into breastfeeding in Australia (Commonwealth of Australia 2007)

recommended significant funding enhancement for the Initiative; this recommendation was noted but not actioned (Commonwealth of Australia 2008).

At a clinical level, Australian midwives may have concerns about their ability to provide effective breastfeeding support if they have received little formal or only incidental training. For many midwives, most or part of their knowledge has been gained from personal experience or 'on the job' (Cantrill, Creedy & Cooke 2003). To carry out evidence-based interventions (such as the BFHI) knowledge and training is required, with supportive underpinning guidelines. Staff education is the central component of the BFHI programme and only with well-trained staff can necessary practice changes be made (Philipp & Radford 2006). International studies have demonstrated that guidelines will not usually affect a change in practice unless they are supported by other strategies, such as interactive education programs to increase confidence (Spilby et al. 2009).

***Recommendation*:** Access economic resourcing to enhance practice and further build capacity.

To access economic resourcing: (a) complete a comprehensive analysis that clearly details one-time and recurring costs; (b) lobby policymakers and funding bodies to allocate and release the necessary funds and (c) identify the existence of current, relevant and freely available resources and programs to offset the initial outlay.

At a local level, it will be important to identify the barriers to organisational and attitudinal change prior to commencing any program. This will increase the effectiveness of the education intervention and further facilitate change (Russell & Walsh 2009b). In this case the midwife will feel more confident to practice different behaviours.

4.5.5 Acted upon (by the health care system and the midwife)

Implementing BFHI strategies may be challenging, if an altered philosophy and changes in practice are required. Maintaining the changes in practice may challenge the midwife's newly learnt skills and self-confidence might falter. The midwife's capacities to act upon the new skills acquired and provide accurate advice and support could then be compromised. The transformation of behaviour/change in practice is also influenced by the physiological way the brain accepts or resists change (Rock & Schwartz 2006). To put new behaviours into place, entrenched attitudes need to be reframed (Schwarz, Gaito & Lennick 2011). The acceptance of the importance of breastfeeding and breastfeeding support is an essential prerequisite for acting on the practice changes accompanying BFHI implementation at an individual and organisational level.

Finally, the midwife needs to be able to implement the practice. There are numerous pressures on the health care system and the prevailing organisational culture may not always be supportive. In international studies midwives have stated their ability to individualise care is hampered by a shortage of time resulting from lack of staff or a lack of skilled staff (Dykes 2005; McInnes & Chambers 2008). Australian studies (Reddin, Pincombe & Darbyshire 2007) support these findings; the outcome being that BFHI practices are potentially only complied with if time and workload allow.

Recommendation: Refocus postnatal care provision to more effectively support women.

To refocus postnatal care provision: (a) implement a clinical redesign of the organisation of models of care to be woman-centred rather than structured around organisational requirements and (b) provide supportive and inspirational managerial practices to facilitate and model effective and sustained change management.

The organisation and structure of hospital-based postnatal services in Victoria has identified a number of barriers to postnatal care provision (McLachlan et al. 2008). A supported clinical redesign may provide consistency, timeliness, accuracy and efficacy of advice and assistance. Women will ideally have a more 'authentic' breastfeeding experience (Hauck et al. 2011). Managerial plus peer support is required to encourage and assist individual midwives to model BFHI supportive practices that focus on the individual woman's needs.

The two further stages described in the pipeline model are attributes of the patients/clients/consumers of maternity service i.e. women and their families: a*greeing to* and *adhering to*. Glasziou and Haynes (2005) assert that the consumer similarly moves through the above stages (from 'awareness' to 'acted upon') before agreeing to and adhering to a health professional's recommendation. It is beyond the scope of this paper to discuss these final two stages in detail. A woman's infant feeding decisions and practices are affected by the degree of accurate and timely information, support and assistance she receives.

4.6 Conclusion

This paper has identified issues pertinent to the Australian health care system, maternity facilities and midwives that influence the protection, promotion and support of breastfeeding, which is embedded in the implementation and accreditation of the Baby Friendly Health Initiative. A lack of awareness and understanding of the Initiative has been demonstrated at an individual practice and organisational level. Acceptance of the

underpinning evidence is influenced by policy makers, health service management, the midwife's personal belief system and desire for practice change. Applicability is also affected by the midwife's perception of how his/her practice will be affected. It is further dependent on managers' beliefs in the applicability of the Initiative to their organisation and stakeholders. Organisational and clinical leadership is required to implement change. To maintain a sustained change in professional practice behaviours, the midwife requires both ability and resources equal to the situation including clinical support and education.

The pipeline model has been demonstrated as useful in examining where and how barriers occur in the gap between evidence and practice in the uptake of the BFHI in Australia. It is a worthwhile model to use in identifying issues relevant to midwives' translation of knowledge into practice. The model is also beneficial in examining the relationship between knowledge translation and the progress of BFHI implementation and accreditation in Australia.

It is apparent there is an overlap of issues within the various stages and a common thread is the complexity of change management. One of the strengths of the model is that it highlights the different stages where impact could occur. The degree of uptake resulting in translation at each stage can be further investigated so that transfer can be examined, traced and optimised through the use of effective intervention strategies.

Unfortunately, Glasziou and Haynes (2005) did not shed any light on a way forward other than to state "evidence-based practices should not just be concerned with clinical content but also with the processes of changing care and systems of care" (p.38). Changing care and systems of care also needs to be concerned with the effective management of change, at an individual practice level and across organisations. The BFHI is a multifaceted intervention. It operates within a framework where the attributes of society, culture and economy exert an influence on the midwife and woman's philosophies and practices.

Each stage in the pipeline warrants further individual study and testing of interventions. Suggestions for strategies to influence policy, organisational and attitudinal change have been included, with some overlap included to compensate for the potential of change in one component at one stage of the pipeline leading to a loss of uptake in another stage further down. In an economic climate where vying for decreasing amounts of health funding grows ever more competitive the evidence to influence the translation of knowledge into practice needs to be compelling and convincing to all stakeholders. For the Baby Friendly Health Initiative to have an assessable impact in the Australian health care setting it needs to be accepted, endorsed, implemented and sustained by a wide range of stakeholders at an individual, organisational and health system level.

In summary

This chapter presented the theoretical underpinnings to the study. Firstly, a theory to inform the research study being undertaken was proposed. Knowledge translation theory and a conceptual model, the research to practice pipeline, examined the identified barriers to BFHI implementation in Australia. Australian and international studies reveal similar findings, which act as either enabling factors or barriers to knowledge translation. Appropriate, accurate and timely support from health professionals was also identified as highly desirable in the critical narrative review presented in Chapter Three. The pipeline model was able to identify gaps in practice. Targeted strategies presented as recommendations will facilitate knowledge transfer and supportive practices to promote a positive experience and increase women's sense of satisfaction with their care. Research questions developed in the early stages of this study asked 'how' it was that the BFHI in Australia had a lack of uptake within the health system. Questions that ask 'how' and 'why' readily lend themselves to an investigative method and a case study research approach was chosen. Chapter Five presents the first of two chapters that discusses the methodological aspects: an exploration and application of case study research in midwifery.

5 The Methodological Approach: Case Study Research

Overview

The purpose of this study is to explore factors that have impacted on the dissemination of the BFHI in Australia. Qualitative research and a constructivist paradigm were considered a useful means to address this purpose. A case study research approach was identified as the most appropriate methodology to use. This chapter provides the rationale for the use of case study as a method, through a systematic review of the application of case study in midwifery research.

5.1 Overview of the theoretical underpinnings of the chosen paradigm and methodology

A qualitative research approach and constructivist paradigm afford an opportunity to capture and give voice to socially constructed documentary evidence and the experiences and perceptions of a broad array of key informants who had an association with the BFHI in Australia at one or more time points since its introduction in 1992 to the present.

Case study research requires the collection of multiple forms of data, that is then analysed and triangulated to provide an in-depth understanding of the case. Collecting different types of empirical data across multiple time periods facilitates triangulation (Woodside 2010; Yin 2014). Triangulation is necessary to promote deep understanding of the issues and increase researchers' confidence in their findings. Conclusions are formed about the overall meaning of the case and general lessons learned (Creswell, 2013).

5.1.1 Rationale for the constructivist paradigm

Researchers need to have an awareness of the beliefs and philosophical assumptions they bring to their research and show how they are embedded within an interpretive framework or paradigm. This research study is informed by a constructivism (interpretivist) paradigm (Creswell, 2013). Constructivism offers an opportunity to examine and understand the 'labyrinth' of human experience (Appleton & King, 2002). The constructivist argument rejects the assumption that the mind simply reflects what is 'out there' (Schwandt, 2007). Knowledge is not objective, it is not 'found' or 'discovered' nor is it constructed in isolation. Knowledge is constructed as part of a shared social experience. A constructivist paradigm provides a philosophically robust framework to explore the experiences of key informants and analyse existing texts to address the purpose and aims of this study.

5.1.2 The case study research approach

Research is defined as a rigorous, systematic investigation of a phenomenon or issue of interest which generates new knowledge or adds to the existing body of knowledge (Axford et al., 2004). 'Systematic' is a key element of the definition as it indicates that careful preparation, planning, organisation and critical evaluation should be embedded into the research process. New and refined knowledge informs midwifery practice and validates best practice for healthcare delivery (Fahy, 2005). Research methods that aim to generate new or refined midwifery knowledge use quantitative, qualitative or mixed methods depending on the nature of the research question (Yin, 2014). The actual suitability of a research method derives from the nature of the social phenomena to be explored, in this instance the demonstration of support for breastfeeding in Australia through the implementation and dissemination of a global health programme in a national setting.

Case study research has been identified as a suitable approach for healthcare disciplines involving people and programs for a number of decades (Stake, 1995). It is helpful to conceptualise case study research as an approach rather than a methodology (Rosenberg & Yates, 2007) as the methods used are pragmatically rather than paradigmatically driven and typically the researcher utilises multiple sources of data to capture this complexity. Case study design was chosen for this study to examine the issue of interest from multiple angles and best answer the 'why' and 'how' research questions (Yin, 2014).

When exploring the use of case study research's suitability for this study, a gap in the midwifery literature was identified. The published paper that follows contains a review of the use of case study research in midwifery. The review establishes a rationale for the suitability of case study as an appropriate approach to answer the study's research questions. The paper, as published, is transcribed below with a copy also located in Appendix Number Ten, all references are included in the thesis bibliography.

Peer reviewed paper #4: A methodological review of qualitative case study methodology in midwifery research

Atchan, M., Davis, D. & Foureur, M. 2016, *Journal of Advanced Nursing*, vol. 72, no. 10, pp. 2259-71. doi: 10.1111/jan12946

5.2 Introduction

Midwifery research is a rapidly growing global field with a range of qualitative and quantitative studies. Epidemiological methods and randomised controlled trials (RCT) are used due to an interest in 'cause and effect' and implications for clinical practice. However, when the evidence-based intervention is applied the findings may not translate into practice in the real world (Glasziou & Haynes 2005; Woolf 2008). The well-regarded RCT is insufficient to answer all types of research questions (Mackenzie et al. 2010), particularly with complicated health care problems (Blackwood, O'Halloran & Porter 2010). The focus of qualitative research is on experience and the ways the everyday world is understood and interpreted (Jirojwong & Welch 2011). Qualitative research assists the evaluation of 'complex interventions' (Craig et al. 2008) by providing an in-depth understanding of human behaviour.

Case study research (CSR) enhances the understanding of complex contextual/cultural/behavioural factors (Stake 1995; Yin 2014) through its deep and multi-faceted examination of the issue of concern. CSR may influence the translation of knowledge into practice. CSR's potential does not appear to have been realised in midwifery research. A gap in the English-speaking literature was identified with apparently fewer studies using CSR in midwifery than in nursing. This paper presents a methodological review of midwifery context CSR.

The review process is informed by previous work in the CSR field in nursing (Anthony & Jack 2009), using a specific analysis framework (Whittemore & Knafl 2005). The framework's advantage is the inclusion of strategies to enhance rigour. The review seeks to explore the use and application of case study research in midwifery. The purpose of the review is to analyse the application, strengths and limitations of midwifery case study methods. The results will be useful to midwives contemplating the use of CSR by providing information on how to design, conduct and report methodologically strong studies.

5.3 Background

While CSR first appeared around 1900 in the discipline of anthropology (Yin 2014) its profile in textbooks didn't become visible until after the 1980s (Merriam 2009). Different CSR approaches have been employed and its interpretation has caused confusion (Woodside 2010), which may have contributed to the low profile in midwifery. Table 4

briefly describes different 'types' of case study that have been proposed by authors in the CSR field, demonstrating its flexibility as a research approach.

TABLE 4: TYPOLOGY OF 'TYPES' OF CASES DESCRIBED IN THE LITERATURE
Sources: (Bogdan & Biklen 2007; Merriam 2009; Stake 1995; Yin 2014)

'Type' of case study	Explanation
Collective:	Also known as cross-case, multi-case, multisite or comparative case studies, conducting a study using more than one case to investigate a population or general condition increases external validity and generalisability of findings
Descriptive:	Description of the phenomenon in rich detail to provide a literal portrayal of the incident or entity
Explanatory:	Explains aspects and causal arguments identified by the descriptive research
Exploratory:	Debates the value of further research, suggesting various hypotheses
Evaluative:	Description and explanation of the phenomenon clarifies meaning and communicates implied knowledge, weighing information to produce judgement
Historical:	A phenomenon studied over a period of time, for example the development of an organisation
Intrinsic:	Where the researcher holds a special interest in the particular case
Instrumental:	When the case is used to explain or provide insight into an issue or redraw a generalisation – the case facilitates the understanding of something else
Observational:	Focusing on a whole or particular part of an organisation primarily using observation to deepen understanding

The case study report is a detailed narrative. It is a story with a beginning, middle and end that is written to suit the intended audience. The report must detail the literature review and methodology; demonstrate the significance of the study and its findings while providing alternative perspectives that enable the reader to draw their own conclusions (Yin 2014). An integrative review by Anthony & Jack (2009) informed the use of CSR in nursing. A range of researchers used CSR to further develop nursing knowledge, with the authors identifying 42 published papers over a 30-month period (January 2005 to June 2007). Categorical analysis of the literature revealed nine classifications including 'family/maternal child'. Two of the papers in this category were clearly midwifery-context studies (Hindin 2006; Sittner, DeFrain & Hudson 2005). A gap in the literature was apparent with far fewer studies using CSR in midwifery research than in nursing.

Some places view nursing and midwifery as the same profession. Major changes have occurred in both professions over the last 30 years and midwifery is now considered a discrete entity (Pairman & Donnellan-Fernandez 2015), with Australia recommending regulatory changes to its National Law (Snowball 2014). Either way applied health research aims to improve outcomes in midwifery and for women. Of course, nursing and midwifery are complementary professions, sharing a health promotion philosophy, health skills and knowledge and a belief in consumer rights. Midwifery uses a wellness paradigm and a woman-centred approach to care provision within a clearly defined scope of practice (Nursing and Midwifery Board of Australia 2010). The wide-ranging benefits of midwifery models of care have also been demonstrated by a recent Cochrane review (Sandall et al. 2013). The fundamental differences in the practice areas means midwifery context research may be more useful to midwife researchers. Midwifery research is relatively 'young', rising from a challenge to improve maternity care (Farley 2005) and continues to create its own identity. Midwifery has steadily built up research capacity (Brodie & Barclay 2001; Nicholls & Webb 2006). The necessity of a research agenda was recognised (Kennedy, Schuiling & Murphy 2007) and priorities for midwives continue to be identified (Jordan, Slavin & Fenwick 2013), in part as "the future of the midwifery profession is reliant on building research leaders" (Hauck et al. 2015 p. 263).

It is interesting therefore to examine CSR's profile in midwifery research. Research questions that ask 'how' and 'why' are well suited to CSR (Yin 2014) because they deal with the lived experience and provide breadth and depth, as opposed to frequencies or incidence. This methodological review sought to explore the extent of CSR in contemporary midwifery literature and examine its usefulness for further research. The next section details the methodological review and outlines the process used.

5.4 The Review

5.4.1 Aim

The aim of this methodological review is to conduct an analysis of the contemporary literature on qualitative case study research in midwifery. Anthony and Jack's (2009) review offered a useful template. Clearly worded research questions are an important feature of methodological reviews, reflecting the problem and purpose (Whittemore & Knafl 2005). The research questions guiding this review are as follows:

1. Where has CSR been used in midwifery research?
2. Why has CSR been used in midwifery research?
3. How has CSR been used in midwifery research?
4. How has midwifery CSR been reported in the literature?

5.4.2 Design

The methodological review provides a narrative summary of the literature on a specific concept or content area. The review has the potential to comprehensively portray complex concepts, theories or healthcare problems, contribute to theory development as well as being applicable to practice and policy (Whittemore & Knafl 2005). A detailed approach to critically review and analyse the designs and methods of a series of studies is used (Whittemore 2005). The review process follows recognised steps: identifying and defining the problem, searching for literature, extracting the data, critically analysing the studies, discussing the results and presenting the findings (de Souza, da Silva & de Carvalho 2010). Published midwifery context methodological reviews include: complementary alternate medicines (Adams et al. 2011); choice around the place of childbirth (Hadjigeorgiou et al. 2012); professional issues (Nicholls & Webb 2006) and implementing the Baby-Friendly Initiative (Seminic et al. 2012). There is no single agreed framework however to assist with systematically reviewing the qualitative and quantitative evidence. One framework, the *quantitative case survey method* (Mays, Pope & Popay 2005; Yin & Heald 1975) uses a set of structured questions to extract data from each paper. In this instance data includes the nature of the case study, design, methods and findings. Qualitative data is converted into a numerical form to be quantified either in a frequency count or binary form and to aid systematic comparison. Papers in the review were then grouped according to assessment of overall methodological limitations present, namely high, medium or low.

5.4.3 Search method

A thorough electronic search of databases where midwifery context literature is published was undertaken using a date range of January 2005 - December 2014. The databases searched were: Maternal and Infant Care, CINAHL Plus, Academic Search Complete, Web of Knowledge, SCOPUS, Medline, Health Collection (Informit), Cochrane Library Health Source: Nursing/Academic Edition, Wiley online and ProQuest Central. Search terms included various combinations of the following keywords/subject terms: case stud*, midwi*, matern* care, maternity nurse, nurse-midwi*, method*, qualitative research, research. Reviewing the reference list of accessed papers (ancestry searching) was also attended, as was a review of the 'in press' section of a popular international midwifery journal (Midwifery http://www.journals.elsevier.com/midwifery/, 2015). Using more than one type of searching strategy reduces the potential for an incomplete or biased search and improves rigour (Whittemore & Knafl 2005).

5.4.4 Search Outcome

The flowchart of the literature search process is outlined in Figure 8. Carefully considered inclusion/exclusion criteria to ensure the sample was specifically applicable to midwifery

CSR (Table 5) were used to assess and review the data. Duplicate publications were identified and a total of 489 papers were excluded.

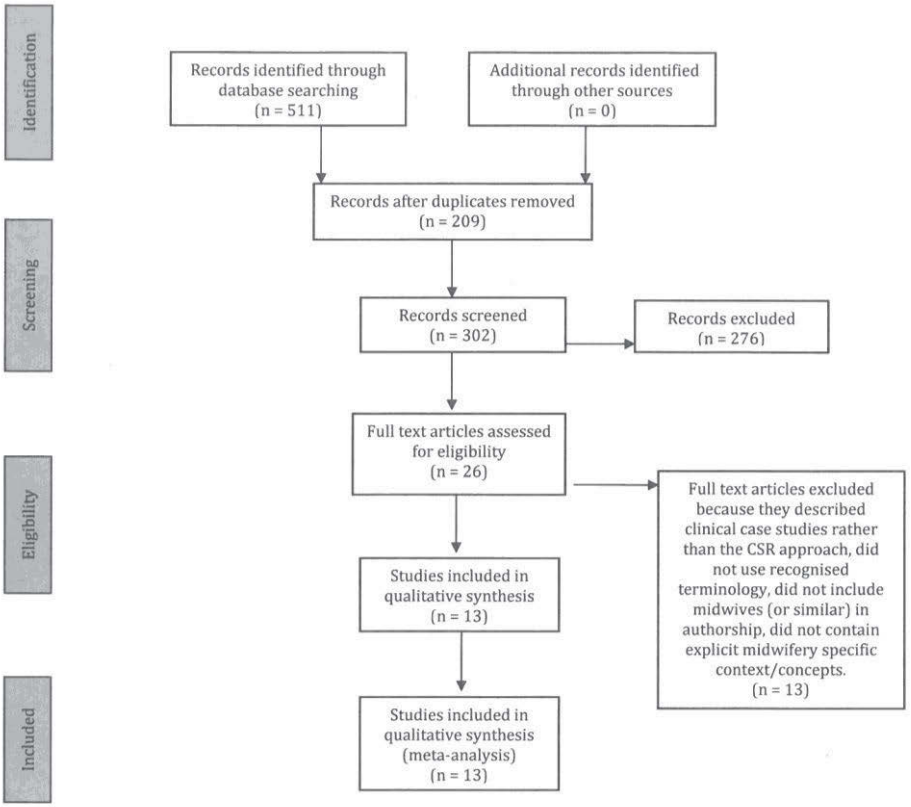


FIGURE 8: DATA SEARCH USING PRISMA FLOW DIAGRAM

TABLE 5: INCLUSION AND EXCLUSION CRITERIA

Inclusion Criteria	Exclusion Criteria
Publication between January 2005 and December 2014	Publication not between January 2005 and December 2014
Full text obtainable	Abstracts only available
Peer reviewed journals	Conference proceedings Chapters in research texts
English language	Non-English language publications
Midwife* as lead author **Midwives* in list of authorship**	No midwife* designated within authorship list
Original midwifery context research	Secondary source or meta-analysis Child and family health/neonatal care contexts
Met operational definition of CSR**	Did not meet operational definition of CSR** Theoretical/methodological papers

Because of the large number, excluded papers are not listed. Papers were excluded primarily because they described clinical case studies rather than the CSR approach or did not use recognised terminology. The variety of midwife 'titles' currently in use such as nurse-midwife, maternity nurse or maternal and child nurse were included. Papers that were not midwifery specific in terms of context or authorship were excluded. Where the abstract was unclear, the full paper was retrieved and examined to decide on exclusion or inclusion. Thirteen papers remained in the final sample to inform the review. The papers were summarised and reviewed for descriptive details about the included CSR methodology recommended by Yin (2014) (Table 7).

5.4.5 Quality Appraisal

An assessment was undertaken to determine if the studies included in the review addressed the recommended criteria for the reporting of qualitative studies. Our assessment was based on the Recommended Standards for Reporting Qualitative Research (SRQR) (O'Brien et al. 2014) is presented in Table 6. The majority of papers (10/13, 76.9%) rated highly in mentioning or discussing in detail 16 or more of the 21 recommended items. One paper included 19 items (Wilson 2012). The standards least included were researcher characteristics and reflexivity, conflicts of interest and funding. Ten papers (76.9%) mentioned or discussed in detail nine or more of the 12 items recommended for inclusion in the methods section, with three papers including 11 items (Allen, Chiarella & Homer 2010; Lagendyk & Thurston 2005; Wilson 2012). Overall, these three papers demonstrated the highest reporting standards.

5.4.6 Data Abstraction

The 13 papers were summarised, and tables created to compare primary data (Whittemore & Knafl 2005) (Table 7). A table is a good starting point for interpretation of data as any patterns and relationships that may exist are easily visualised.

TABLE 6: QUALITY APPRAISAL USING STANDARDS FOR REPORTING QUALITATIVE RESEARCH (SRQR)
Source: (O'Brien et al. 2014)

Citations	Title	Abstract	Problem formation	Purpose / Research	Approach & Paradigm	Researcher characteristics	Context	Sampling strategy	Ethics approval	Data: methods	Data: instrument	Units of study	Data: processing	Data: analysis	Trustworthiness techniques	Synthesis / Interpretation	Links: Quotes etc.	Generalizability	Limitations	Conflicts	Funding
	Title, abstract, introduction: S/1-4				Methods: S/5-15					Results / Findings: S/16-17				Discussion: S/18-19					Other: S/20-21		
Gray *et al* (2014)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
Luyben *et al* (2013)	✓	✓	✓	✓	✓✓		✓	✓				✓		✓	✓	✓		✓	✓		
Wilson (2012)	✓	✓	✓	✓	✓✓		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
Marshall (2012)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		
Dow (2012)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓		✓	✓	✓	✓		
Richards (2011)	✓	✓	✓	✓	✓×		✓			✓	✓	✓	✓	✓		✓		✓	✓		
Allen *et al* (2010)	✓	✓	✓	✓	✓×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
Kreiner (2009)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			✓
Goodman (2007)	✓	✓	✓	✓	✓×		✓			✓		✓				✓	✓				
Hindin (2006)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓		✓	✓	✓	✓		
Sittner *et al* (2005)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		
Sinclair *et al* (2005)	✓	✓	✓	✓	✓×		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		
Langendyk *et al* (2005)	✓	✓	✓	✓	✓×	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		✓

TABLE 7: SUMMARY OF PAPERS INCLUDED IN THE REVIEW

Citation & Country	Study purpose / aim / objective	Case			Methodology			Findings		
		Description	Theorist	Literature Review	Sample	Data collection	Rigour	Analysis	Significance / Practice Implications	Alternative perspectives
Gray *et al* 2014 (Australia)	Investigation of midwives' responses to changed re-registration requirements and exploration of decision-making and reflections about registration	Not specified.	Yin 2009 Stake 2005; 2008	✓	Purposive sampling. 20 participants	In depth interviews	*i.* Participant checking of transcript. *ii.* Member consultation.	NVivo	✓	✓
Luyben *et al* (2013) Europe	Exploration of factors influencing the course of establishing research as a professional activity in non-English speaking countries	Qualitative, collective	Stake 1995; Merriam 1998	✓	Not specified. 4 participants	Interviews to elicit narrative descriptions of experiential knowledge	Not specified.	Pattern matching of narrative descriptions.	✓	✓
Wilson (2012) UK	Design and evaluation of the effectiveness of a clinical midwifery educational program	Quasi-experimental pre-intervention-post-intervention	Nil	✓	Representative, purposive convenience sampling. 800 participants	*i.* Pre and post semi-structured questionnaires. *ii.* Focus group interviews. *iii.* Participant observation.	Not specified.	*i.* Quantitative data: SPPS version 12 *ii.* Qualitative: framework (thematic) analysis.	✓	✓
Marshall (2012) UK	Exploration of the effect of the introduction of a work-based learning module	Not specified.	Thomas 2011	✓	Purposive sampling. 64 participants	*i.* Questionnaires. *ii.* Focus groups	*i.* Pilot questionnaire. *ii.* Colleague consultation	*i.* Quantitative: descriptive statistics. *ii.* Qualitative: thematic content analysis.	✓	×
Dow (2012) UK	Exploration of the application of clinical simulation in the maternity setting	Qualitative instrumental	Stake 1995	✓	Not specified. 15 participants	*i.* Individual interviews. *ii.* Focus groups.	*i.* Inter-observer reliability. *ii.* Member	Thematic analysis	✓	✓

Citation & Country	Study purpose / aim / objective	Case			Methodology			Findings		
							checking			
Richards (2011) UK	Exploration of the role of supervisors of midwives (SoM) in the notification of critical incidents	Not specified.	Yin 2009	Not included. Part 2 of 2	Not specified. 8 participants	*i.* Semi-structured interviews. *ii.* Documentary analysis.	Not specified.	Comparative content analysis	✓	×
Allen *et al* (2010) Australia	Examination of safety culture in a maternity service	Descriptive	Nil	✓	Not specified. 74 participants	*i.* Questionnaire. *ii.* Semi-structured interviews. *iii.* Policy audit and policy mapping.	*i.* Manual coding. *ii.* Member checking	Template analysis	✓	✓
Kreiner (2009) Canada	Examination of strategies employed to improve maternity care for Aboriginal, rural and socially disadvantaged women	Qualitative embedded	Yin 2002	✓	Stratified purposeful sampling. 26 participants	*i.* In-depth interviews. *ii.* Primary document analysis.	Participant checking of transcript.	Content analysis	✓	×
Goodman (2007) USA	Investigation of the marginalisation of certified nurse-midwives	Qualitative	Nil	✓	Critical case sampling 52 participants	*i.* In-depth interviews. *ii.* Media, email correspondence demographic and archive data review.	Not specified.	With-in case and cross case analysis.	✓	×
Hindin (2006) USA	Exploration of intimate partner violence-screening practices of certified nurse-midwives	Not specified.	Lincoln & Guba 1985	✓	Purposeful – self-selecting sampling 8 participants	*i.* Interviews. *ii.* Demographic survey.	Thematic.	Thematic analysis.	✓	✓
Sittner *et al* (2005) USA	Examination of psycho-social impact of high-risk pregnancy	Descriptive	Yin 1989	✓	Purposeful 8 participants	Face to face interviews.	*i.* Audit trail. *ii.* Member checking.	Thematic analysis.	✓	×

Citation & Country	Study purpose / aim / objective	Case			Methodology			Findings		
Sinclair *et al* **(2005) Northern Ireland**	Exploration of an innovative midwifery role	Single	Yin 2003	✓	Purposeful sampling 3 participants	*i.* Face to face interviews. *ii.* Observation. *iii.* Documentary analysis.	*i.* Member checking. *ii.* External review of analysis themes	Content analysis.	✓	×
Langendyk *et al* **(2005) Canada**	Documentation of the process and outcome of institutionalisation of two health programs	Qualitative, descriptive, comparative	Nil	✓	Stratified purposeful sampling. 16 participants	*i.* Face to face interviews. *ii.* Document review.	Member checking.	Template and codebook analysis.	✓	✓

Most papers classified the type of case study. Only one paper, the second of a three-part series, excluded a literature review. The sampling method was clearly identified. The majority of studies used two or more data collection techniques, with interviews and or focus groups a common feature. Most papers identified methods to ensure rigour. Analysis of qualitative data was usually 'thematic'. All papers identified issues of significance about the study and implications for midwifery practice. Half the papers provided a gap analysis or discussed alternative perspectives, namely what the data were not saying and where further analysis or research is required.

5.4.7 Synthesis

In the first phase of data reduction primary sources were logically divided into subgroups to facilitate analysis (Whittemore & Knafl 2005). The second phase involved extracting and coding data from the primary sources into a manageable framework (Yin & Heald 1975). Concise organisation of the literature aids the comparability of primary sources (Whittemore & Knafl 2005). Data were regrouped, and numerical values assigned to assist with comparability and answer the research questions. The appraisal system enhanced critical analysis of the methodological processes. The papers were also grouped into one of three broad themes: Clinical, Health Service Design and Education/Research.

A study's overall generalizability is affected by the methodological criteria and standards that are attained (Daly et al. 2007). The validity of qualitative research is stronger if the collection, interpretation and assessment of data demonstrate authenticity as a primary criterion (Whittemore, Chase & Mandle 2001), remains true to the phenomenon under study and accounts for the investigator's perspective. For research to be of benefit to the wider society authenticity and trustworthiness in the methods of data collection and analysis are essential.

An initial appraisal system was developed to assess the papers' methodological limitations, which would impact the interpretation of evidence and development of findings. Popay (2008, cited in Garside 2014) recommended quality (epistemological and theoretical) aspects be considered separately to reporting (technical) guidelines. A published template (Anthony & Jack 2009) and recommendations for inclusions in a CSR report (Yin 2014) were amalgamated to inform the assessment of authenticity. Authenticity of the account of the phenomenon being investigated was assessed by the inclusion and description of the process of CSR that occurred: (a) the identification of a specific theoretical support to shape the design of the study and enhance generalizability, (b) the use of multiple data sources to ensure all perspectives were examined and (c) if the consideration of rigour was clearly discussed considered or mentioned. Four criteria of

rigour or trustworthiness were used: credibility; dependability; confirmability; and the transferability of findings. To aid systematic comparison a numerical value of 3 could be assigned for authenticity if all issues (theoretical support, multiple data sources and rigour) were addressed.

Methodological completeness was assessed separately. Interviews and or focus groups were common to all papers included in the review. The Consolidated Criteria for Reporting Qualitative Research (COREQ) tool for interviews and focus groups (Tong, Sainsbury & Craig 2007) was used (Table 8). To aid systematic comparison the three domains of the tool were each assigned a numerical value of 1 if the majority of the items were at least minimally discussed, resulting in a maximum assignment of 3. There is a slight overlap of criteria with both the theorist and rigour appearing in each tool however it was considered to be an essential aspect to retain. The papers were then grouped according to their demonstration of high medium or low methodological limitations (Table 9).

TABLE 8: METHODOLOGICAL ASSESSMENT USING CONSOLIDATED CRITERIA FOR REPORTING QUALITATIVE RESEARCH (COREQ)
Source: (Tong, Sainsbury & Craig 2007)

	Interviewer	Credentials	Occupation	Gender	Experience	R/ship estab	Known	Characteristics	Theorist	Sampling	Approach	Sample size	Refusals	Setting	Others	Description	Question Guide	Repeats	Recording	Field notes	Duration	Saturation	Transcripts	No of coders	Coding tree	Themes	Software	Checking	Quotes	Data / findings	Major themes	Minor themes
Citations	Domain 1: Items1-8 Research team and activity											Domain 2: Items 9-23 Study design										Domain 3: Items 24-32 Analysis and findings										
Gray *et al* (2014)				✓					✓	✓		✓				✓	✓		✓		✓					✓	✓		✓	✓	✓	
Luyben *et al* (2013)		✓	✓	✓					✓	✓		✓				✓	✓		✓		✓	✓				✓	N/A			✓	✓	
Wilson (2012)	✓	✓	✓	✓						✓		✓				✓	✓										N/A		✓	✓	✓	✓
Marshall (2012)	✓		✓	✓					✓	✓		✓							✓						✓	✓	N/A		✓	✓	✓	✓
Dow (2012)	✓		✓	✓					✓			✓				✓	✓		✓						✓	✓	N/A		✓	✓	✓	✓
Richards (2011)	✓		✓	✓					✓	✓		✓														✓	N/A			✓	✓	✓
Allen *et al* (2010)		✓	✓	✓			✓			✓	✓	✓	✓	✓		✓	✓		✓					✓	✓	✓	N/A	✓	✓	✓	✓	✓
Kreiner (2009)	✓	✓		✓					✓	✓	✓	✓				✓	✓		✓				✓		✓	✓	N/A	✓	✓	✓	✓	✓
Goodman (2007)	✓			✓						✓		✓														✓	N/A		✓	✓	✓	✓
Hindin (2006)	✓	✓		✓						✓	✓	✓			✓	✓		✓								✓	N/A		✓	✓	✓	✓
Sittner *et al* (2005)		✓	✓	✓					✓	✓	✓	✓	✓	✓		✓	✓		✓	✓	✓		✓		✓	✓	N/A	✓	✓	✓	✓	✓
Sinclair *et al* (2005)		✓	✓	✓					✓	✓		✓					✓		✓		✓		✓			✓	N/A	✓	✓	✓	✓	✓
Langendyk *et al* (2005)		✓	✓	✓						✓	✓	✓	✓	✓		✓			✓		✓	✓				✓	N/A	✓	✓	✓	✓	✓

TABLE 9: PAPERS IN THE REVIEW GROUPED ACCORDING TO THEME AND ASSESSMENT OF OVERALL METHODOLOGICAL LIMITATIONS

Citation and Theme*	Degree of Methodological Limitations Present		
	Low	Medium	High
Allen *et al* (2010) [1]	✓		
Dow (2012) [2]		✓	
Gray *et al* (2014) [2]		✓	
Hindin (2006) [3]		✓	
Langendyk *et al* (2005) [1]		✓	
Kreiner (2009) [1]		✓	
Marshall (2012) [2]		✓	
Richards (2011) [1]		✓	
Sinclair *et al* (2005) [1]		✓	
Sittner *et al* (2005) [3]		✓	
Wilson (2012) [2]		✓	
Goodman (2007) [1]			✓
Luyben *et al* (2013) [2]			✓

*Papers grouped under the following broad themes: [1]Health Service and Design (6/13). [2]Research and Education (5/13). [3]Clinical (2/13).

5.5 Results

The purpose of this review was to analyse the application, strengths and limitations of case study methods found in published midwifery literature. The results answer the four research questions.

5.5.1 Where has CSR been used in midwifery research?

Case study research has had a low uptake in English language midwifery research, with 13 papers identified from January 2005 - December 2014 (Table 5.4). The literature originated primarily from the United Kingdom (5/13), followed by the United States (3/13), Canada (2/13), Australia (1/13) and Europe (1/13). In this sample CSR was found primarily in health service design (6/13), followed by education and research (5/13) and least in the clinical setting (2/13) (Table 5.6). Improvements in health services occurring in response to local need were evaluated (Kreiner 2009). The influence of contextual factors on midwives and the implementation of health programs were discussed (Goodman 2007; Lagendyk & Thurston 2005). Specific midwifery roles (Richards 2011; Sinclair et al. 2005), professional registration issues (Gray, Rowe & Barnes 2014) and safety culture (Allen, Chiarella & Homer 2010) were explored in depth. Midwifery practice development evaluations occurred in the tertiary setting (Dow 2012) and the workplace

(Marshall 2012; Wilson 2012). The development of midwifery research in four country settings was described (Luyben et al. 2013). Clinically, the impact of high-risk pregnancies on families was examined (Sittner, DeFrain & Hudson 2005) as well as the antenatal screening practices in relation to intimate partner violence (Hindin 2006). To date, health service design with its distinct boundaries and clear need for evaluation seems to have found the greatest application with midwife researchers using the CSR approach.

5.5.2 Why has CSR been used in midwifery research?

Case study research is suited to describing, exploring or explaining a phenomenon in its real-life context (Yin 2014). All studies provided a purpose/aim/objective. CSR was primarily used to 'explore' (6/13), 'examine' (3/13) or 'investigate' (2/13), it was also used to 'evaluate' and 'document' (2/13) a diverse range of phenomena (Table 6). In all studies, gathering and describing the experience, perception and opinion of stakeholders or participants was an essential feature. The phenomena of interest included issues broadly grouped under the themes of: professional practice (Allen, Chiarella & Homer 2010; Goodman 2007; Hindin 2006; Sinclair et al. 2005; Sittner, DeFrain & Hudson 2005), professional development (Dow 2012; Gray, Rowe & Barnes 2014; Luyben et al. 2013; Marshall 2012; Richards 2011; Wilson 2012) and health service delivery (Kreiner 2009; Lagendyk & Thurston 2005) (Table 9). Published CSR reports described and discussed issues of interest to a broad range of midwives.

5.5.3 How has CSR been used in midwifery research?

The methodological processes included in the published reports were appraised to identify any limitations present that would impact on the interpretation of evidence and development of findings (Table 9). One paper (7.8%) (Allen, Chiarella & Homer 2010) demonstrated a low degree of methodological limitations, suggesting significant confidence could be placed in the interpretation of evidence and discussion of findings. Two papers (15.3%) (Goodman 2007; Luyben et al. 2013) demonstrated a high degree of methodological limitations, suggesting the lowest level of confidence. The remaining ten papers (76.9%) demonstrated a medium degree of limitations were present with moderate confidence applicable.

Authenticity was assessed through the inclusion of a theoretical support, multiple data sources and rigour. Nine papers (69.2%) identified or discussed the 'type' of case study employed; five papers also included a supporting theoretical framework (Dow 2012; Kreiner 2009; Luyben et al. 2013; Sinclair et al. 2005; Sittner, DeFrain & Hudson 2005). Eight papers (61.5%) described and discussed their use of appropriate strategies to improve rigour, in particular credibility, dependability and confirmability. For example: the use of external peer review of analysis (Sinclair et al. 2005); triangulation (Dow 2012;

Kreiner 2009); participant confirmation/feedback (Gray, Rowe & Barnes 2014); the use of an audit trail (Sittner, DeFrain & Hudson 2005) and pilot testing the data collection tool (Marshall 2012). Only one paper (Allen, Chiarella & Homer 2010) also included evidence of reflexivity as a specific strategy to ensure rigour. Ten studies used multiple sources of data collection, which is a recognised measure of validity (Yin 2014). Ten papers (76.9%) demonstrated low or medium methodological limitations when considering authenticity, suggesting the authors considered these elements routine inclusions.

As all studies included interviews and or focus groups in their data collection, the COREQ checklist for reporting qualitative studies (Tong, Sainsbury & Craig 2007) was used as a further appraisal tool for elements to be expected in a CSR report (Table 7). The critical appraisal tool consists of three domains. Domain 1 considers the research team and reflexivity. Of the eight recommendations, 15.3% of papers included one or two and 84.5% included up to four items in their report, indicating this section achieved low to moderate attention. Personal bias was addressed by indicating gender (13/13), credentials (8/13) and occupation (9/13), however there was no indication of experience or training included that would reflect on the credibility of findings. Only one paper included a discussion on reflexivity (Allen, Chiarella & Homer 2010).

Domain 2 examines the study design. Of the fifteen recommendations, 46.1% of papers included up to five, 46.1% included up to ten and 7.8% included twelve items in their report, indicating this section achieved low to moderate attention. Although equal numbers of papers classified the type of CSR case and provided a guiding theorist (9/13), both elements were not necessarily included in the one report (5/13). Detailing recruitment indicated the importance researchers placed on sampling. Inclusion of the type of sampling employed (11/13), sample size (13/13) participant characteristics (9/13) plus a discussion about any refusals to participate (4/13) affected the conclusions able to be drawn from the paper's findings. Only three papers included all four elements (Allen, Chiarella & Homer 2010; Lagendyk & Thurston 2005; Sittner, DeFrain & Hudson 2005). Minimal discussion occurred of other issues that could act as an enabler or barrier to the amount of data achieved, such as setting of the interview (3/13) and the presence of non-participants (0/13). Additional information to enable the reader to determine transferability of findings to their own context included: the use of question guides (10/13), recording methods (10/13) the length of the interview (4/13) and data saturation (1/13). One paper included all four elements (Luyben *et al*. 2013). Participant checking (3/13) and the use of field notes (1/13) as a further means to ensure validity did not feature significantly.

Domain 3 addresses the analysis and findings. Of the nine recommendations, 7.8% papers included up to three, 53.8% included up to six and 38.4% included the maximum of nine items in their report, indicating this section had received moderate to high attention. The description of the analysis and findings influences a paper's credibility. Themes were invariably derived from the data (12/13) and using a manual process (12/13) rather than a software package (1/13) (Gray, Rowe & Barnes 2014). Three papers (Allen, Chiarella & Homer 2010; Kreiner 2009; Sittner, DeFrain & Hudson 2005) created a clear audit trail although several papers included elements such as a coding tree (5/13) and member checking (5/13). Trustworthiness was supported through the wide use of participants' voices (11/13) that were interspersed through the findings. All papers presented major themes and the majority (11/13) also included minor themes.

Only one paper demonstrated low methodological limitations when considering methodology (Allen, Chiarella & Homer 2010). Five papers (38.4%) demonstrated moderate limitations and seven papers (53.8%) high limitations. The high percentage of recommendations that were absent suggests the authors did not consider these elements routine inclusions.

Yin's (2014) recommendation to incorporate a discussion of significance, implications for midwifery practice and alternate perspectives into CSR reports were also reviewed (Table 6). All papers clearly identified the significance of the findings of their study and the implications for midwifery practice. However alternative perspectives, a strategy to clearly demonstrate the researcher has reduced bias, were less frequently present (53.8%). Despite the low number of papers available for review the results are similar to Anthony and Jack's (2009) review of nursing CSR, suggesting that CSR in midwifery has a comparable authenticity and methodological standard.

5.5.4 How has midwifery CSR use been reported in the literature?

The limited publication of CSR in midwifery literature influences this question. Midwifery context CSR is published in peer reviewed journals making it visible and accessible to midwife researchers. Ten papers (76.9%) were published in a variety of midwifery/maternity care journals: *Midwifery* (4/13), the *British Journal of Midwifery* (2/13), the *Journal of Midwifery & Women's Health* (2/13), *Evidence Based Midwifery* (1/13) and *Maternal Child Nursing* (1/13). The remaining three papers were published in education journals such as *Nurse Education Today* and *Nurse Education in Practice* and a sociology journal *Social Science & Medicine*.

The papers' titles and keywords did not necessarily match, demonstrating the need for midwife researchers to use broad terms both as keywords and when searching. The title of

four papers self-identified as a case study (Allen, Chiarella & Homer 2010; Lagendyk & Thurston 2005; Marshall 2012; Sinclair et al. 2005) and two papers included case study in the list of keywords (Gray, Rowe & Barnes 2014; Sinclair et al. 2005). Keywords were completely absent in three papers (Dow 2012; Richards 2011; Sittner, DeFrain & Hudson 2005). Where included the most commonly used terms were midwifery/midwives/certified nurse-midwives (5/13) (Goodman 2007; Kreiner 2009; Luyben et al. 2013; Marshall 2012; Sinclair et al. 2005).

5.6 Discussion

This paper reviewed 13 papers that used CSR in a midwifery context. Case Study Research has been established as an approach to deeply explore and evaluate phenomena of professional interest, making a significant contribution to the current body of knowledge and informing practice. Case Study Research publications have been mapped, confirming that this approach is used to a lesser extent in midwifery than in nursing contexts. There is also a lack of literature that suggests how CSR can be implemented in midwifery research. This review has demonstrated CSR's applicability to midwifery, with the design used in a diversity of situations to answer a broad array of research questions. Finally, this review has highlighted areas where CSR reports provide clear guidance and where further detail or greater consistency in methodological approach is required.

The answers to the research questions describe what is currently known about midwifery context CSR, namely where, why and how it is being used. There was a broad array of issues investigated and research questions posed demonstrating the overall versatility of midwifery CSR. CSR is a useful choice when researchers are interested in insight, discovery and interpretation rather than hypothesis testing (Merriam 2009). The reviewed papers captured and retained the 'noise' of midwives' professional lives and revealed the highly complex contexts and conditions where they worked. The chronicling of participants lived, and perceived experiences assisted with understanding complex inter-relationships. The findings support the claim that CSR is useful for studying educational innovations, evaluating programs and informing policy (Merriam 2009). Additions to the body of midwifery knowledge was demonstrated through the examination of professional practice, professional development and health service delivery in relation to maternity health service design, midwifery education and midwifery research. Clinical issues appeared minimally, even though practice issues such as antenatal and intrapartum care contain a degree of complexity that CSR is well suited to investigate. Midwifery researchers appear unaware of this potential.

The findings of this review indicate that many studies included the necessary criteria to achieve methodological rigour: identification of purpose, case type, theoretical support, literature review, sampling procedure, data collection methods, analysis method and rigour. Critical analysis revealed however that several areas received less attention than is recommended (Tong, Sainsbury & Craig 2007). Reflexivity was lacking yet self-awareness of the researcher is a significant part of the research process (Houghton et al. 2013). Reflexivity is strongly recommended by CSR authors (Flyvberg 2011) and midwife academics (Burns et al. 2012). Decreased bias and increased credibility of the study's findings will result when researchers 'situate' themselves and their participants clearly in the report (Stake 1995). Furthermore, a demonstrable 'chain of evidence' increases reliability (Yin 2014). There was a lack of detail around the interview process and analysis audit trail to demonstrate how researchers have appraised and developed an understanding of the data.

Papers lacking methodological robustness may decrease CSR's desirability as a research approach in midwifery and lessen its impact. Papers that do not address all the essential components of a CSR report are at risk of presenting a less than optimal product. The lack of methodological substance decreases the finding's value to the wider community, which in turn affects the translation of knowledge into midwifery practice. A criticism of CSR is that there is 'too much data for easy analysis' and the complexity examined is 'difficult to represent simply' (Hodkinson & Hodkinson 2001). Consequently, aspects of the final narrative are omitted. The findings of this review would seem to lend some support to this claim. The methodological completeness of the papers was variable; however, Crowe and Sheppard (2011) suggest it is the author's responsibility to ensure important information is not missing from an article before it is published.

The findings of this review add to the general body of midwifery knowledge, increase the profile of CSR and offer midwife researchers several resources. Access is gained to a list of recent papers to peruse to get a 'feel' for this approach. Clear guidance on the optimal inclusions for qualitative research is obtained. Attaining and maintaining transparency at all stages of the research process should improve quality by surfacing the strengths and weaknesses. An acknowledged limitation of this review is that only English language publications were accessed. Although every effort was made to reduce bias through the data search method (Whittemore & Knafl 2005) there is still potential for incomplete findings. In general, however most midwifery studies are published in English speaking journals (Luyben et al. 2013) which support the strength of the evidence found here.

5.7 Conclusion

This paper presents a methodological review of midwifery CSR using templates (Anthony & Jack 2009; Yin 2014) and a well-established analysis framework (Whittemore & Knafl 2005) to enable a comprehensive analysis (Yin & Heald 1975). The review demonstrated that while the published literature is scarce the findings are similar to Anthony and Jack's (2009) review of nursing CSR, suggesting that CSR in midwifery has a comparable authenticity and methodological standard.

Case study research needs to be seen as an approach rather than as a single methodology. When conceptualised as such, CSR is able to meaningfully privilege participants' 'voices' through its use of a wide range of complementary data collection methods. The understanding of the complex contextual/cultural/behavioural factors that influence the translation of knowledge into midwifery practice is significantly enhanced. This review provides multi-level guidance for the midwife-researcher seeking to undertake CSR. Midwives are encouraged to explore if CSR may be applicable to their investigation. As more studies using this approach further demonstrate applicability; encourage support and wider adoption in the midwifery setting.

In summary

This review identified that case study research currently has a low profile in midwifery research contexts although there is breadth in the type of research questions being asked and a diversity of situations being explored. The process of conducting the review provided an opportunity to gain clarity about the methodological approach and best 'type' of case study to answer the research questions in this study. The review furthermore provided a resource for the design, conduct and reporting of a methodologically strong case study. Chapter Six presents the second part of the methodological aspects of the study by detailing the actual methods used to conduct the research.

6 Study design and methods

Overview

Having determined the suitability and applicability of case study research to midwifery this chapter describes the instrumental case study design chosen to explore the case of the introduction and dissemination of the global health strategy BFHI into the national setting of Australia. The case is instrumental in that it may enable new insights to be gained about the ongoing and future support of breastfeeding in Australia. The parameters of the case are the BFHI in Australia between 1990 and 2016. The case study design and methods are detailed including: recruitment of participants, selection of key documents, type of data collected, methods of analysis, ethical considerations and rigour.

6.1 Instrumental case study design

Case study research is subject to considerable variation, which has created confusion in the published literature (Woodside 2010). It is variously described as a type of research strategy, a research approach or a research methodology (Denzin & Lincoln 2005; Merriam 2009; Yin 2014). Case study is also described as a type of design in (primarily) qualitative research that may be an object of study as well as the product of the inquiry (Creswell 2013). The main authors in the field (Stake 1995; Yin 2014) agree on the description: case study research is an exploration of a real-life contemporary bounded system (a case) (or cases) over time through detailed, in-depth data collection involving multiple sources of information, resulting in a reported case description and case themes. The unit of analysis in the case study might be multiple cases (multisite) or a single case (within-site).

The previous chapter presented a typology of the 'types' of case studies that have been proposed by leading authors in the field (see Table 4). A single case instrumental 'type' of case study (Stake 2005) was chosen as most relevant for this study, as an examination of the case also serves to increase understanding of an intimately related issue. In this single instrumental case study, the issue of interest is the dissemination of a global health strategy in a national setting, the case is the BFHI in Australia and the 'something else' (related issue) is the ongoing and future support of breastfeeding in Australia. The creation of boundaries e.g. by time and place; time and activity or by definition and context (Baxter & Jack 2008) ensures a reasonable breadth and depth, or scope, for the study. This case is bound by place, Australia, and by time, from 1990 to 2016.

6.2 Methods

6.2.1 Sources of data

Two sources of primary data were considered the most appropriate for contributing to the understanding of this case. The first consisted of the text from a range of historical National policy documents, government reports, archival organisational minutes and correspondence. The second consisted of 14 in-depth semi-structured interviews with a diverse group of participants from policy and health facilities and BFHI leadership. The methods chapter is therefore divided into two sections. The first section details the sampling strategy. The section on sampling strategy is further divided into two parts: documents and interview participants. Within each part the methods for selection and analysis are detailed. The second section details the strategies used to ensure trustworthiness such as triangulation, ethical considerations, rigour and reflexivity.

6.2.2 Sampling strategy

Purposive sampling was used to select relevant documents and to identify key stakeholders for interview. Employing 'maximum variation' (Creswell 2013) within the inclusion criteria increased the likelihood that the findings reflected different perspectives. Specific documents and prospective participants were deliberately chosen because of the crucial information they provided that could not be obtained elsewhere. I had prior knowledge of the issue of interest, the dissemination of a global strategy in a national setting and the case, the BFHI. My extensive understanding of who and what would be typical of the experiences of participants and documents of interest, also aided in achieving maximum variation.

6.2.2.1 Part One: Documents

6.2.2.1.1 Documents as a source of analysable data

Documents have a number of acknowledged advantages (Silverman, 2014), being naturally occurring empirical materials that exist before the researcher seeks to use them as data (Miller & Alvardo, 2005). The richness of the content of documents identifies what participants are actually doing in the world - without being dependent on being asked by researchers. Documents uncover meaning, develop understanding and help the researcher discover new insights about the research problem.

The production and preservation of documents are linked to the distribution of power and resources (Linders, 2008), for example government-produced documents tend to be more comprehensive than private and personal archival records. Archival documents that are personal, individual and private however may be more reflective of 'real life' (Jordanova, 2000), thus providing greater insight into the issue of interest. Many documents are

readily accessible for review as they are not dependent on ethical constraints (Silverman, 2014).

Documents are approached as elements in the larger field of social activity with meanings that are socially situated (Miller & Alvarado 2005), providing insight into individual and collective actions. Socially produced documents such as policies can be read as unique testaments to events or issues of interest, they can also be used to draw inferences that lead to further investigation (Yin 2014).

It is essential to seek alternate viewpoints in situations where the potential exists for manipulation of the public's viewpoint through the production of specific documents (e.g. government) (Linders 2008), therefore interviews with key participants was used as a complementary source of data. The constructionist underpinnings of the research study ensured that the findings of the document analysis were not confined to being background source material, they both complemented and informed the analysis of interview.

6.2.2.1.2 Document Inclusion Criteria

To potentially be included in the document review reference to the support of breastfeeding or the BFHI (globally or Australia) within a pre-determined time period (1980 to 1996) was required. The identification and selection of documents to analyse was a straightforward process. A document's authorship determines its categorisation as public, personal, or private, which contributes to the verification of trustworthiness (Payne & Payne 2004). A document's identification also influences its accessibility. A list of potential public documents was created using my previous knowledge of the BFHI introduction into Australia and current BFHI policy. The ACM was approached in writing with a request to release archival private documents pertinent to the study's purpose. The request was granted in May 2013 (see Appendix Number One). The ACM archival folders contained private documents authored by UNICEF, who held original governance of the BFHI, plus ACM minutes and correspondence. Initial searching of the ACM's archival documents identified 48 documents that fulfilled the inclusion criteria. The inclusion criteria included reference to the support of breastfeeding or the BFHI constructed, produced or published between 1980 and 1996. Documents were identified through a combination strategy of government website searching and the archival folders. Documents were screened and included for analysis if there was reliability of authorship, and they provided information about the events and or processes that informed the early implementation period. Figure 9 presents a flow chart of the searching process and outcome. The full list of documents is presented in Tables 10 and 11.

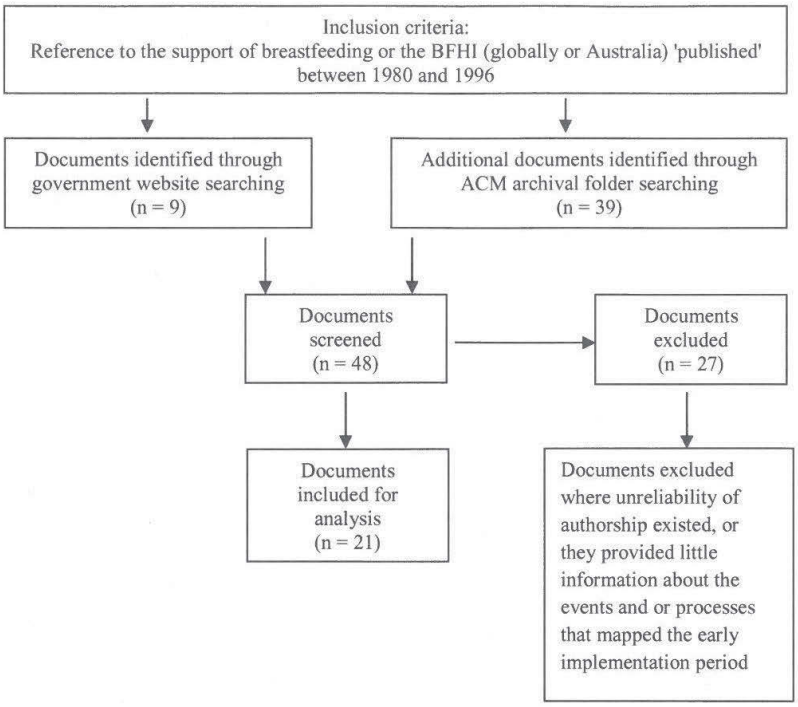


FIGURE 9: FLOWCHART OF THE PURPOSIVE SAMPLING PROCESS AND OUTCOME OF PUBLIC, PRIVATE AND PERSONAL DOCUMENTS

6.2.2.1.3 Document Data Collection

Documents are a key part of data collection in any case study (Yin 2014). In this study, the document's importance and relevance to breastfeeding, the BFHI implementation process and reliability of authorship drove data collection. Nine national policy documents were identified as potentially fitting the study's inclusion criteria as detailed in Table 10. Searching Government websites indicated that the Internet was a repository for many of these public documents and they were able to be downloaded without difficulty for review. Public documents that were unable to be easily accessed, namely those held by external institutions such as the National Library of Australia were retrieved via the University's document delivery service.

The ACM provided access to folders containing archival personal and private documents and office space in which to review them. Reports, external and internal correspondence, minutes and directives located in the ACM's archives were skimmed and the text examined for any evidence of enabling factors or barriers to the progress of the BFHI's implementation process in Australia. Even using a narrower date range (1991 to 1995) yielded a large number of documents to review. The review process took approximately 24 hours in total, which were spaced out in blocks of several hours duration over May and

June 2013. Private and personal documents included Executive Directives, letters of correspondence between and within stakeholder organisations, reports, minutes and interoffice memos. After reviewing all available documents during the desired date range 48 documents were photocopied for a second review. Subsequently 12 information-rich personal and private documents were selected from the 48 for deeper analysis. The range of documents retrieved and reviewed as well as identification of the 12 selected for analysis is revealed in Tables 10 and 11. Table 10 presents a detailed list of the Australian policy documents relating to the BFHI between 1982 to 1992. Document information includes the author, year, title, publisher, website and access date, the type of document and the reason it was selected for analysis. Table 11 details the Australian and international organisational archival documents retrieved from the archives held at the ACM Head Office in Canberra. Each document includes the author, year and date of 'publication,' plus identification of 'type and a brief synopsis. The reasons behind the selection of the final 12 for analysis is also detailed.

TABLE 10: AUSTRALIAN POLICY DOCUMENTS RELATING TO THE BFHI 1982-1996
Source: National Library of Australia, Deakin University and relevant Government websites

Author/s; Year, Date	Document Title; publisher; website; access date	Type	Selected for analysis (reason)
Commonwealth of Australia 1982.	*Dietary Guidelines for Australians.* AGPS. Canberra: Commonwealth of Australia. Document delivery from the National Library of Australia Accessed: 20 May 2016	Public	Initial national breastfeeding policy statement – for consumers and health professionals (HP)
National Health & Medical Research Council (NHMRC) Public Health Committee 1985.	*Report of the Working Party on Implementation of the WHO International Code of Marketing of Breast-Milk Substitutes March 1985*. AGPS. Canberra: Commonwealth of Australia. Document delivery from the National Library of Australia Accessed: 01 December 2015	Public	Evidence of the will to adopt and implement the *International Code*
Better Health Commission 1986.	*Looking Forward to Better Health* (Final Report). AGPS. Canberra: Commonwealth of Australia. Document delivery from the National Library of Australia Accessed: 20 May 2016	Public	Evidence of the recognition of need for evaluation and monitoring: setting national goals and targets for breastfeeding prevalence and duration
NHMRC 1992.	*Dietary Guidelines for Australian (n4).* AGPS. Canberra: Commonwealth of Australia. https://www.nhmrc.gov.au/guidelines-publications/n4 Accessed: 11 February 2016	Public	Evidence of changes in or maintenance of policy direction for the support of breastfeeding – for consumers and HP
Australian Dept. of Health Housing and Community Services; Nutbeam, D. et al 1993.	*Goals and Targets for Australia's Health in the Year 2000 and Beyond.* AGPS. Canberra: Commonwealth of Australia. Document delivery from the National Library of Australia Accessed: 18 February 2016	Public	Evidence of national monitoring process: national goals and targets set for breastfeeding prevalence and duration
Australian Institute of Health & Welfare (AIHW) 1994.	*Australia's Health 1994: the fourth biennial health report of the Australian Institute of Health and Welfare.* Canberra: AGPS. Deakin University's Research Repository http://hdl.handle.net/10536/DRO/DU:30046740 Accessed: 11 April 2016	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for HP

Author/s; Year, Date	Document Title; publisher; website; access date	Type	Selected for analysis (reason)
NHMRC 1995.	*Dietary Guidelines for Children and Adolescents.* AGPS. Canberra: Commonwealth of Australia. https://www.nhmrc.gov.au/guidelines-publications/n1 Accessed: 16 March 2015	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for consumers and HP
NHMRC 1996.	*Infant feeding guidelines for health workers.* AGPS. Canberra: Commonwealth of Australia. https://www.nhmrc.gov.au/guidelines-publications/n20 Accessed: 11 February 2016	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for HP
Commonwealth of Australia 2003.	*Marketing in Australia of Infant Formulas: Manufacturers and Importers Agreement – the MAIF Agreement* http://www.health.gov.au/internet/main/publishing.nsf/Content/health-pubhlth-publicat-document-brfeed-maif_agreement.htm Accessed: 18 May 2016	Public	Evidence of the will to establish regulatory mechanism for the formula industry in accordance with international recommendations

TABLE 11: AUSTRALIAN AND INTERNATIONAL ORGANISATIONAL ARCHIVAL DOCUMENTS REVIEWED AND IDENTIFICATION OF 12 SELECTED FOR ANALYSIS
Source: ACM archives - PO Box 965, Civic Square ACT 2608

Author/s; Year, Date	Identification/synopsis	Type	Selected for analysis (reason)
United Nations International Children's Emergency Fund (UNICEF) 1991 (30 August).	Personal communication (external): Copy of a generic letter from Letter from Executive Director to Head of Government	Personal	
UNICEF 1991 (26 September).	Personal communication (external): Letter from Executive Director to Regional Directors, Representatives, Directors and Section Chiefs.	Private	Evidence of process of introduction and implementation of the BFHI at country-level
UNICEF 1991 (05 October).	Executive Directive Re: Parameters for involvement of the Formula industry with the Baby Friendly Hospital Initiative	Private	
UNICEF 1991 (30 December).	Executive Directive Re: Baby Friendly Hospital Initiative (BFHI)	Private	Evidence of process of introduction and implementation of the BFHI at country-level
Wellstart International, 1992 (14 January).	Personal communication (external): Letter from President to Australian representative attending Baby Friendly Hospital Initiative Master Trainer/Assessor Workshop	Personal	
S. Murray, 1992 (01 March).	Personal communication (external): Report on Baby Friendly Hospital Initiative Master Trainer/Assessor Workshop	Personal	
BFHI National Consultative Group, 1992 (29 April)	Published minutes	Private	
Executive Director, UNICEF Australia, 1992 (10 June)	Personal communication (external): draft letter to Deputy PM & Minister for Housing & Community Services. Follow up correspondence regarding the presentation of ideas to develop the Baby Friendly Hospital Initiative in Australia (including funding)	Private	Evidence of UNICEF's attempts to engage the national government in dialogue about the BFHI
S. Murray, 1992 (19 June)	Personal communication (external): Letter to Executive Director UNICEF Australia including a submission to WHO/UNICEF for the establishment of the Royal Children's Hospital as a pilot site for development and assessment of paediatric baby-friendly criteria	Private	
Director of Nursing, The Royal	Personal communication (external): Letter to President UNICEF	Private	

Author/s; Year, Date	Identification/synopsis	Type	Selected for analysis (reason)
Women's Hospital, Melbourne, 1992 (29 June)	Australia offering the hospital as a test site to trial the global Criteria and Hospital Appraisal Tool		
President, UNICEF Australia, 1992 (28 August)	Personal communication (external): Letter to Director of Nursing, The Royal Women's Hospital, Melbourne accepting the offer of testing documents	Private	
BFHI National Consultative Group, 1992 (15 October)	Published minutes: example of discussion topics	Private	
Chairman, Health Care Committee Royal Australian College of Obstetricians and Gynaecologists (RACOG) 1992 (19 November)	Personal communication (external): Letter to President UNICEF Australia congratulating the committee but also expressing concerns about the BFHI strategy for Australian women and Australian hospitals	Private	Evidence of key stakeholder's perception and attitude towards BFHI
M. Minchin, 1992 (17 December)	Personal communication (external): Letter to a member of the UNICEF Australia Committee requesting UNICEF continue to support BFHI until self-funding	Personal	
President, UNICEF Australia, 1992 (22 December)	Personal communication (external): Letter to Public Health Association enquiring if the Association would be receptive to an approach by UNICEF to take up an implementation responsibility for the BFHI in Australia	Personal	Evidence of UNICEF's intent to engage in discussion with national organisations regarding governance of the BFHI
President UNICEF Australia, 1993 (28 January)	Personal communication (external): Letter of response to the Chairman, Health Care Committee Royal Australian College of Obstetricians and Gynaecologists thanking for support, acknowledging the expressed concerns, providing explanation of origin s of terminology	Private	Evidence of UNICEF's intent for inclusion of wide range of stakeholders
Executive Director UNICEF Australia, 1993 (11 January)	Personal communication (external): Letter to Minister for Aged, Family & Health Services requesting a meeting as soon as possible to discuss the BFHI	Private	Further evidence of UNICEF's attempts to engage the national government in dialogue about the BFHI
Executive Director UNICEF Australia, 1993 (12 January)	Personal communication (external): Letter to M. Minchin acknowledging concerns and identifying a level of constraint in UNICEF's support due to resources	Private	
BFHI National Consultative Group	The Baby-Friendly Hospital Initiative in Australia and New	Public	

Author/s; Year, Date	Identification/synopsis	Type	Selected for analysis (reason)
and Taskforce, 1993 (26-28 February)	Zealand: a Workshop: Programme and outline of objectives		
President UNICEF Australia, 1993 (20 April)	Personal communication (external): Letter to President Australian College of Midwives advising National Consultative Group and Taskforce be dissolved and formation of National Authority - named National Steering Group and seeking nomination for representation	Private	
National Education Officer, UNICEF Australia, 1993 (09 June)	Personal communication (external): Letter to Royal Australian College of Obstetricians and Gynaecologists/Health Care Committee inviting nomination for representation on BFHI Steering Group	Private	
President UNICEF Australia, 1993 (23 July)	Personal communication (External): Letter to CEO Royal Women's Hospital Melbourne confirming upcoming BFHI assessment	Private	
Convenor BFHI National Steering Group, 1993 (12 August)	Personal communication (external): Letter to CEO Royal Women's Hospital Melbourne containing the report of the BFHI assessment. Certificate of Commitment awarded	Private	
BFHI National Steering Group, 1993 (31 August)	Published minutes: example of discussion topics	Private	
UNICEF BFHI Project Co-ordinator, 1994 (20 January)	Personal communication (external): Letter to Nursing Unit Manager Mitcham Private Hospital, Victoria confirming upcoming BFHI assessment	Private	
Executive Director UNICEF International and Director-General World Health Organization, 1994 (28 January)	Personal communication (external): Copy of letter sent to PM P. Keating encouraging personal attention to achieving the goals of the World Summit in 1990 which included the BFHI	Private	
UNICEF BFHI Project Co-ordinator, 1994 (18 March)	Personal communication(external): Facsimile to Nursing Unit Manager Mitcham Private Hospital, Victoria confirming successful BFHI assessment	Private	
UNICEF Australia, 1994 (22 April)	BFHI Discussion Paper: financial statement, operating arrangements, current problems, policy issues, future	Private	Evidence of internal tensions within UNICEF regarding the

Author/s; Year, Date	Identification/synopsis	Type	Selected for analysis (reason)
	operations, objectives for 1994/95 and draft budget		operations of the BFHI
Executive Director UNICEF Australia, 1994 (26 April)	Personal communication (external): Letter to President UNICEF Victoria advising of upcoming discussion regarding the future arrangements for BFHI	Private	
Convenor BFHI National Steering Group, 1994 (19 May)	Personal communication (external): Letter to President UNICEF Australia discussing BFHI's achievements and providing an opinion that UNICEF Australia should maintain support of BFHI	Private	
Executive Director UNICEF Australia, 1994 (23 December)	Personal communication (external): Letter to BFHI Project Co-ordinator advising of an upcoming review of the BFHI program	Private	
JAM Management & Marketing Consultancy Services, 1995 (06 February)	Report for UNICEF Australia: Baby Friendly Hospital Initiative Project, including recommendations	Private	
UNICEF Australia BFHI National Steering Group, 1995 (09 February)	Minutes of an extraordinary meeting of the BFHI NSG to discuss the JAM Management Report which was largely criticised for lack of breadth and depth	Private	
President UNICEF Australia, 1995 (01 March)	Personal communication (external): Letter to Convenor BFHI Steering Group advising the outcome of the resolution passed by the Board of UNICEF (February 1995) that a successor organisation or group auspice the BFHI	Private	Documentary evidence of the Decision of the UNICEF Board regarding the BFHI
UNICEF Australia BFHI National Steering Group, 1995 (02 March)	Minutes: outcome of UNICEF Australia's Board consideration of the future of the BFHI in Australia discussed	Private	Evidence of the Resolution of the UNICEF Board regarding the future of the BFHI in Australia
Chairperson BFHI National Steering Committee, 1995 (11 April)	Personal communication (external): Letter to Executive Officer ACM in response to their letter about the BFHI, financial statement included and suggested consideration of a consortium bid	Private	
BFHI National Steering Group, 1995 (21 June)	Published minutes: example of discussion topics	Private	
Chairperson BFHI National Steering Committee, 1995 (28 July)	Personal communication (external): Letter to Executive Director UNICEF Australia concerning expressions of interest received regarding the formation of a successor body for the	Private	Evidence of the tender process and applicants

Author/s; Year, Date	Identification/synopsis	Type	Selected for analysis (reason)
	BFHI in Australia, including criteria for consideration in determination of successor body		
Executive Officer, ACM 1995 (13 November)	Personal communication (internal): Letter to Secretary ACM regarding takeover of the BFHI	Personal	Evidence of concerns about potential financial implications of governing the BFHI

6.2.2.1.4 Document Analysis

A 'documents as commentary' approach is used in case study, history and policy analysis due to its capacity to reflect specific social and historical circumstances (Miller & Alvarado 2005). This 'context analytic' approach reveals how documents' production and use embed them into the social context rather than as an "independent container of fixed evidence about the social world" (p350). Analysis included a description of the document and its purpose. Careful attention was paid to the social context in which it was produced and exchanged, who was the likely readership and what were the outcomes. Comparing and critically analysing multiple sources of documents provided the opportunity to identify contrary examples or explanations. Table 12 describes the range of questions asked about the documents as recommended in the literature (Silverman 2014).

TABLE 12: QUESTIONS ASKED TO INFORM THE ANALYSIS OF DOCUMENTS
Source: (Silverman 2014)

- How were they written?
- How were they read?
- Who read them?
- For what purpose?
- On what occasions?
- With what outcomes?
- What was recorded?
- What was omitted?
- What was taken for granted?
- What did the writer seem to take for granted about the reader/s?
- What do readers need to know in order to make sense of them?

Text that was relevant to the research questions in the selected Commonwealth policy documents (Table 10) was read numerous times. The data revealed a pattern that described and demonstrated the Commonwealth government's processes and political will in setting breastfeeding policy and pursuing its evaluation. Being public policy documents, they were strategic in nature with highly polished text (Jordanova 2000). Using the pipeline model gaps between policy and practice were identified. Interpretation of the policy documents also included a consideration of how and why these documents came to be developed in the first place and wide reading of the wider socio-political context in which they were situated occurred.

Personal, individual and private archival documents (Jordanova 2000) that would be more reflective of the time period under examination were also included for analysis. Specific

ACM archival documents as listed in Table 11 were chosen for deeper analysis due to their importance, relevance and reliability to address the research questions (Miller & Alvarado 2005). Close critical reading and re-reading of the text occurred to probe the precise language use and organisation of the whole text considering the context in which it was produced. Similar to the public policy documents a consideration of enabling factors and barriers found in the pipeline model was also used to inform analysis. Using an inductive process data within the documents were organised into basic codes under the broad categories of 'enabling' factors or 'barriers', which were then compared with each other. While more barriers than enablers were identified the codes were interpreted as sitting within four representative major themes: *A Breastfeeding Culture, Resource Implications, Ambivalent Support for Breastfeeding and the BFHI* and *Business versus Advocacy.* An audit trail example of manual coding is located in Appendix Number Five.

6.2.2.2 Part 2: Interview Participants

6.2.2.2.1 Interviews as a source of analysable data

Case study methodology also uses the analysis and interpretation of interviews as a source of empirical evidence (Yin 2014). The purpose of the interview is to allow researchers to enter into another's perspective (DiCicco-Bloom & Crabtree, 2006). Through interviews, the researcher can get to areas of reality otherwise inaccessible such as subjective experience and attitudes by reconstructing their perception of events and experiences. Interviews build a holistic snapshot of the phenomenon in question and analysis can make allowances for participant's social lives.

The etiquette of interviewing (Creswell 2013): dressing appropriately, being respectful and courteous and staying to an agreed time frame, creates a good first impression, engenders confidence in previously unknown participants and provides reassurance for professional colleagues. The location of interviews is also highly important as a quiet environment facilitates conversation and creates an optimal setting for a clear audio recording (Minichiello, Aroni & Hays 2008).

A recursive method of interviewing has little formal structure (Minichiello, Aroni & Hays 2008), it is facilitated by listening, interpreting and directing the conversation. It uses a conversation style with a basic agenda in an exchange of views between two people who are discussing a common interest at a mutually agreed time and place. The active collaboration between interviewer and participant builds intimacy and fosters deep self-expression that creates authentic, credible and trustworthy data (Liamputtong 2013). The iterative nature of the qualitative research process in which preliminary data analysis coincides with data collection often results in altering questions as the investigator learns

more about the subject (DiCicco-Bloom & Crabtree, 2006). Questions that are not effective at eliciting the necessary information can be dropped and new ones added. Furthermore, the interviewer can depart from the planned itinerary during the interview because 'tangents' can be very productive as they follow the interviewee's interest and knowledge.

6.2.2.2.2 Participant Inclusion Criteria

The inclusion criteria for an invitation to interview was an association with the BFHI strategy or accreditation programme at one or more time points since its inception globally (1989) or its implementation and dissemination in Australia (1991) and up to 2016.

A list of stakeholders involved in the BFHI's introduction and dissemination was developed and used as a basis for recruitment for the interviews. Stakeholders were representative of: UNICEF, ACM, maternity and community services, the Australian government and volunteer organisations. The identity of a number of potential participants who were actively involved in the BFHI's early implementation was revealed through the private and personal document review process undertaken through a review of the archives in May and June 2013. My knowledge of the 'BFHI community' also contributed to the identification of other potential participants. ACM protected the privacy of participants by emailing a study information sheet to those who had an early/historical association with the BFHI and whom I had never met. The information sheet described the study intent and provided contact details to follow up if they were interested in further information or participation. Where a prior professional collegial relationship existed with myself, potential participants were directly approached by email and provided with an information sheet. If they were interested in the study, they were invited to contact me to arrange to participate in an interview. The study information sheet is found in Appendix Number Three and the consent form in Appendix Number Four.

Twenty-one potential participants were approached using the methods outlined above. Unexpected challenges were encountered including a significant delay in response times and six participants eventually declined to participate. Reasons for declining included both concerns about anonymity and an unwillingness to discuss the events of the time. Fifteen participants were ultimately interviewed. One of the 15 withdrew consent for the use of their data after the interview was completed due to apprehension about sharing their perspective. The data of 14 participants in total constituted the final sample. Anonymised details of the participants are presented below with care taken to demonstrate the variation whilst protecting anonymity. The participant's primary affiliation with the BFHI is included. The interviews occurred between January 2014 and February 2016.

TABLE 13: OVERVIEW - PARTICIPANTS' PROFILES

Pseudonym	Health professional	Primary affiliation with the BFHI due to Committee involvement between 1992 and 2016	Primary affiliation with the BFHI due to substantive employment position	Affiliation with a Non-Government or volunteer organisation	International Board-Certified Lactation Consultant	State / Territory
"Bailey"	✓	✓				VIC
"Casey"	✓	✓			✓	VIC
"Charlie"		✓		✓	✓	VIC
"Dale"	✓		✓	✓		NSW
"Daryl"	✓		✓			VIC
"Drew"	✓	✓		✓	✓	TAS
"Jordan"	✓	✓			✓	SA
"Jules"			✓	✓		NSW
"Kelly"	✓		✓	✓	✓	TAS
"Morgan"	✓		✓	✓		NSW
"Reese"	✓		✓	✓	✓	NSW
"Sam"		✓		✓	✓	QLD
"Stevie"			✓			ACT
"Tatum"	✓		✓			ACT

6.2.2.2.3 Interview Data collection

Data collection commenced in January 2014 and was completed in February 2016. The majority of interviews were conducted face to face; all were at a time of the participants' convenience. Settings for interviews included private homes, offices, and quiet cafes. Interviews took on average one hour to complete with a range of 45 to 90 minutes. A brief account of the purpose of the study, opportunities for further information and checking consent documentation occurred prior to commencing the interview. Commencing with general conversation served as an audio check of the quality of the recording and aimed to put participants at ease.

A basic set of open-ended questions to ask and a set of issues to discuss informed the structure of the interview and acted as prompts during it. The study's conceptual framework, Knowledge Translation, informed the interview questions and influenced the set of issues for discussion. Table 14 provides examples of some of the questions and issues discussed.

TABLE 14: EXAMPLES OF ISSUES DISCUSSED AND INTERVIEW QUESTIONS

Issue	Questions
Decision-making processes around the early implementation period	• Can you please tell me what factors influenced the decisions made at that time? • What did you see as the barriers? • What did you see as enabling factors?
Perceptions of the early implementation of the BFHI in Australia	• Can you tell me about your early awareness of the BFHI? • What was your perception about the extent of interest in the BFHI from different stakeholders?
Relationship between the two tiers of government	• What issues do you see with Australia being federated? • How do you see that Australia's constitution has influenced health funding for breastfeeding and the BFHI?
Implementing the BFHI at a local level	• What are the perceptions of the BFHI by health workers? • What are the major challenges to implementation? • What helps?
Breastfeeding advocacy activities	• Can you tell me about the College's relationship with UNICEF? • What do you see as being the relationship between LCANZ and the BFHI? • What will help more hospitals become accredited?
Perceptions of the dissemination of the BFHI in Australia	• Can you please tell me about your experiences with the BFHI up to this point? • How do you see the BFHI today in Australia? • How do you think the BFHI has been influenced by its governance structures?
Policy decisions around breastfeeding support	• How are decisions around the support of breastfeeding and the BFHI made? • What do you think the challenges are?
Implementation versus accreditation	• Why should a hospital become accredited?
The BFHI's future	• Is the BFHI still relevant for the Australian context? • How do you see the future of the BFHI?

As participants brought divergent views each new interview built on the one before and discussion points were refined. Questions and discussion points were not presented in a set order as it may have restricted the nature of the interview and negatively impacted on the 'emergent narrative' (Patton 2002). Discussion centred on participants' perceptions of any enabling factors and barriers to the implementation and dissemination of the BFHI in Australia. Participants were encouraged to share their ideas and speak freely using their own language which Cresswell (2013) identifies as also key to a successful interview. The interview returned to general conversation at its completion and participants were invited to seek any further information about the study's procedure should they wish to. Basic field notes about each interview were written (Yin 2014) to act as 'memory joggers' at a later stage if required.

6.2.2.2.4 Interview Analysis

Thematic analysis (Braun & Clarke 2006) was used to analyse the data of interviewees who had an association with the BFHI in Australia. The analysis facilitated theorisation about the dissemination of a global strategy in a national setting and the support of breastfeeding in Australia.

For de-identification participants' interviews were initially assigned a number (the order in which the interview occurred, #1 to #14) that was later converted to a gender-neutral pseudonym. The 14 interviews were professionally transcribed. The transcripts were checked for accuracy by replaying the tapes and reading the transcripts, making any alterations as required.

While the iterative analysis procedure followed a phased 'recipe' (Braun & Clarke 2006), it also allowed for flexibility to fit the research questions and data (Patton 2002). In Phase One repeated re-reading of the transcripts aided 'immersion' in the data to understand the depth and breadth of the content. Sections of text were highlighted, and brief notes written in the margins of the transcripts. Phase Two generated initial basic codes. As the data were approached with the research questions in mind only text that was identified as representing an 'enabling' factor or 'barrier' was reviewed. To aid data management two NVivo folders were created ('Enablers' and 'Barriers'). Data from the interviews were given a basic code and placed within either folder. Some data were coded several times due to the capacity for multiple interpretations. All participants were asked the same question regarding their opinion of the future of the BFHI. These responses were grouped together in a third, separate folder ('Future'). A notebook was used to aid the iterative process with additional notes and reflections kept in a centralised location.

In Phase Three the different codes within each of the datasets ('Enablers', 'Barriers' and 'Future') were grouped together into potential themes and the data extracts were collated. This process helped identify broad themes along with their contextual narrative. Basic mind maps were produced for each broad theme. Phase Four consisted of reviewing and refining the themes to ensure a coherent pattern and fit to the context existed. The major themes were clarified. To ensure there was a clear distinction between themes some were 'reworked' and others discarded. The entire dataset was re-read to ensure there were no missing data or inaccurate coding and the themes presented an 'accurate representation' of the interviews.

Phase Five further clarified major themes. The data extracts were collated, and an accompanying descriptive narrative was created. The three final themes that were representative of enablers and barriers were: *Rhetoric versus Reality, Human and Fiscal Resourcing* and *Governance Within Competing Agendas*. When considering the question about the future of the BFHI three themes were also evident: *The Environment, Collaboration* and *Leadership*. An audit trail example of manual coding is located in Appendix Number Five.

6.3 Triangulation

The primary purpose of triangulation is to explore convergence, complementarity and dissonance, which strengthens a study's findings and deepens comprehensive understanding of the 'case' (Welsh & Jirojwong 2016, Yin 2014). Two types of triangulation were undertaken, data source and methodological. Data source triangulation was undertaken on each type of data collected, in this study historical documents and participant interviews. The findings from each data source was published separately due to the volume of data involved. The historical document analysis was attended prior to and informed the interview analysis. Methodological triangulation compared the results of the two methods of data collection. An intuitive approach related information obtained from the different data sets to each other. A procedural approach was also attended, which drew on the work of Farmer and colleagues (2006).

The findings from each data set were sorted and placed into two files: documents and interviews. Key themes discussed in each data set were moved into a separate combined list of themes. The themes in the combined list were compared for frequency, convergence and dissonance. The level of agreement between the themes of the two data sets was considered as either full or partial. Themes occurring in only one data set or dissonance between themes was also noted. The summary of the unified findings of the two data sets was compared with the research questions. The results of the interviews and documents

were complementary, contributing to a higher level of analysis and broader understanding of the research question: the presence of enabling factors or barriers to the dissemination of the BFHI in Australia. The results, after feedback from the supervisory panel, inform the discussion chapter.

6.4 Ethical considerations

As a higher degree research student, the supervising panel provided oversight of all aspects of the study. Low risk/negligible approval was obtained in March 2013 from the University of Technology Sydney Committee for Ethics in Human Research prior to the commencement of any data collection, see Appendix Number Two. Support in the form of access to archival documents and personnel was sought from the Australian College of Midwives, which was granted in May 2013, see Appendix Number One. Formal ethics approval was not required for the archival public document review. A password protected computer in a locked office has stored all data related to the conduct of the study, meeting the requirements of ethical data management (National Health and Medical Research Council 2007). The main ethical issues related to maintaining confidentiality in that none of the interview participants would be identified in any publication arising from the research and their informed consent would be required to conduct the interview and to use the material gained. This did become an issue for one participant who later withdrew consent for her interview data to be used. The recording of her interview was deleted, and the transcript shredded. Public documents did not require ethical consideration. Private and personal documents are kept securely, and confidentiality of specific authorship was considered, namely an organisation was identified rather than a specific author within the organisation. Any manuscripts that included comment about the ACM were sent to the Midwifery Advisor in the Policy Unit prior to submission to the journal for consideration to publish.

6.5 Establishing rigour

The importance of and need for trustworthiness and rigour when conducting case study research is well recognised (Houghton et al. 2013). This study used well-documented strategies to enhance its credibility, dependability, confirmability and transferability in an effort to make transparent the judgements that have been made.

The initial strategy was to have a clear aim, design and protocol for the study. Application of the study protocol guided my data collection and increased the study's reliability and dependability (Yin 2014). The study protocol included operationalising as many steps of the study as possible, namely the procedures and practices for data collection, management and analysis. Determining clear boundaries (Luck, Jackson & Usher 2006),

namely the setting (Australia) and time frame (1980 to 2016) was useful in limiting and focusing data collection. The development of a case study database and a clear audit trail (Rosenberg & Yates 2007) supported a systematic organisation of the data, which was essential to prevent becoming overwhelmed and losing sight of the original purpose.

The collection of credible data was the next strategy. My familiarity with the issue of interest provided a 'prolonged engagement' without making too many demands on the participants (Shenton 2004). A specific purposive sampling technique accessed documents and participants that would be representative of the issue of interest, i.e. the dissemination of a global strategy into a national setting. The study included the 'authentic representations' (Liamputtong 2013) of participants, whilst bearing in mind the constructivist assumption that multiple realities are constructed by people in their own contexts. The semi-structured interviews included open-ended questions and followed established protocols (Silverman 2014) to promote trust, confidence and rapport which facilitated thick descriptions.

The strategies used to manage (Yin 2014) and analyse the data were also crucial to maintaining credibility. I took primary responsibility for the coding of the data and identification of themes. The supervisory panel were given samples of coding and explanations of the coding process for discussion. Supervision meetings were opportunities to discuss the progress of the study and address potential confounders to credibility such as the challenges with recruitment and interpretation of data.

A strategy specific to the document analysis was employed to address all aspects of rigour. Constructionists assume that all documents are skewed (Linders 2008). The questions of authenticity, credibility, representativeness and meaning were therefore applied to each document (Payne & Payne 2004) to deal with bias. Addressing source criticism (Miller & Alvarado 2005) by confirming the authenticity and accuracy of all documents reviewed and considering how they indicated the structure and processes of the issue of interest both increased the adequacy of interpretation and confidence of findings.

Member checking (Yin 2014) was not required for the document analysis however it was a strategy attended at various points of the interviews to strengthen credibility. Clarifying questions were asked during interviews to shed further light on some responses. The second member check occurred at the conclusion of the interview when I clarified if the interviewee had anything further they wished to say. A further member check was when the interview transcripts were checked against the audio recordings for meaning and context. A copy of the accepted manuscript was sent to all participants.

The strategy of data triangulation increased my confidence that my interpretation of the data from the documents and interviews was accurate and credible. Incorporating a wide range of documents as well as diversity in participants promoted maximum variation and multiple perspectives to verify or reveal dissonant findings (Shenton 2004). Data saturation with the interviews was not expected to occur as each interviewee presented a different overall perspective and experience. The research questions strengthened construct validity (Yin 2014). Professional and prior knowledge as well as the published literature assisted with analysis and interpretation. Once the preliminary themes were established the data were re-examined for evidence to confirm or disconfirm the themes with the understanding that any conflicting information or the emergence of unique findings would be addressed (Liamputtong 2013). As this approach used my own lens it required mindfulness to look equally both for confirming and disconfirming evidence. The use of reflexivity contributed to this strategy, which is discussed below.

Credibility was further enhanced by peer review (Shenton 2004). Throughout my candidature I have published several literature and methodological reviews, my conceptual framework and data analyses. I have also presented selected aspects of my work at local, state, national and international midwifery and lactation conferences. The presentations have provided the opportunity to have a further focused examination of my findings and helped clarify my thinking around the study as a whole process. The presentations and discussions that ensued with colleagues have provided additional opportunities for reflection. My publications and presentations have affirmed the authenticity of the analysis and credibility of my interpretations.

6.5.1 Researcher reflexivity

The use of reflexivity is integral to the trustworthiness of a study and the credibility of a researcher's findings are enhanced with their use of reflexivity (Dowling 2006). The explicit involvement of the researcher is clearly recognised as they become a research instrument as well as an intermediary in the research process (Medico & Santiago-Delefosse 2014). Although Yin (2014) states that it is an advantage to have a researcher experienced in the issue of interest it is also noted that a researcher's background can influence their objectivity and lead to bias (Andrews, Sullivan & Minichiello 2004).

I recognise that as the primary researcher in this study I have an obligation to be self-examining, self-questioning, self-challenging, self-critical and self-correcting. To achieve this degree of reflexivity I need to turn the researcher lens on myself to recognise and take responsibility for my own 'situatedness' within the research and the effect it may have on the participants and process (Berger 2015). I am aware that my professional role as a

midwife and lactation consultant has contributed to my interest in support of breastfeeding in Australia. My long-standing knowledge and experience in the 'BFHI community' created two opposing issues. The first was that it provided an 'insider' perspective (Jootun, McGhee & Marland 2009) which potentially reassured some participants as they may have felt confident I would understand them and accurately represent their experiences. Having 'shared experiences' (Berger 2015) with some participants and extensive knowledge of the issue of interest meant that I knew what questions to ask and was better equipped to understand the responses in a nuanced and multi-levelled way. In contrast, I recognised there was potential for difficulties around my assumptions and interpretations of the interview data: based on my subjective experience and due to the pre-existing relationship with some participants that may have facilitated their participation. That said, attempts to be 'objective' and detached in assuming a constructed research persona may have been perceived as false and trying to conceal my professional 'self' creating a tension that was unhelpful to the study (Dowling 2006).

Strategies to increase reflexivity were used to strengthen the credibility and authenticity of data collection and analysis. Strategies included creating a transparent process as described previously to establish trustworthiness, such as the use of an audit trail and reflective notes. Participants were able to choose the setting of their interview which lessened the potential for a power imbalance. Any level of relationship was acknowledged before the interview began. Maintaining an analytical degree of distance (Burns et al. 2012) and ongoing discussion with the supervisory panel contributed to ensuring there was an absence of assumptions or presuppositions arising from the participants' 'voices'.

In summary

Case studies cannot make the claim of being typical of a larger population or group as there is no probability test to determine representation. Instead of being representative case studies can however provide theories that are transposable into a variety of settings where the findings 'ring true' for other researchers (Hodkinson & Hodkinson 2001). In this study, the findings from the combined analysis of documents and participants may be relevant to researchers in other national settings who are examining the BFHI in their own country. Analysis of public, private and personal documents has relevance irrespective of country setting. The perceptions, experiences and opinions of key informants apply primarily to Australia however other researchers may discover the results resonate with their own findings.

The main findings of the study are presented in the following two chapters. The findings were published in two discrete papers. The amount of data generated, and journal

constraints meant that full justice to the findings was not feasible if they were combined. Chapter Seven presents the first of the main findings, a review of documents that provided historical context to the early implementation phase of the BFHI in Australia. Chapter Eight presents the findings from participant interviews. The discussion chapter (Nine) uses triangulation to present an amalgamation and discussion of the findings.

7 Presenting the Findings (1)

Overview

Case study research typically collects more than one source of data for analysis, to aid triangulation and increase confidence in the findings. This chapter presents an analysis of the first set of data collected. The data included international and Australian historical documents. The analysis aims to shed light on the socio-political changes associated with implementing a global programme into a national setting via an examination of the influences on the early period of implementation of the BFHI in Australia. UNICEF (International and Australian offices) features strongly in the document analysis findings, to avoid confusion Head Office refers to UNICEF International. The paper, as published, is transcribed below with a copy also located in Appendix Number Eleven, all references are included in the thesis bibliography.

***Peer reviewed paper #5*: An historical document analysis of the introduction of the Baby Friendly Hospital Initiative into the Australian setting.**
Atchan, M., Davis, D. & Foureur, M. 2017, *Women and Birth,* vol. 30, pp.51-62.
http://dx.doi.org/10.1016/j.wombi.2016.07.004

7.1 Introduction

The events leading to the development and release in 1991 and official launch and implementation in 1992, of the Baby Friendly Hospital Initiative (BFHI) by the World Health Organization (WHO) and the United Nations Emergency Children's Fund (UNICEF) represented landmark policy decisions by international agencies in advocating for women's and children's rights. The BFHI is a global, evidence-based, public health initiative and advocacy activity that supports practices promoting the initiation and maintenance of breastfeeding and encourages women's informed infant feeding decisions (World Health Organization and United Nations International Emergency Childrens Fund 1991).

A positive association between the BFHI and breastfeeding prevalence has been demonstrated (Atchan, Davis & Foureur 2014). Nevertheless, the variance of 'baby friendly' accredited hospitals across Australian States and Territories reveals only nominal uptake of BFHI accreditation nationally (Baby Friendly Health Initiative 2016). Research is lacking on the early BFHI implementation period in Australia. The aim of this paper is to examine the introduction of the BFHI into the Australian setting through a focused historical document analysis of the factors that influenced the BFHI's early implementation period in Australia, from 1992 to 1995. An understanding of the

contextual factors surrounding this period will increase stakeholders', researchers', midwives' and policy makers' appreciation of issues identified in recent literature such as the significant variation in women's experience of breastfeeding support from health professionals, including midwives (Schmied et al. 2011).

This paper may also be relevant to researchers in other national settings who are examining the history of the BFHI in their own country. Comprehension of how global initiatives translate into a national setting and are impacted by local context will be enhanced. Understanding the application of knowledge translation from evidence to practice has relevance beyond breastfeeding and the BFHI. Challenges with translating evidence into national policy and maximising funding opportunities have also been observed in the prevention of non-communicable chronic health conditions such as diabetes (Siminerio & Mbanya 2011) and obesity (Whelan et al. 2015).

Implementation of the BFHI globally and in Australia was complex. Reviewing relevant international and national events will contextualise and increase the understanding of subsequent influences on the uptake and development of the BFHI in Australia.

7.2 Contextualising the BFHI in Australia

Throughout most of the twentieth century support for breastfeeding was eroded at all levels of the health care system and women did not receive consistent, timely or accurate advice and assistance (Thompson et al. 2011). Mothers and babies were routinely separated; babies were fed according to a predetermined schedule with liberal artificial supplementation. The presence of free and/or highly subsidised formula milks in the hospital environment was seen as a major barrier to exclusive breastfeeding (United Nations International Children's Emergency Fund 1991a) and the situation required high level action.

Table 15 maps the Declarations and actions that informed and represented international aid agencies' pro-breastfeeding policy statements from 1981 to 1992. The policy statements acknowledged breastfeeding as the most appropriate nutrition for babies and introduced the health promotion concept of breastfeeding as a human right. The creation of a global breastfeeding culture was a clearly desired outcome. International Declarations clarified the key concepts, actions and resources required to reorient health care delivery into a 'social model of health' framework to support culture change.

The *Innocenti Declaration on the protection promotion and support of breastfeeding* (the *Innocenti Declaration*) set the goal of increased support for breastfeeding. The culmination of many years planning the *Innocenti Declaration* described four operational targets to

achieve its goal. World Health Assembly (WHA) member states, including Australia, were expected to implement any international conventions they ratified by strengthening local standards through the development of national policy (United Nations International Children's Emergency Fund 2005). Implementing the BFHI was the *Innocenti Declaration's* second target.

The BFHI accreditation programme was conceptualised as a global recognition of excellence and designed to act as an incentive for maternity facilities that implemented and practised all of the *Ten Steps to Successful Breastfeeding.* Between June 1991 and March 1992, the BFHI was announced, developed, field tested and launched (Kyenkya-Isabirye 1992). Phase 1 field-testing (June 1991 to February 1992) focused on creating capability in twelve specifically chosen 'early starter' low-income nations, with a significant number of pilot hospitals designated as 'baby friendly.' Whilst field testing was underway, all UNICEF offices were contacted via an Executive Directive that outlined the BFHI and presented a 'suggested' implementation schedule (United Nations International Children's Emergency Fund 1991a).

TABLE 15: TIMELINE OF THE INTERNATIONAL DECLARATIONS, DECISIONS AND ACTIONS PRECEDING (AND INCLUDING) THE GLOBAL LAUNCH OF THE BABY-FRIENDLY HOSPITAL INITIATIVE

1981	1989	1990	1991	1992
21 May: Resolution by World Health Assembly WHA 33.32: The *International Code of Marketing of Breast-milk Substitutes* passes by 118 votes to 1 and is ratified by Member States (including Australia) of the World Health Organization (WHO)	Publication of "*Protecting, promoting and supporting breastfeeding: the special role of maternity services. A joint WHO/UNICEF statement*". The "Ten Steps to Successful Breastfeeding" makes its print debut **20 November:** At the General meeting of the United Nations the Member States (including Australia) adopted by acclamation i.e. without a vote and ratified the *Convention on the Rights of the Child* (UN Resolution 44/25)	**30 July-01 August:** Breastfeeding into the 1990s: A Global Initiative, Florence, Italy. Adoption of the *Innocenti Declaration on the protection promotion and support of breastfeeding.* Endorsed by the World Health Assembly and Executive Board of UNICEF providing increased status. The "*Ten Steps to Successful Breastfeeding"* are embedded in policy **30 September:** World Summit for Children held at the United Nations. Adoption of the *World Declaration on the Survival, Protection and Development of Children* and a related *Plan of Action*	**14 February:** World Alliance of Breastfeeding Action (WABA) formed with the purpose of achieving the *Innocenti Declaration's* operational targets **15 May:** WHA 44.33 request to UNICEF's Director General to accelerate planned implementation actions following on from the World Summit for Children **June:** Operational launch of the WHO/UNICEF Baby-Friendly Hospital Initiative and field testing begins **30 August:** Joint WHO-UNICEF letter to all Heads of state/Government on the Baby Friendly Hospital Initiative (BFHI) **26 September:** Official letter to all UNICEF offices informing and advising of BFHI implementation **30 December**: Executive Directive to all offices providing further information, goals, objectives and guidelines for country-level actions	**February:** Field-testing completed. 52 hospitals in twelve low-income nations designated as 'baby friendly' and 15 received a "Certificate of Commitment". Wellstart International hold UNICEF sponsored "Master Trainer/ Assessor" workshop in San Diego with representatives from 24 countries, including Australia **March:** Official global launch of the WHO/UNICEF Baby-Friendly Hospital Initiative **1-7 August**: WABA "World Breastfeeding Week" observed for the first time, celebrating the anniversary of the *Innocenti Declaration*

TABLE 16: UNICEF INTERNATIONAL RECOMMENDED AND AUSTRALIAN ACTUAL IMPLEMENTATION TIMELINE 1992 TO 1995

1992	1993	1994	1995
UNICEF: (By December) ➢ Perform baseline survey to identify country-level goals. ➢ Identify a national BFHI body. Distribute hospital self-appraisal. ➢ Assess hospital conformity with assessment criteria. Identify first and second tier hospitals, a lead BFHI training facility, develop training strategy ➢ Coordinate on-site appraisals. Award BFHI achievement awards and certificates of commitment.	➢ Hand over BFHI to government/national body. ➢ Continue representation on national body.		
Australia: ⌖ *February:* Australian representative attends Wellstart Int BFHI Master Trainer/Assessor workshop in USA. ⌖ *April:* Preliminary meeting in Melbourne hosted by UNICEF. Formation of National Consultative Group (NCG) and Taskforce to develop implementation strategies. ⌖ *May:* The Marketing in Australia of Infant Formulas (MAIF): Manufacturers and Importers Agreement signed and ratified by Commonwealth government. ⌖ *September:* Adaptation of global documents. Field testing at a Melbourne hospital.	⌖ *February:* "BFHI in Australia and New Zealand": an invitation-only free workshop to introduce the BFHI to key stakeholders held in Melbourne. ⌖ *April:* UNICEF Australia dissolves NCG and Taskforce → National Steering Group (NSG). ⌖ *August:* First 'Certificate of Commitment; awarded (Royal Women's Hospital, Melbourne). ⌖ *October:* UNICEF Australia provides part-time secretariat support in the form of a Program Manager. Work demands soon outstrip capacity	⌖ *March:* First successful hospital accreditation (Mitcham Private Hospital, Melbourne). ⌖ *April:* Formal commitment from every state and territory to establish a BFHI state committee. ⌖ *September:* Second successful accreditation (Royal Women's Hospital, Melbourne)	⌖ *January:* Review of BFHI by UNICEF Australia (External process). ⌖ *February:* UNICEF Australia decision to cease BFHI governance. Call for tenders for successor body. Funding agreement identified. ⌖ *July:* Expressions of interest received. ⌖ August: Australian College of Midwives announced as successor body. ⌖ *November:* Responsibility transferred to ACM (minus funding). UNICEF Australia has no further input into BFHI.

Table 16 reveals the actions recommended to occur in 1992 (United Nations International Children's Emergency Fund 1991a). The anticipated result was a rapid embedding of the BFHI programme. Table 16 also presents a timeline of the significant events that occurred in Australia in comparison with the UNICEF targets. Over a three-year period, a number, but not all of the recommended actions were implemented. A national authority (National Steering Group [NSG]) (UNICEF Australia 1993) assumed responsibility for a number of achievements as described in Table 16. Targets identified in the projected timeline (United Nations International Children's Emergency Fund 1991a) that were not realised during the initial implementation period included a national survey of maternity facilities to inform a baseline assessment of the country's situation and the establishment of a 'lead training facility' to act as a 'train the trainer' for breastfeeding.

UNICEF Australia Executive made internal decisions about its relationship with the BFHI, commissioning an options paper and making the ultimate decision to cease governance. UNICEF Australia received expressions of interest from a consortium of breastfeeding advocacy groups: Nursing Mother's Association of Australia, Australian Lactation Consultants Association, Lactation and Infant Feeding Association, Aboriginal Birth and Breastfeeding Association plus a separate bid by the Australian College of Midwives (ACM) (UNICEF Australia 1995a). The ACM bid was submitted without the knowledge of the other NSG members (Minchin 1998) who had assumed that the ACM was part of their consortium. The ACM was announced as the successor body of BFHI in Australia (UNICEF Australia 1995b) with the transfer of responsibility occurring in November 1995. A critical component of the BFHI's transfer to a new successor body was a financial agreement that was part of the tender process (UNICEF Australia 1995b). UNICEF's provision of $25,000 in total over two years to support the ACM take over did not eventuate (Australian College of Midwives 1995), leaving the College in an unforeseen financial deficit situation.

How international and national events ultimately impacted on the implementation and uptake of BFHI across Australia is arguably a crucial element of what has emerged as the breastfeeding culture in Australia. Better understanding of the influences on the current translation of evidence-based breastfeeding knowledge into practice in Australia is required. An exploration of factors that influenced the BFHI during its early implementation phase and later development and uptake appears justified. An instrumental case study (Yin 2014) was undertaken, which was informed by a Knowledge Translation theoretical framework (Atchan, Davis & Foureur 2014).

7.3 Methods and analysis

'The case' in this study is the quality assurance program known as the *BFHI Australia*. The case explores the introduction and implementation of this global programme into the Australian setting. In instrumental case study research investigating 'the case' also serves to facilitate understanding of an intimately related issue. In this study, the focus was the support of breastfeeding in Australia. Case Study Research (CSR) has been shown to be an applicable methodology for midwifery research (Atchan, Davis & Foureur 2016). Case Study Research is an appropriate approach to reveal the highly complex contexts surrounding the development and implementation of a clinical, quality assurance program such as the BFHI.

The CSR design required the collection of data from National policy documents, government reports, organisational minutes and correspondence. Field notes taken when reviewing documents were also utilised. This paper presents an in-depth analysis of public and private documents published and in use leading up to and around the time of initial implementation in Australia. These documents shed light on the challenges of implementing a global programme into a national setting, namely the initial uptake of the BFHI in Australia.

There are good rationales for using document analysis. Documents are distinctive in so far as they exist before the researcher seeks to use them as data (Miller & Alvardo 2005) and may contain far more information than would be gained from an interview or survey. Documents uncover meaning, develop understanding and help the researcher discover new insights about the research problem. The background information as well as historical insights that are obtained can help researchers understand the roots of specific issues. The capacity for triangulation, namely using a variety of sources to strengthen findings, makes document analysis very valuable to case study research (Yin 2014).

This paper contributes to a larger doctoral research study. Ethics approval from the University of Technology Sydney Human Research Ethics Committee was obtained for what was regarded as a low/negligible risk project. Support from the current custodians of the *BFHI Australia* included access to private archival documents. Access to publicly available documents did not require ethical approval.

7.3.1 Sampling Strategy

A purposeful strategy was used to obtain a comprehensive sample of information-rich documents. The selection strategy was based on each document's importance and relevance to breastfeeding and the BFHI implementation process and reliability of authorship. A finite number of documents resulted (Table 17). Knowledge of the situation

assists in setting the text in its context of production to identify richness and limitations (Jordanova 2000). The first author had extensive prior knowledge, understanding and experience with breastfeeding support issues and the BFHI in Australia, facilitating a deeper understanding of relevant interrelated events and documents. The first author was also mindful to acknowledge the existence of prior knowledge and engagement during analysis to ensure the situation did not arise where assumptions and presuppositions could interfere with the findings generated.

Documents are categorised as personal, private or public, depending on who wrote them rather than ownership or availability to the wider population (Payne & Payne 2004). Archival documents may be more personal, individual and private, thus more reflective of 'real life' (Jordanova 2000). Published material may also be polished to be strategic in nature, consequently unpublished material was included to ensure anything relevant to the BFHI implementation period and process was drawn upon. Private documents accessed from the archives of the Australian College of Midwives (ACM) provided a unique insight into decision-making processes and outcomes. Public documents were accessed from the Internet or via the University's document delivery service. The date range of 1980 to 1996 was specifically chosen as it was considered to be highly influential in the development of the support of breastfeeding in Australia. Table 17 identifies the documents which exerted an influence on the BFHI's Australian implementation and uptake in the early 1990s, which is the period under examination.

7.3.2 Analysis Framework

A context analysis framework and a 'documents as commentary' approach (Miller and Alvardo 2005) informed the iterative analysis process. Analysis should seek to locate documents within their social as well as textual context (Coffey 2014). Documents are not produced in isolation; they both refer and are connected to other documents, with meanings that are socially situated. How they are authored, produced, used and consumed reflects social reality. The 'documents as commentary' approach provides insight into individual and collective social practices and structures that are not otherwise observable. The analytical approach for data analysis included careful attention to contrary or alternate examples or explanations and the use of multiple types of documents (Yin 2014). Documents were initially 'skimmed' and examined superficially. Meaningful and relevant data were identified and separated out. Close critical reading probed the precise language use and organisation of the whole text (Jordanova 2000) facilitating deeper understanding of the context in which the document was produced. The text was reread and examined thoroughly. A number of interrelated themes emerged that demonstrated an influence on the BFHI's uptake in Australia during the early implementation phase.

7.4 Findings and Discussion

Using a purposive sampling technique nine National policy reports and twelve organisational archival documents dated between 1982 and 1996 were chosen for analysis. These documents contained references to the support of breastfeeding and or the BFHI. They each contributed to each other and provided an understanding of the national policy and social context in which the support of breastfeeding was practiced during the 1980s and early 1990s. Table 17 identifies the documents accessed, rationale for their selection and data analysed.

TABLE 17: DOCUMENTS SELECTED/TYPE, REASON FOR SELECTION AND DATA ANALYSED

Author/s; Year	Document title; publisher	Type	Reason for selection	Data analysed
Australian policy documents				
Commonwealth of Australia 1982.	*Dietary Guidelines for Australians.* AGPS. Canberra: Commonwealth of Australia.	Public	Initial national breastfeeding policy statement – for consumers and health professionals (HP)	Policy statements' content and language
National Health & Medical Research Council (NHMRC) Public Health Committee 1985.	*Report of the Working Party on Implementation of the WHO International Code of Marketing of Breast-Milk Substitutes March 1985*. AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of the will to adopt and implement the *International Code*	Recommendation's content and language
Better Health Commission 1986.	*Looking Forward to Better Health* (Final Report). AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of the recognition of need for evaluation and monitoring: setting national goals and targets for breastfeeding prevalence and duration	Recommendation's content and language
NHMRC 1992.	*Dietary Guidelines for Australian (n4).* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of changes in or maintenance of policy direction for the support of breastfeeding – for consumers and HP	Published breastfeeding data Policy statements' content and language
Nutbeam, D. et al 1993.	*Goals and Targets for Australia's Health in the Year 2000 and Beyond.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of national monitoring process: national goals and targets set for breastfeeding prevalence and duration	Content, timeframe and language of targets set
Australian Institute of Health & Welfare (AIHW) 1994.	*Australia's Health 1994: the fourth biennial health report of the Australian Institute of Health and Welfare.* Canberra: AGPS.	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for HP	Published breastfeeding data Policy statements' content and language
NHMRC 1995.	*Dietary Guidelines for Children and Adolescents.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for consumers and HP	Published breastfeeding data Policy statements' content and language
NHMRC 1996.	*Infant feeding guidelines for health workers.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for HP	Published breastfeeding data Policy statements' content and language
Commonwealth of Australia 2003.	*Marketing in Australia of Infant Formulas: Manufacturers and Importers Agreement – the MAIF Agreement* www.health.gov.au	Public	Evidence of the will to establish regulatory mechanism for the formula industry in accordance with international recommendations	Agreement's content and language Points of difference with international recommendations
Organisational archival documents				
United Nations International Children's Emergency Fund (UNICEF) 1991.	*Executive Directive Re: Baby-Friendly Hospital Initiative.* (30 December)	Private	Evidence of process of introduction and implementation of the BFHI at country-level	Rationale, background information and implementation schedule
United Nations	Personal communication (external): Letter from	Private	Evidence of process of introduction and	Rationale, background

Author/s; Year	Document title; publisher	Type	Reason for selection	Data analysed
International Children's Emergency Fund (UNICEF) 1991.	Executive Director to Regional Directors, Representatives, Directors and Section Chiefs. (26 September)		implementation of the BFHI at country-level	information and implementation schedule
UNICEF Australia 1992.	Personal communication (external): Letter to Minister for Health Housing & Community Services. (10 June)	Private	Evidence of UNICEF's attempts to engage the national government in dialogue about the BFHI	Content and language
UNICEF Australia 1992.	Personal communication (external): Letter to Public Health Association. (22 December)	Private	Evidence of UNICEF's intent to engage in discussion with national organisations regarding governance of the BFHI	Content and language
UNICEF Australia 1993.	Personal communication (external): Letter to Minister for Aged Family & Health Services. (11 January)	Private	Further evidence of UNICEF's attempts to engage the national government in dialogue about the BFHI	Content and language
Royal Australian College of Obstetricians and Gynaecologists (RACOG) 1992.	Personal communication (external): Letter to President UNICEF Re: BFHI. (19 November)	Private	Evidence of some key stakeholder's perception and attitude towards BFHI	Content and language
RACOG 1993.	Personal communication (external): Letter to UNICEF Re: continued involvement with the BFHI. (28 January)		Evidence of some key stakeholder's perception and attitude towards BFHI	Content and language
UNICEF Australia 1994.	Personal communication (internal): *Baby Friendly Hospital Initiative Discussion Paper.* (20 April)	Private	Evidence of internal tensions within UNICEF regarding the operations of the BFHI	Content and language
UNICEF Australia 1995.	Personal communication (external): Letter to Immediate Past President UNICEF Australia. (01 March)	Private	Documentary evidence of the Decision of the UNICEF Board regarding the BFHI	Content and language
UNICEF Australia 1995.	BFHI National Steering Group Published Minutes 2 March 1995	Private	Evidence of the Resolution of the UNICEF Board regarding the future of the BFHI in Australia	Content and language
UNICEF Australia 1995.	Internal correspondence: Expressions of Interest re: BFHI successor body. (28 July)	Private	Evidence of the tender process and applicants	Content and language
Australian College of Midwives (ACM) 1995.	Personal communication (internal): Interoffice memo re: the BFHI. (13 November)	Private	Evidence of concerns about potential financial implications of governing the BFHI	Content and language

Overall there were differing perceptions and valuing of breastfeeding. There were also different views of the BFHI's role in Australia, its desirability and capacity to create change and debate about an appropriate governance structure. Four discrete themes were identified: "*a breastfeeding culture,*" "r*esource implications,*" *"ambivalent support for breastfeeding and the BFHI*" and *"advocacy versus business*". Each of the four themes is explored and discussed in detail below. A key issue identified in the document analysis was the relationship between the two tiers of government that co-exist in Australia (national and state levels). It is therefore important to begin the presentation of the findings by providing further contextual information about the way national and state-based governments co-exist within Australia and set policy.

Australia operates as a federal system due to its colonial history. There is a two-tiered government structure with an overarching central (Commonwealth) and eight independent state/territory bodies. Each State/Territory has its own constitution, parliament, government and health system. The Commonwealth establishes national priorities and directions in public policy, for example in education and health. Competition for power exists. The States/Territories provide most of the services despite the Commonwealth having financial control due to its income taxing powers. The *Looking Forward to Better Health Report* (Better Health Commission 1986) identified that new Commonwealth initiatives were potentially seen as a threat by the States/Territories; national policy-making was regarded as "an exercise in conflict management" (p.50).

The Australian Commonwealth's representation on international meetings and ratification of Declarations described in Table 15 is an example of national policy-making. At a national level, health policy documents and reports record the progress of support of breastfeeding and the BFHI in Australia. While pursuing a national agenda Australia's policy documents were also a response to the requirement for action from the international Declarations. How the support of breastfeeding and a global strategy, the BFHI, were handled is further explored within each of the four themes.

7.4.1 A breastfeeding culture

Policy documents traced the efforts made at a national level to promote the concept of an Australian culture of breastfeeding. In Australia, the National Health and Medical Research Council (NHMRC) is a national organisation that uses expert panels and public consultation processes to develop health standards and disseminate advice for the community, health professionals and government public policy. Positive rhetoric underpinned the public policy stance for breastfeeding in 1996 as the following quote reveals:

"The Commonwealth Government is committed to protecting, promoting and supporting exclusive breastfeeding for at least the first four to six months of life. Australia is one of the few developed countries in the world to include a guideline on breastfeeding in its dietary guidelines for adults." Infant Feeding Guidelines for Health Workers 1996 (National Health and Medical Research Council 1996) (p.2)

Closer scrutiny of the policy and context exposes significant gaps in the translation of evidence to practice. Four subthemes were identified: *"reporting breastfeeding prevalence and practice"*; *"goals and targets", "limiting applicability"* and *"supporting the BFHI"* which will be discussed in greater detail.

7.4.2 Reporting breastfeeding prevalence and practice

Accurate data about trends in breastfeeding prevalence and practice, which are essential for informed policy formation were lacking. The seeming absence of concern for accuracy and an inflated sense of achievement were exhibited in the language of an early government report:

"The Working Party noted that the incidence of breastfeeding observed among Australian women now ranked among the highest in the Western world and exceeded those reported from several less developed countries." Report of the Working party on Implementation of the WHO International Code of Marketing of Breast-milk Substitutes 1985 (National Health and Medical Research Council Public Health Committee 1985) (p.14).

The incidence of breastfeeding referred to by the Working Party was drawn from a 1982 survey of 'national averages' (Palmer 1985). Data were collected from 83,987 live births from fifty-five representative hospitals; state and territory administrative figures, health department surveys and independent surveys. The survey estimated breastfeeding rates as: 72% at 6-8 weeks; 54-55% at 3 months; 40-42% at 6 months and 10-12% at 12 months. Critical examination has revealed significant methodological flaws, limiting applicability (Webb et al. 2001). Bias included staff's estimation rather than a true quantitative survey of the number of women 'fully' breastfeeding at discharge. With regards to determining duration, the lack of homogeneity, namely inconsistent definitions and methodologies, different infant age groups and reporting periods reduced reliability and meaningfulness of the findings.

The results of a subsequent national survey in 1989 by the Australian Bureau of Statistics (ABS) revealed a different picture (Australian Institute of Health and Welfare 1994). The self-reported overall percentage of breastfeeding at hospital discharge of 77% was gathered from a participant-completed questionnaire returned by12,820 women aged 18

to 50 years. Similar to the 1982 survey significant flaws in methodology were revealed (Lester 1994). Small sample sizes, lack of clear definitions of breastfeeding and age specific rates meant only the percentage of women who had ever breastfed were able to be calculated, not breastfeeding intensity (degree of exclusivity). Exclusion of mothers aged less than 18 and respondent fatigue were further confounders not accounted for. Reporting errors such as respondents not understanding the questions, missing questions or following incorrect sequence guides also survived into the final data set. Secondary analysis of the same data by the ABS (Lund-Adams & Heywood 1994) revealed that despite overestimation there remained a decrease in rates from the 1982 figures at 3 months (originally 54-55% now 28%) and 6 months (originally 40-42% now 23%).

However, a lack of communication between government bodies or an unwillingness to accept the results is suggested as the original figures were again reported rather than the 1989 survey findings:

> *"... in 1983 both prevalence and duration of breastfeeding were among the highest in the world: 85 per cent at discharge and 54–55 per cent three months later."* Dietary Guidelines for Australians 1992 (National Health and Medical Research Council 1992) (p.88)

However, *Australia's Health 1994*, a biennial report on health published by the Australian Institute of Health and Welfare (AIHW) did report the 1989 figures (Australian Institute of Health and Welfare 1994). An independent statistics and research agency within the Commonwealth government, the AIHW's mission is to support public policy-making on health and welfare issues by coordinating, developing, analysing and disseminating national statistics on the health of Australians. *Australia's Health 1994* acknowledged the limitations of current data collection processes while also concluding that the trend to increased breastfeeding prevalence had ceased. Despite long standing proposals to establish a coordinated national monitoring system (Lester 1994; National Health and Medical Research Council Public Health Committee 1985) recommendations for future data collection to ensure the accuracy of the trend were absent. The differences in definitions and methodologies of successive surveys and studies and inconsistency of reporting data meant that the Commonwealth government's claims could not be substantiated. The data's lack comparability and usefulness also impacted on the development and assessment of any national goals and targets.

7.4.3 Goals and targets

Goal and target setting to increase the prevalence and duration of breastfeeding did not contain mechanisms to assess progress. Health goals and targets are used to indicate the

direction and pace of change of health in populations. Goals represent a vision for the future; targets are specific and measurable. The Better Health Commission, chaired by a medical expert with assistance from a panel of professionals established taskforces to investigate morbidity and mortality in the community. *Looking Forward to Better Health* published in 1986 (Better Health Commission 1986) set the first goal for breastfeeding, namely increasing the proportion of Australian babies being breastfed. Initiation was not included. The specific target was to increase rates at 3 months from 50% to 80% by the Year 2000. Using 50% as a baseline figure again suggests the use of the 1982 inflated figures rather than the 1989 survey findings. Using 50% would also mean that less improvement would be required to reach the target. However, strategies to measure progress towards the targets were absent from the Report. A caveat was also included with language that clearly removed any governmental responsibility for implementation:

"The taskforce recommendations are not necessarily those of the Better Health Commission: they are the results of independent inquiries undertaken in the interest of improving the health of all Australians." Looking Forward to Better Health Volume 1 Final Report (Better Health Commission 1986) (p.xii)

A subsequent expert panel developed and published revised goals and set new targets for Australian health standards in 1993. *Goals and targets for Australia's health in the year 2000 and beyond* (Australian Dept. of Health Housing and Community Services and Nutbeam et al. 1993) included breastfeeding under the nutrition umbrella. The targets were specific for hospital discharge plus full and partial breastfeeding up to 2, 3 and 6 months of age however they also did not include any measurable strategies. The expert panel clearly identified that there were insufficient current data on which to base the targets, which is incongruous with the process undertaken. Nevertheless, the goals and targets were referred to in a variety of public documents (Lester 1994; National Health and Medical Research Council 1995, 1996) suggesting the Australian government did not see any incongruence in endorsing the setting of non-measurable outcomes. Embedding the goals and targets in dietary guidelines also demonstrated the Australian government's view that breastfeeding was a nutritional issue.

7.4.4 Limiting applicability

Situating the support of breastfeeding and (later) the BFHI in nutrition policy and dietary guidelines negatively impacted its subsequent applicability to a wide range of potential stakeholders. Australia had previously decided breastfeeding 'belonged' in food and nutrition policy (Langsford 1979). Dietary guidelines are designed to provide advice from health professionals to the general population about healthy food choices. The progression

of the Australian government's conceptualisation of breastfeeding is discernible through the progression of published dietary guidelines. The linkage of the health promotion strategies of breastfeeding and nutrition were observable in the earliest guideline:

"Breastfeeding provides the best nutritional start in life." Dietary Guidelines for Australians 1982 (Commonwealth Department of Health 1982) (p.5)

The recommendations of the 1990 *Innocenti Declaration* (ratified by Australia) clearly situated the support of breastfeeding in a separate dedicated national multisectorial national breastfeeding committee. However, the NHMRC continued to locate breastfeeding in a nutrition framework with the following justification:

"The inclusion of breastfeeding as a dietary guideline is a recognition of the nutritional, health, social and economic benefits of breastfeeding to the Australian community." Dietary Guidelines for Australians (National Health and Medical Research Council 1992) (p. 87)

Not only did the Commonwealth government not demonstrate fulfillment of the international recommendations it had previously endorsed the following quote also suggests the beginning of a conceptual shift of onus to the community to support breastfeeding:

"The health of Australians begins with a good diet in infancy and community education should contribute to increasing breastfeeding rates and education in future generations of Australians." Dietary Guidelines for Australians 1992 (National Health and Medical Research Council 1992) (p. 87)

This theme was further developed in a subsequent guideline:

"Support and encouragement are necessary at all levels of the health system and in the wider community if the contribution of breastfeeding to the health of Australians is to be recognised and the prevalence and duration of breastfeeding are to be increased." Dietary Guidelines for Children and Adolescents (National Health and Medical Research Council 1995) (p.3)

The onus of responsibility and sense of obligation was clearly no longer a national government issue as demonstrated by the contrast between language and context. Policy statements are situated within a highly specific framework, yet breastfeeding is more than the provision of nutrition and diet-related disease risk reduction (Morrow & Barraclough 1993). Dietary guidelines encourage eating patterns to reduce the risk of diet-related disease and improve population wellbeing. The guidelines failed to adequately describe

the complex interrelationships that exist between mother, baby, the family and society at large to facilitate breastfeeding 'success' and long-term health outcomes.

Policy language clearly recommended uptake by a range of stakeholders for a successful outcome. One might argue the panel recognised the limitation of the policy's placement and was attempting to demonstrate wider applicability. A guideline format for policy has limitations however. While the guidelines referred to goals and targets published elsewhere (Australian Dept. of Health Housing and Community Services and Nutbeam et al. 1993) the absence of actionable items meant progress evaluation was not possible and potentially not anticipated or desired. The lack of a consistent system for monitoring clearly impacted on the assessment of targets. The guideline's capacity for demonstrating relevance to a widespread audience was further diminished as it was not possible to establish an accurate picture from which to draw conclusions to inform future direction. The issues faced by policymakers also reached the BFHI.

7.4.5 Supporting the BFHI

The BFHI experienced an extension of the unique policy and implementation challenges already observed in the support of breastfeeding. The NHMRC expanded policy to create companion documents (National Health and Medical Research Council 1995, 1996). The two expert panels only shared three members, the rest were drawn from a wide range of key stakeholders. The *Dietary Guidelines for Children and Adolescent's* section on breastfeeding was informed by a background paper written by the peak breastfeeding support organisation, the (then) Nursing Mothers of Australia (National Health and Medical Research Council 1995). The *Ten Steps to Successful Breastfeeding* was included, but direction and/or encouragement for implementation were absent. The *Infant Feeding Guidelines for Health Workers* development process included the expert panel, submissions and a public consultation process (National Health and Medical Research Council 1996). The following statement was included:

> *"Australian hospitals are encouraged to actively adopt the Ten Steps to Successful Breastfeeding."* Infant Feeding Guidelines for Health Workers 1995 (National Health and Medical Research Council 1996) (p.1)

If a mandate represents official permission for something to happen the language of the above statement fulfills those criteria with the government seeming to give 'permission' for the BFHI's uptake. Contrasting issues are observable however. This policy may have represented the strongest stance possible at the time however 'encouraged to actively adopt' is not a robust statement of national intent. It does not support the impression of absolute endorsement of the BFHI. The language does not represent an indication by the

Commonwealth government of a requirement for action by the States to commit to implementation/accreditation. 'Adoption' may also be subject to a different interpretation to 'implementation'.

At a local level responsibility for the BFHI was clearly placed on the individual hospital, further weakening the persuasive value of 'in principle' support. The BFHI program includes accreditation as a natural end point to publicly demonstrate achievement of the standards. Any guidance for achieving the BFHI's goals or tangible support for implementation and accreditation was absent thus limiting the policy's (and the Commonwealth Government's) potential capacity to drive change. Given the known financial tensions that existed between Commonwealth and State (Better Health Commission 1986) the view of policymakers may have been that the BFHI was not seen either as an effective or an economically feasible strategy to be pursued at a national level.

7.4.6 Resource implications

The provision of resources to implement or evaluate the recommendations for the support of breastfeeding and the BFHI was a recurrent theme observed through a range of documents from key stakeholders.

The following quote clearly identifies the lack of financial assistance UNICEF could expect from Head Office to implement the BFHI:

> *"At country level, activities should be funded from existing country-level budgets."*
> Executive Directive Re: Baby-Friendly Hospital Initiative (United Nations International Children's Emergency Fund 1991a) (p.6)

The Executive Directive mandated the BFHI's implementation, yet UNICEF did not equip its offices with resources to achieve its execution in an optimal manner. The implications for Australia were immediately apparent. UNICEF Australia did not enact the highly detailed and resource intensive 'suggested' implementation schedule described in Table 16. UNICEF's available financial and human resources determined their reaction to unforeseen internal and external challenges and out of necessity adaptation of the schedule occurred, also described in Table 16. The resource allocation required for the 'suggested' implementation may well have negatively impacted on usual UNICEF business activities, namely fund raising for low-income nations. A balance between the two priorities needed to be achieved. The language of the following quote in an internal Discussion Paper implies a warning, concern, perhaps a degree of resentment towards the resources required for program sustainability:

"Considerable time and effort is involved in the BFHI." Baby Friendly Hospital Initiative Discussion Paper (UNICEF Australia 1994b)

Governance was complex as the BFHI was a national program operating out of the UNICEF Victoria branch office. Internal operational issues were identified, including a lack of clarity around budget, communication, responsibility and policy by the 'in house' Discussion Paper (UNICEF Australia 1994b). The tensions arising from the ongoing resourcing requirements may well have contributed to the de-prioritisation of the BFHI and reinforced the intent to find an alternate governing body in the 1995/1996 financial year. External challenges included key stakeholders' apparent lack of interest in governing the BFHI, presumably due to the financial implications. As the BFHI did not receive public policy attention till 1995 (National Health and Medical Research Council 1995) it can be assumed that in Australia in the early 1990s the commitment to breastfeeding support and the BFHI was confined to a fairly narrow sector of the health community. Reviewing UNICEF correspondence reveals multiple attempts to transfer governance of the BFHI. Repeated requests to the Commonwealth government, both by Head Office and Australia (UNICEF and World Health Organization 1994; UNICEF Australia 1992a, 1993) to discuss taking up implementation responsibility were not actioned. UNICEF Australia also enquired whether other national associations had an interest in the BFHI (UNICEF Australia 1992b). The lack of uptake further supports the suggestion that the BFHI was not widely seen as a desirable or financially viable program in the Australian context.

Actioning recommendations have resource implications. Where action was taken in the support of breastfeeding the Commonwealth government appeared to use a cost minimisation approach to policy implementation, namely the least expensive method was chosen. The Dietary Guidelines (Commonwealth Department of Health 1982; National Health and Medical Research Council 1992, 1995) represented one aspect of the policy response to the *WHO Code.* A 1993 Steering Committee reviewed the implementation of the *Who Code* and made specific recommendations to government (Commonwealth Department of Health Housing and Community Services 1993) which contrasted with previous recommendations (National Health and Medical Research Council Public Health Committee 1985). The resulting policy response, *The Marketing in Australia of Infant Formulas: Manufacturers and Importers Agreement – the MAIF Agreement* and Advisory Panel (Commonwealth of Australia 2003) was voluntary, narrow in scope and the Advisory Panel included industry representation, a potential conflict of interest. To enact all the targets of the *Innocenti Declaration* additional legislative and structural changes

were required. The lack of tangible resourcing indicated attitudinal issues were also present.

7.4.7 Ambivalent support for breastfeeding and the BFHI

A sense of ambivalence with regards the importance of support for breastfeeding and the BFHI was also evident from various stakeholders.

The following quote from UNICEF's Executive Directive (1991) demonstrated an assumption of BFHI knowledge at country level prior to its development and launch yet did not suggest an extensive prior communication or consultative process had occurred:

"... a new global effort you have probably heard of by word of mouth or reports from Headquarters." Executive Directive Re: Baby-Friendly Hospital Initiative (United Nations International Children's Emergency Fund 1991a) (p1)

However, Head Office also held the positive opinion that all country offices would enthusiastically embrace the BFHI as identified in the following quote:

"The BFHI should fit naturally with your current field program aims, since it will give strong lift towards several World summit goals." Letter to country office heads (United Nations International Children's Emergency Fund 1991b) (p.2)

UNICEF Australia may well have felt they had few options initially considering the manner in which the program was communicated and delivered, which is in contrast with the recommended social model of health framework and health promotion principles. Examination of UNICEF correspondence revealed a number of issues:

"In response to some community pressure and from New York, UNICEF Australia set up a national task force in mid-1992, with representation from a number of national organisations and with support from others." Correspondence to the President of UNICEF Australia (UNICEF Australia 1994a)

The existence of ambivalence from several areas can be interpreted in the language used: from the identified 'pressure' to set up the task force from various groups and a clear distinction between representation and support from committee members. Some degree of ambivalence is understandable given that UNICEF Australia staff may have held opinions typical of high-income nations at the time. A positive perception existed of formula milk's comparability to breastmilk (Cunningham, Jelliffe & Jelliffe 1991). A limited awareness and understanding that the benefits of breastfeeding applied equally to all babies was also present. One influencing factor for this attitude could have been an unintended effect of the success of the international advocacy campaigns against formula companies in the 1970s. The campaigns highlighted the dangers associated in low-income

nations rather than the risks incurred for any mother and baby regardless of demographic. A sense of complacency and naivety existed amongst many people living in conditions of relative prosperity, namely that their children were immune from risk (Akre 2009). The attitude that the BFHI was more applicable to low-income nations may also have been present in the Commonwealth government, with the perception influencing policymakers' prioritisation of the programme.

Further examples of ambivalence towards the BFHI from key stakeholders were observed, for example the peak body of Obstetricians in Australia was moved to record the following complaint in a letter to UNICEF Australia:

"*Some of your strategies are too restrictive for Australian women and Australian hospitals.*" Correspondence to the President of UNICEF Australia (Royal Australian College of Obstetricians and Gynaecologists 1992).

Support for breastfeeding by the Royal Australian College of Obstetricians and Gynaecologists (RACOG) clearly did not extend to the BFHI; presumably "strategies" refers to the *Ten Steps to Successful Breastfeeding.* This assumption is supported by RACOG's exception to the term 'baby friendly hospital' in the same document stating it suggested discrimination. The RACOG subsequently opted out of physical representation on the NSG (Royal Australian College of Obstetricians and Gynaecologists 1993). RACOG's view represented a lack of understanding of the BFHI philosophy, where women are enabled to freely make informed infant feeding decisions (World Health Organization 1991). The historical subordination of midwives to doctors in Australian maternity services described in the literature (Monk et al. 2013) may also have reinforced obstetricians' desire for and decision to maintain political distance.

A subtle ambivalence with regards to the Commonwealth government's unqualified support for breastfeeding and later the BFHI can also be seen in the language used for recommendations, particularly the inclusions and exclusions. The *Innocenti Declaration* set a goal for achieving optimal health for infants and mothers by clearly describing a recommended standard of breastfeeding practice as follows:

"…all women should be enabled to practise exclusive breastfeeding and all infants should be fed exclusively on breastmilk from birth to 4-6 months of age. Thereafter, children should continue to be breastfed, while receiving appropriate and adequate complementary foods, for up to two years of age or beyond." Innocenti Declaration 1990 (United Nations International Children's Emergency Fund 1990)

Observation of the use of language reveals a significant point of difference in policy. The

Dietary Guidelines (National Health and Medical Research Council 1992, 1995, 1996) concurred with the WHO on exclusivity however they carefully avoided the topic of duration as the following quote reveals:

"Breastfeeding from a healthy well-nourished mother is adequate as the sole source of nutrients for full-term infants from birth until four to six months of life." Dietary Guidelines for Australians (National Health and Medical Research Council 1992) (p.87)

The lack of specificity regarding duration was potentially because some groups in the Australian community at that time may have reacted negatively to the suggestion of breastfeeding for two years (Webb et al. 2001).

The lack of clear policy and direction to support the BFHI also suggests a sense of ambivalence. Potentially its inclusion in policy was meant to signify the BFHI's importance to the wider Australian community. The Commonwealth government could have considered their public position as a reasonable compromise, one that also demonstrated a positive response to their international and national obligations. The lack of national standardisation and clear endorsement of international policy with regards the support of breastfeeding and the BFHI can also be viewed as further examples of a prevailing ambivalent attitude that provided support for the stance of other national organisations. It can also be argued that public policy demonstrated little evidence of advocacy for the women and children of Australia.

7.4.8 Advocacy versus business

A final theme highlighted in the document analysis was the tension between advocacy and business priorities. The BFHI is a global advocacy activity that also aims to influence decisions and practices within the health system at country level. As previously identified such change has funding implications that may not be appealing to policymakers. The tension between advocacy and business was observed in documents at national and (international) local level.

It was optimistic and perhaps naïve of UNICEF to assume or even hope that all governments would decide to implement the actions of the *Innocenti Declaration* in full considering local resource and legislative implications. Australia for example was undergoing a period of economic rationalisation. Health care became an 'industry' and a 'neoliberal market state' evolved with deregulation, privatisation and deletion of government intervention occurring. The economic rationalist agenda impacted on healthcare policy. There was a shift to performance indicators with greater measuring of outputs and outcomes as well as drugs and dollars and minimising bureaucracy. Health care became centralised and privatised. The introduction of new initiatives that had

recurrent resource implications and no proven outcomes had little likelihood of uptake in a climate experiencing wide ranging tax reforms and program reviews to reduce current spending.

UNICEF Australia, as previously identified operated on a limited budget whose primary role was fundraising. The following quote from the report of the external review of the BFHI in 1995 is revealing:

"While strongly supporting the philosophy and basis for establishing the BFHI in Australia and acknowledging the powerful and rapid impact that has been made to date, UNICEF Australia is unable to justify major financial and administrative support of this project when faced with the considerable demands of other vital international initiatives in support of needy women and children in the world's poorest countries." Report for UNICEF Australia Baby Friendly Hospital Project (UNICEF Australia 1995c) (p.4)

The direct outcome of having the contrasting priorities between advocacy and business resulted in tension experienced by an international aid agency prioritizing business on the one hand to support advocacy activities elsewhere. UNICEF Australia was also unused to and inexperienced with governing an unfunded domestic program. It is safe to assume that their actions would also have been influenced by the BFHI's business model at the time of early implementation. Support is also lent to the argument that UNICEF staff did not have a full appreciation of the importance of breastfeeding to the health of women and their families in Australia. The language suggests an attitude that the needs of women and children in low income nations outweighed the needs of Australian women and children, which is arguably a form of reverse discrimination.

The NSG's reaction to UNICEF's decision to withdraw from the BFHI was captured by the Minutes immediately following the announcement:

"The National Steering Group members present expressed deep regret at the decision taken." BFHI National Steering Group Minutes (UNICEF Australia 1995b) (p.2)

UNICEF's resolve to withdraw from the BFHI and to find an alternate governing body was a business decision; however, it was conceptually foreign to the NSG. National Steering Group members were volunteers who fitted BFHI work in around their substantive positions. They shared a belief in the long-term measurable difference to prevalence, duration and health outcomes for society as a whole that could be achieved through the active support of breastfeeding and the BFHI. Similar to UNICEF's view regarding country-level engagement the NSG may also have had an expectation that UNICEF Australia would naturally embrace the BFHI. The NSG were not privy to the inner workings of the UNICEF

Australia Board however. Given more time the BFHI may have become self-sustaining however in the short term it was optimistic of the NSG to assume that UNICEF Australia would continue to fully support a programme that was in deficit.

Similarly, the ACM identified a distinction between altruism and business as revealed in the following reflection recorded immediately after the transfer of governance:

"I am really beginning to think we may have taken on the wrong thing business wise."
ACM interoffice memo (Australian College of Midwives 1995)

The ACM had committed significant resources in its bid to secure sole governance rights of the BFHI. The UNICEF Australia funding agreement did not eventuate, leaving the ACM in an unforeseen financial situation, which would have far-reaching consequences.

7.5 Strengths and Limitations

The construction of a different and deeper understanding of the issues under examination has been achieved using the 'documents as commentary' approach. The international imperative to develop the BFHI and influences on its uptake in Australia has been mapped and analysed. Breastfeeding support has been tracked through the examination of breastfeeding policy documents.

Strengths of this documentary research process included access to a wide range of public and private documents. Methods to enhance trustworthiness in data analysis were employed. A clearly identifiable process using quality criteria was utilised as a means to ensure rigour. The documents and evidence were verified as genuine due to access from official websites, the presence of official letterhead and verifying signatures (authenticity). The documents were free from obvious bias as they were produced for information dissemination rather than personal use (credibility). Public documents analysed reflected current government policy and reports contained recommendations for government action (representativeness). The access to private documents may not have been representative of the totality of the entire set of relevant documents though, impacting on the authors' subsequent capacity to reveal all aspects of the 'story'. However, the evidence contained within all the documents was clear and comprehensible (meaning). 'Source criticism' strategies to ensure quality were also employed (Miller and Alvardo 2005). External critique reinforced quality control with the establishment and credibility of documents verified. Internal critique uncovered how a source can inform the analysis through a consideration of the intentions and abilities of the document's producers and access to events. All documents were clearly linked to events surrounding the early implementation of the BFHI and or the support of breastfeeding in Australia. Individuals, organisations or government departments that were either associated with or had some

responsibility for the events produced the documents. The sampling strategy was chosen to minimise any potential for bias. Data analysis was undertaken by the first author, a doctoral candidate. Close collaboration with the supervisory panel ensured potential bias did not influence the analysis.

Reflexivity was a further method used to encourage rigour. Knowledge production is neither an external process nor is it objective; interpreting data is influenced by the intrinsic qualities and interests of the researcher (Jootun, McGhee & Marland 2009). It was an advantage to have knowledge of the situation to better contextualise the texts under analysis (Jordanova 2000). Deep previous engagement with the BFHI, occupying an 'insider' position (Jootun, McGhee & Marland 2009) was seen as an advantage as the actual policy environment was known. There was a degree of familiarity with a number of the public documents and key stakeholders displayed trust by providing access to private documents. Care was taken not to make assumptions, as they would threaten validity. Any presuppositions on the part of the investigators, due to their prior knowledge were also suspended in order to minimise bias in reporting.

The capacity for influence from interview participants for example was not applicable, as a document exists before the researcher (Miller and Alvardo 2005), however the issue of power remained (Day 2012). Reflexivity of the power relationship resulted in care being taken to avoid any exertion of authority by authoring a particular version of the text; the use of triangulation lessened this potential bias.

7.6 Conclusion

The challenges to implementation identified through the document analysis were many and varied yet interrelated. The Australian two-tier government system added to the complexities of attempting to translate evidence, namely changing the prevailing infant feeding culture through policy and practice. There was little persuasive effort by the Commonwealth government to the States and Territories. Ambivalence towards the importance of support for breastfeeding and the BFHI from several key stakeholders was also observed, with the underpinning thread of resource limitations evident. Consequently, the BFHI was unable to gain good early traction. The support of breastfeeding and the BFHI in Australia was conceptualised as part of and subsumed within a food and nutrition policy rather than a standalone program and primary health care initiative as per international recommendations. While providing policy responses the Commonwealth still essentially distanced itself from fulfilling its obligations as a signatory of the *Innocenti Declaration*. Recommendations included the creation of a multisectorial national committee to take carriage of breastfeeding in Australia, which

included the BFHI. By not actioning these recommendations the Commonwealth government demonstrated a lack of specific direction in the active support for breastfeeding. Furthermore, the provision of a clear mandate for nation-wide full implementation the BFHI and accreditation of maternity facilities was absent. However, the missed opportunity to gain an early understanding and appreciation of breastfeeding as a contextual activity, with interrelationships between social, economic and environmental factors and translate this into policy has had long term impact on the capacity for Australia to develop a comprehensive supportive breastfeeding environment for women, babies and their families.

This analysis has highlighted lessons that could be useful to the implementation of other national health promotion activities. There are a number of recommendations. To affect the translation of evidence into practice carriage of the program by a dedicated multisectorial national committee to oversee all aspects of implementation, evaluate progress and ensure accountability is essential. An initial mapping exercise will determine the current situation as a baseline and identify enablers and barriers. In conjunction with the mapping exercise an economic model of the proposed program with short and long-term projections is required. Clearly worded policy that is applicable to a wide range of stakeholders with specific and tangible incentives will be persuasive to the program's uptake. The establishment of goals and targets informed by current data will indicate the desired direction, pace of change and measure outcomes. Finally, a communication policy and process across all government departments with an ongoing funded national campaign will demonstrate the translation of evidence into practice, unqualified nature of support offered throughout the health system and wider population to facilitate the desired culture change.

In summary

This chapter has constructed a deep understanding of the imperatives surrounding the early efforts to support breastfeeding globally and in the Australian context. The historical document analysis revealed the presence of enabling factors and barriers to the BFHI's early success in Australia. Using the pipeline model as a framework to 'measure' gaps in the strategy's progress, the outcomes of decisions around the BFHI are demonstrated. The international Declarations to which Australia is a signatory were not implemented as intended in the national setting. Stakeholders' ambivalence about the BFHI's aims and incongruence between public policy and government 'buy-in' was also revealed. A lack of adequate resourcing impacted the BFHI's ability to achieve and maintain early momentum.

Chapter Eight presents another aspect of the data collected. It examines the dissemination of the BFHI in Australia through the eyes of 14 participants who had an association with it at one or more times points between 1992 and 2016. The discussion chapter (Nine) presents an amalgamation of the findings.

8 Presenting the Findings (2)

Overview

The analysis of historical documents represented the first part of the data sourced for this study. This chapter presents the findings from the second set of data collection: participant interviews. Fourteen interviews were attended, participants each having a specific association with the BFHI at one or more time points since its global inception and implementation in Australia. Analysis of the interview data reveals that multiple factors have affected the dissemination of the health strategy, the BFHI, into the Australian setting. A future for the BFHI is also described. The paper, as published, is transcribed below with a copy also located in Appendix Number Twelve, all references are included in the thesis bibliography.

Peer reviewed paper #6: An instrumental case study examining the introduction and dissemination of the Baby Friendly Health Initiative in Australia: Participants' perspectives

Atchan, M., Davis, D. & Foureur, M. 2017, *Women and Birth,* in press, corrected proof http://dx.doi.org/10.1016/j.wombi.2017.08.130

8.1 Introduction

Breastmilk is the optimal food for human babies and young children. The importance of breastmilk for long-term health benefits and adverse risks of not breastfeeding and premature weaning in low and high-income nations has recently been reaffirmed (Victora et al. 2016). However, in many nations breastfeeding initiation rates are static and the duration of exclusive breastfeeding declines steadily (UNICEF 2016). Breastfeeding and breastmilk is not widely valued despite attempts to implement measures to protect the entitlements of women and babies (Palmer 2016) such as the global Baby-friendly Hospital Initiative (Rollins et al. 2016). The Baby Friendly Health Initiative (BFHI) in Australia has had a limited uptake if measured by the rate of accredited facilities. How widely BFHI practices have been disseminated in Australian maternity facilities is unknown as there is no formal measurement process by any health governing body.

This study aims to explore the introduction and dissemination of a globally designed and initiated breastfeeding programme, the Baby-friendly Hospital Initiative, into the Australian national setting using an instrumental case study approach. There are two components to this case study. This paper presents one component, namely an exploration of 14 participants' recollections of the initiative's introduction into Australia, their

experiences with the current BFHI and *BFHI Australia* and projections about its future. A previous publication reported on findings from the analysis of key documents published prior to and around early implementation (Atchan, Davis & Foureur 2016). The document analysis found that limited human and fiscal resource allocation at all levels of the healthcare system and government; negatively impacted on the initiative's capacity to gain early traction.

8.1.1 Background to the BFHI

The Baby-friendly Hospital Initiative is a global public health programme developed by the United Nations International Children's Emergency Fund (UNICEF). Its philosophy and principles support women's rights to practice informed infant feeding in a supportive environment (World Health Organization 1991). The initiative is embedded within the *Innocenti Declaration on the protection, promotion and support of breastfeeding* (United Nations International Children's Emergency Fund 1990). Australia was an early signatory to this landmark document, reflecting support at national government level. UNICEF introduced the programme to Australia in 1992.

The underpinning framework, the *Ten Steps to Successful Breastfeeding* (World Health Organization 1991) presents a set of recommended minimum quality assurance standards for the support of breastfeeding in all maternity facilities. Figure 10 sets out the *Ten Steps to Successful Breastfeeding in Australia* (Baby Friendly Health Initiative 2016) with Step 4 amended as per World Health Organization (WHO) recommendations made in the 2009 global revision of the standards (World Health Organization and UNICEF 2009) (p.34). Compliance with the *"Ten Steps"* usually requires some degree of clinical service redesign at a local maternity facility level. Redesign involves the development and implementation of new policies and practices aiming to improve service delivery and facilitate the emergence of a 'breastfeeding culture'.

"The Ten Steps to Successful Breastfeeding in Australia"

1. Have a written breastfeeding policy that is routinely communicated to all health care staff.
2. Train all health care staff in the skills necessary to implement this policy.
3. Inform all pregnant women about the benefits and management of breastfeeding.
4. Place all babies in skin to skin contact with their mothers immediately following birth for at least an hour an encourage mothers to recognise when their babies are ready to breastfeed, offering help if needed.
5. Show mothers how to breastfeed and how to initiate lactation if they are separated from their infants.
6. Give newborn infants no food or drink unless medically indicated.
7. Practice rooming-in and allow mothers and infants to stay together 24 hours a day.
8. Encourage breastfeeding on demand.
9. Give no artificial teats or pacifiers (also called dummies or soothers) to breastfeeding infants.
10. Foster the establishment of breastfeeding support groups and refer mothers on to them on discharge from the hospital or clinic.

FIGURE 10: THE TEN STEPS TO SUCCESSFUL BREASTFEEDING IN AUSTRALIA
Source: http://www.babyfriendly.org.au

The BFHI as a whole is a complex innovation with multiple interventions. While the *"Ten Steps"* are interrelated, they may be implemented individually to facilitate the pace of change management in individual facilities. An accreditation process was embedded into the BFHI. It was envisaged that a public acknowledgment of a hospital's successful designation as 'baby friendly' would become a source of pride and a marketing strategy to incentivise prospective participating hospitals/health services to implement the full package of interventions (United Nations International Children's Emergency Fund 1991). Nationally an accreditation body is responsible for disseminating the programme and undertaking assessments. In Australia, a volunteer National Steering Group (NSG) adapted the global documents to suit the local context while trying to keep as close to the original as possible (Minchin 1998). To create a national identity the accreditation programme is known as *BFHI Australia*. Assessment fees for accreditation are determined by each facility's annual number of births (Baby Friendly Health Initiative 2016). If successful, a certificate designates the hospital as 'baby friendly' and part of a global network that provides a standardised high level of care in the support of infant feeding choices.

The BFHI accreditation programme has been administered by the ACM since 1995 following a competitive tender process to transfer governance from UNICEF. In 2006 ACM changed 'Hospital' to 'Health' to more accurately reflect the expansion of the initiative into community health settings, followed by the release of the *7 Point Plan for Community Services* (Baby Friendly Health Initiative Australia 2016) in 2008.

Introducing and managing complex interventions such as the BFHI is a complicated process with no guarantee of success (Greenhalgh et al. 2004). If the national percentage of 'baby-friendly' accredited Australian facilities is used as a measurable outcome of the initiative's uptake (Baby Friendly Health Initiative 2017) then *BFHI Australia* has not been successful. There is wide variation in uptake of *BFHI Australia* across Australian States and Territories with 70/296 'currently' accredited facilities in 2017 (Baby Friendly Health Initiative 2017). Table 18 details the variance in accredited maternity facilities between States and Territories. For example, Tasmania has100% of facilities accredited (6/6) compared with Western Australia which has 11% (4/36) of facilities accredited (Australian Institute of Health and Welfare 2014, 2016; Baby Friendly Health Initiative 2017).

TABLE 18: AUSTRALIAN BFHI ACCREDITED PUBLIC AND PRIVATE MATERNITY FACILITIES BY STATE/TERRITORY (SAME AS TABLE 1)

State/Territory	Maternity facilities (total)[1, 2]	Accredited maternity facilities[3]	Percentage[4]
Tasmania (TAS)	6	6	100
Northern Territory (NT)	5	4	80
Australian Capital Territory (ACT)	3	2	66
South Australia (SA)	30	14	46
Queensland (QLD)	57	20	35
Victoria (VIC)	70	9	13
New South Wales (NSW)	88	10	11
Western Australia (WA)	36	4	11
Total	296	70	24

Sources:

6 AIHW, *Hospital resources 2014-15: Australian hospital statistics,* Chapter 3 at http://www.aihw.gov.au/publication-detail/?id=60129556122

7 AIHW, *Australian hospital statistics 2012-2013: private hospitals,* Table 2.3 at http://www.aihw.gov.au/WorkArea/DownloadAsset.aspx?id=60129548953

8 Baby Friendly Health Initiative (BFHI) Accredited Facilities at https://www.midwives.org.au/baby-friendly-health-initiative-bfhi (Accessed 5th September 2017)

Legend:

9 Percentages rounded up or down

8.2 Background and Justification for the Study

Neither international (World Health Organization 2003) nor national (National Health and Medical Research Council 2012) breastfeeding practice recommendations are being met in Australia. In the *2010 Australian National Infant Feeding Survey,* (Australian Institute of Health and Welfare 2011) the primary caregivers of 28,759 Australian-born children aged 0-2 years revealed that only 39% of babies were exclusively breastfed to three months of age and 15% to five months despite an 'ever breastfed' rate of 96%. The findings support previous Australian health surveys (Amir & Donath 2008) that identified a consistent discrepancy in duration rates according to socio-economic circumstances. Women in socially disadvantaged circumstances are introducing non-human milks and foods earlier than women with higher incomes.

Evidence suggests that women's early feeding experiences are influenced by the policies and practices of maternity facilities (Hector et al. 2005). Australian researchers propose

that the rise in institutionalised and medicalised childbirth has negatively affected traditional midwifery practices (Thompson et al. 2011) with particularly detrimental consequences for breastfeeding support. A systematic review of the literature (Swerts et al. 2016) concluded that the majority of midwives provide breastfeeding support as a 'technical expert' rather than a 'skilled companion'. Midwifery language is also revealed as a barrier to appropriate support when it reinforces a perception of breastfeeding's complexity (Burns et al. 2013). These findings are further reflected in a meta synthesis that revealed women describe either 'authentic' or 'disconnected' breastfeeding experiences from health professionals (Schmied et al. 2009). In a recent study of 4310 Queensland women (Zadoroznyi et al. 2015) 26% expressed concern about their experiences of inadequate or inconsistent breastfeeding support whilst in hospital. In addition, a review of the organisation and structure of Victorian postnatal wards (McLachlan et al. 2008) revealed that understaffing and lack of time were common features that acted as barriers to providing appropriate support. The distress that women experience when their support needs have not been met impacts on their subsequent infant feeding decisions (Lee & Furedi 2005). This is the context in which the BFHI and *BFHI Australia* operate.

Another aspect of the context that needs to be considered is that Australia's complex political systems may also act as barriers to the success of the BFHI in this country. Politically Australia consists of a Commonwealth (national) government with eight States and Territories that have their own constitutions, parliament, government and health system. The Commonwealth sets *policy direction* in health and education, while maintaining overarching financial control. However, the States/Territories *provide most of the services* from within their own budgets. This two-tiered governance and fiscal reality creates a tension in designing and implementing health policy (Atchan, Davis & Foureur 2016). The result is the BFHI in Australia is supported 'in principle' by both national and State/Territory health policy however there is no clear imperative at either level for implementation or accreditation. There is little funding support and no standard set for health facilities to be accredited.

Australian BFHI implementation data are non-existent at national and sparse at state-level. Between 2002 and 2011 one state, Victoria, published manually collected, self-assessed data provided by public hospitals on their compliance with the *Ten Steps to Successful Breastfeeding*. The average number of steps achieved was reported as 8 out of 10 in 2002 (State of Victoria 2009) rising to 9.5 out of 10 in 2011(State of Victoria 2014). Publication of manually collected data ceased from the 2011-12 reporting period and the

indicator was 'retired' either because it was regarded as no longer necessary owing to the high number of steps achieved, or because the self-reported nature of the data may have been found wanting. During this same time period, a retrospective cohort study of 6,752 Queensland women birthing in 2009 examined the impact of four BFHI practices: rooming-in, time of first breastfeed, supplementation in hospital and skin-to-skin contact. Fifty percent of women identified they experienced the four BFHI supportive hospital practices, irrespective of the hospital's BFHI accreditation status (Brodribb, Kruske & Miller 2013) suggesting some diffusion of the innovation has occurred in Australia. However, as the full extent of implementation has never been measured it is not possible to clearly identify the standard of breastfeeding support and degree of impact the BFHI has achieved Australia-wide.

In a previous publication presenting results of a document analysis we identified a number of barriers impacting on the introduction and dissemination of the BFHI into Australia (Atchan, Davis & Foureur 2016). The document analysis revealed a sense of ambivalence toward the importance of breastfeeding and the BFHI by key stakeholder organisations, a lack of adequate resourcing to implement and disseminate the initiative and contrasting priorities between advocacy and business. The relationship between the States/Territories and Commonwealth government in Australia was also a key issue as responsibility for BFHI implementation appeared to be 'lost' between the two. Australian research has revealed further barriers including: a lack of commitment by experienced midwives in some 'baby-friendly' facilities who only comply with the BFHI if workload and time allow (Reddin, Pincombe & Darbyshire 2007) and a lack of understanding by hospital administrators and policy makers that part of their remit includes support and funding for promoting breastfeeding in the community (Walsh, Pincombe & Henderson 2011). Differing perceptions of the BFHI have been displayed by health professionals who are focused on tick box management rather than sitting with women and talking about breastfeeding (Schmeid et al. 2011). Understanding factors that may have exerted an influence on the initial uptake, consequent growth, development, dissemination and potential future of the BFHI in Australia is therefore warranted and was the impetus for this study.

8.3 Study Design and Methods

This study used an instrumental case study design (Stake 1995; Yin 2014) by examining a 'case' to provide insight into a particular issue of interest and facilitating the understanding of 'something else' (Grandy 2012). In this study, the 'case' is the BFHI in Australia and the issue of interest is the dissemination of a global health strategy in a

national setting. The ‘something else’ is the ongoing and future support of breastfeeding in Australia. Complementary data collection methods such as interviews and document analysis strengthen confidence in a study's findings while privileging participants' 'voices'. Diverse sources of data have been examined in this case study including relevant archival documents and interviews with participants involved in the BFHI at national and international levels, currently and historically. While instrumental case studies offer thick description of the particular phenomenon being examined the volume of data included in this study has required separate publications for document analysis (Atchan, Davis & Foureur 2016) and interview findings. By examining the views of diverse participants this paper aims to increase understanding of the factors impacting on the introduction and uptake of *BFHI Australia* in order to inform its future path.

8.3.1 Recruitment of Participants

Purposive sampling was used to recruit participants with diverse experience of the BFHI in Australia. Participants were identified either through the review of archival documents or as known members of government, non-government (NGO) and volunteer organisations that include the support of breastfeeding. Consequently, all participants had particular knowledge of or an association with the BFHI at one or more time points since its global introduction and Australian implementation in 1992.

A list of potential participants with an historical as well as current association with *BFHI Australia* was compiled by the first author. ACM demonstrated support for the project by emailing those potential participants who had an historical BFHI association (and had never met the first author) and providing a study information sheet with contact details to follow up if they were interested in further information or participation. Where a prior professional collegial relationship existed with the first author, prospective participants were directly approached by email and were provided with an information sheet. If they were interested in the study, they were invited to contact the first author to arrange to participate in an interview. The study's purpose was clearly explained, namely to obtain participants' perspectives about the dissemination of the BFHI in Australia. All participants signed consent before their interview.

8.3.2 Method

Interviews were conducted between January 2014 and February 2016. All interviews but one was conducted face to face to promote participants' relaxation and facilitate comprehensive responses. Interviews were conducted at the participant's convenience: offices, cafes and homes. Questions were open-ended and modified to suit the particular context of the participant, with prompting as required. Participants were asked to describe their experiences of the introduction, dissemination and current state of the BFHI

and *BFHI Australia*. Factors that acted as enablers and barriers were explored. Finally, an opinion of the future of both the BFHI and the accreditation programme was elicited with discussion around viability. Interviews were digitally recorded and transcribed verbatim. Transcripts were checked for accuracy with the recording. Field notes were made during the interview and afterwards when listening to the sound file. Interviews ranged from 45 to 90 minutes duration. Participants were assigned a pseudonym for anonymity. Data saturation was not expected to occur as each participant presented a different overall perspective and experience.

8.3.3 Data Analysis

A thematic analysis (Braun & Clarke 2006) of the data was undertaken. The transcripts were read multiple times by the first author to aid familiarisation. Notes were written on the text and highlighters used to identify segments of interest. Using Braun and Clark's (2006) framework, which draws on the work of Boyatzis (1998), initial codes were generated. NVivo software was used to manage the data. As the data were approached with the research questions in mind, namely enablers and barriers to the BFHI's dissemination and the support of breastfeeding in Australia, only particular features of the dataset were identified. The data were then tagged, named and reviewed manually by the first author. The four themes identified from the historical document analysis: *"a breastfeeding culture"; "resource implications"; "ambivalent support for breastfeeding and the BFHI"* and *"business versus advocacy";* were used to guide the interview analysis and promote triangulation. The document analysis was completed before the analysis of the transcripts therefore the themes emerging from the document analysis were prescient as we approached the data set. Emergent themes arising from the data analysis were discussed with the primary author and supervisory panel and modifications made until consensus was reached.

8.3.4 Ethical Issues

The study received low/negligible project ethics approval from the University of Technology Sydney (2013000053) and written support from the Australian College of Midwives. The main ethical issues were ensuring informed consent to participate and the anonymity of participants.

8.3.5 Trustworthiness and Rigour

Strategies that ensure credibility (triangulation), dependability (reflexivity), confirmability (audit trail) and transferability (thick descriptions) to determine rigour in case study research (Houghton et al. 2013) were used. The first author had experience with *BFHI Australia* as a member of state and national BFHI committees and employment as a midwife/lactation consultant in the public health system. It was through participation

in the wider 'lactation community' that previous collegial relationships were formed with some participants in this study. Any level of relationship and potential for bias was acknowledged prior to commencing the interview.

Prior experience provided an 'insider' perspective (Jootun, McGhee & Marland 2009) and greater insight into the case of interest, the BFHI in Australia. It was important to maintain an analytical degree of distance (Burns et al. 2012) to ensure the absence of assumptions or presuppositions arising from the participants' 'voices'. The first author was mindful that assumptions and presuppositions resulting from her knowledge and prior relationships could interfere with the findings generated. Ongoing discussion with the supervisory panel also minimised this potential bias.

8.4 Findings

Twenty-one potential participants were approached. Six declined to participate. Reasons for declining included both concerns about anonymity and unwillingness to discuss the events of the time. Fifteen participants were interviewed. One of the 15 withdrew consent for the use of their data after the interview was completed due to apprehension about sharing their perspective. The data of 14 participants in total were analysed.

Table 19 presents an overview of the participants' profiles with care taken to maintain anonymity. Ten (71%) held qualifications in a health profession although it may not have been their substantive position at the time of interview. Seven (50%) held qualifications in lactation consultancy. Participants' association with the BFHI in Australia was varied: eight (57%) were associated as a result of their substantive position of employment and six (43%) were members of BFHI associated Committees. Some participants held multiple roles, with eight (57%) being affiliated with an NGO or volunteer organisation as well as *BFHI Australia*. Geographically participants lived in one of six States and Territories in Australia with no representation from the Northern Territory or Western Australia.

TABLE 19: OVERVIEW - PARTICIPANTS' PROFILES (SAME AS TABLE 13)

Pseudonym	Health professional	Primary affiliation with the BFHI due to Committee involvement between 1992 and 2016	Primary affiliation with the BFHI due to substantive employment position	Affiliation with a Non-Government or volunteer organisation	International Board-Certified Lactation Consultant	State / Territory
"Bailey"	✓	✓				VIC
"Casey"	✓	✓			✓	VIC
"Charlie"		✓		✓	✓	VIC
"Dale"	✓		✓	✓		NSW
"Daryl"	✓		✓			VIC
"Drew"	✓	✓		✓	✓	TAS
"Jordan"	✓	✓			✓	SA
"Jules"			✓	✓		NSW
"Kelly"	✓		✓	✓	✓	TAS
"Morgan"	✓		✓	✓		NSW
"Reese"	✓		✓	✓	✓	NSW
"Sam"		✓		✓	✓	QLD
"Stevie"			✓			ACT
"Tatum"	✓		✓			ACT

Data analysis revealed three main themes influencing the BFHI and dissemination of *BFHI Australia*: *"Rhetoric versus Reality"; "Human and Fiscal Resourcing"* and, *"Governance within Competing Agendas"*. Participants identified different perceptions of the issues relevant to the support of breastfeeding, due in part to their diversity of backgrounds and association with the dissemination of *BFHI Australia*.

8.4.1 Rhetoric versus reality

A lack of congruence between public rhetoric and the reality of breastfeeding support as it is experienced at a variety of levels in Australia was revealed.

Statements supportive of breastfeeding have been included in national policy documents since the 1980s with the publication of a national strategy in 2010. The presence of these statements and policy were proposed as strong evidence of attention and support at the highest government level:

"... for a start, there is one [a national breastfeeding policy document], which is actually really important because you can look at other areas and there's no statement..." ("Tatum")

The Commonwealth devolves national health policy to the States to be operationalised which limits its influence over service delivery. This situation was identified as a paradox of the Australian Constitution. The resulting funding tension between the Commonwealth and States has resulted in barriers to effective dissemination of *BFHI Australia* as revealed by one participant who reflected on what was perceived as an inability to actually 'make' state governments implement national policy:

"We would say, [the BFHI is] a state issue because they [the States] deal with the services on the ground. At a Commonwealth level, what teeth do we actually have to tell State governments what to do?" ("Tatum")

Another participant proposed that the presence of national government rhetoric and accompanying lack of targeted government action signified tokenism for this particular public health message and a degree of ambivalence towards breastfeeding:

"They [the government] keep saying it's a good thing but they don't do anything about it. They don't actively promote it. I suppose they do on their website but it's like the usual lip service to things like, don't smoke, eat well, breastfeed but there's nothing put in there, Commonwealth government-wise to support it." ("Reese")

Some participants considered that the lack of impetus for accreditation has directly resulted in the current inability to accurately determine the extent of BFHI implementation at an organisational level. This was reflected in mixed opinions expressed about *BFHI Australia's* influence and dissemination. Some participants revealed an optimistic view that government rhetoric had been a positive influence with a translation of evidence into practice occurring to better support women and their families:

"It's not as good as we'd like, but I think it has filtered through… even though we don't have that many hospitals overall which are Baby Friendly, the other hospitals mostly will be following the same sort of practices." ("Casey")

Others expressed an opposite reality suggesting that only the BFHI elements that fitted with a facility's overall philosophy and those that were easier to put in place, were implemented. Participants revealed that the prevailing culture of the facility influences the intention to pursue accreditation:

" 'Oh, we do this' [the BFHI]. But they don't do it properly. They might say, 'Oh well, we do this but…' There's one Step that doesn't quite fit with everything that they want to do so they don't go down the track of being accredited." ("Jordan")

While the *Ten Steps to Successful Breastfeeding* have been designed to allow for a paced implementation the BFHI identifies that a whole systems approach is required for ultimate adherence. At a local level, several participants used the realities of the postnatal environment experienced by women in many organisations as an example of challenges in trying to implement BFHI practices within a fragmented system:

"A postnatal ward in a hospital is not the place to learn to breastfeed. We're trying to create it with BFHI and create this environment, but at the end of the day, it's a mad field. It's a cattle yard. And it's no way to learn to get to know and [learn to] feed your new baby." ("Morgan")

Participants asserted that the lack of tangible commitment at government and organisational levels reinforces the perception of an unsupportive environment for women in both the hospital and community setting. They regarded the failure of the health system to fully endorse breastfeeding as contributing to the low duration rates and the emotional distress many women experience when their needs remain unmet:

"I think we let women down so much they finish up blaming themselves. They really should be angry with the system that's let them down, that hasn't given them the support." ("Drew")

"What's the point of telling women they should breastfeed if the institutions and the health professionals ensure that they can't succeed? All you do is add to the burden of misery they're going to feel." ("Charlie")

A critical perspective of the Commonwealth government's level of support was strongly evident with participants describing the government as allowing a 'watering down' of the BFHI at an organisational level, which has affected *BFHI Australia's* dissemination and resulted in women potentially experiencing significant disadvantage by being 'let down' by the system.

8.4.2 Fiscal and Human Resourcing

Adequate resourcing at all levels was repeatedly identified by participants as crucial to the support of breastfeeding, the BFHI and dissemination of *BFHI Australia*. Resourcing was classified into one of two categories: fiscal and human.

Diverging views were expressed regarding the adequacy or inadequacy of the financial support currently provided by the Commonwealth government. The provision of funding for select services was proposed by one participant as proof of a positive contribution:

"The government would argue that their investments in services around it [supporting breastfeeding] are substantial, such as the breastfeeding association, the helpline and all those sorts of things." ("Tatum")

In contrast to this view other participants identified a higher level of political will and funding was required to decrease the current burden on facilities and volunteers and bring Australia in line with other high achieving countries:

"For smaller hospitals cost is a big inhibiting factor... there just isn't enough internal funding to pay for the project manager and staff education.... in countries where there's a high number of hospitals that are actually accredited, it's because the government has come in and said, you have to do this process, whether you like it or not." ("Stevie")

This suggests that implementation or adoption of the initiative would be strengthened by government backing. Participants also revealed that competition for Commonwealth backing and resourcing is fierce, highly political and most of the government's 'work' is about managing the cost to the system:

"So, at the moment it's [the budget] actually about protecting the deficit and reducing the expenditure. So, you're coming along with an idea that you're going to want to spend more money, well where is the government going to get money from or who do they take the money off to actually do that?" ("Tatum")

Identifying and providing adequate human resources was also revealed as beneficial to many aspects of the BFHI strategy in Australia. The volunteer cadre was identified as a human resource that value-adds to *BFHI Australia.* The contribution made by volunteers was described as crucial to its sustainability although undervalued. Participants highlighted the depth of commitment of breastfeeding advocates:

"There is a total dependence on volunteers and volunteer hours." ("Kelly")

"Assessing, it's a minimal amount of money, you don't do it for the money, you do it for the love of it really and because you believe in it." ("Drew")

Participants suggested that the external perception of *BFHI Australia* was an NGO that has a low profile and an inability to capitalise on available resource potentials. Fostering political alliances and developing relationships with the influential Australian National Safety and Quality Health Service Standards (NSQHS) organisation were revealed as valuable opportunities to explore in the future which may raise the profile of the BFHI and increase dissemination of *BFHI Australia*:

"I think the general public doesn't really know the difference between going to a Baby Friendly Hospital and not." ("Casey")

"If we could get the BFHI standards into the Hospital accreditation standards that would go a long way to being a stick rather than a carrot." ("Dale")

The Australian government acknowledges the importance of breastfeeding and the BFHI through policy documents. Intention contrasts with reality however. The government's willingness to incentivise the BFHI to increase dissemination appears to be negatively influenced by finite resources and competing priorities. Increasing advocacy activities may raise the profile of *BFHI Australia* and foster a political imperative for change.

8.4.3 Governance within competing agendas

The role of government is critical to the ongoing success of the BFHI in Australia according to all participants. Effective governance of *BFHI Australia* has been and continues to be central to its capacity for successful dissemination. Participants revealed the significant impact of competing agendas on the BFHI and *BFHI Australia*. At a national and state level Australian parliamentary process creates substantial barriers to the development of tangible supports for breastfeeding. The challenge of creating enough political empathy for breastfeeding strategies amongst short-term policymakers who do not appear to share the passion or endorse the potential health benefits of breastfeeding was highlighted by participants:

"It is a problem for Australia the frequency by which governments change and the lack of continuity around policy. It's quite hard for people to do it and people don't necessarily see the benefit around it...governments are about short term - governments are about re-election." ("Tatum")

"When the Health Ministry is seen as a poison[ed] chalice, a poor career move, where they see it as a step to something else, they're not going to do something that isn't on their particular list of what can get done in a limited time." ("Sam")

Participants identified that the presence of governance structures to ensure safety and quality in health care delivery could influence the way the BFHI has been interpreted in

some Australian facilities. The dichotomy of disseminating a product that suits the needs of the health care system rather than women was highlighted. A participant expressed a concern that midwives might interact with women in less meaningful ways due to the competitive demands of the 'system':

"What we've done with BFHI, it appears, is interpret it in a fairly rigid way that means we don't offer women anything… We give the impression that there are rules that one must stick to. You can't blame the individual midwives. I mean some [rules] are really a bit over the top in different ways but it's the governance of the system." ("Morgan")

Historically there was the perception of a fundamental difference in opinion amongst stakeholders regarding *BFHI Australia's* primary agenda: financial viability or advocacy activities. Participants revealed their perceptions of the challenges faced by all stakeholders to achieve consensus and its effect on the BFHI in Australia as a whole.

In 1995 UNICEF Australia was reluctant to continue its level of engagement with the BFHI due to competition for its scarce resources plus its own advocacy agenda which focussed on international aid programs. The rationale for decisions made and actions taken to try and secure its future at that time were discussed by several participants:

"It was seen as wise to find a player who would look after and govern Baby-Friendly. It would have folded because there was no doubt the incoming [UNICEF] Board were supportive of it but they didn't want to carry it on. It wasn't because they discounted the work; they [UNICEF] just didn't see it as part of their role. UNICEF didn't want to offend anyone, so everybody was told that this [the tender process] was happening. But, in house, the preferred operator was midwives because they [UNICEF] saw a natural relationship and probably a better potential for getting it [the BFHI] to happen." ("Bailey")

A participant who had worked to implement the BFHI in Australia stated considerable time had been given to preparing a tender application for a consortium to become the governing body. That tender was ultimately unsuccessful as ACM was awarded BFHI governance. Another participant identified the ensuing 'collateral damage' had a detrimental effect on the BFHI's momentum and profile within the health system. Collateral damage described included tensions within *BFHI Australia's* volunteer committee (the National Steering Group – NSG) arising from UNICEF's apparent lack of trust in their ability to govern BFHI. A perception of competing ACM business and advocacy agendas was also disclosed. A number of participants further revealed a perception that the ACM was focussed on a cost recovery model management structure at the expense of being a strong advocate for the dissemination of *BFHI Australia*. For

example, participants perceived that by not appointing a full-time manager the advocacy agenda of the Committee was undermined and ACM under resourced *BFHI Australia.* ACM's financial situation after it assumed governance of *BFHI Australia* in 1995 exacerbated the situation. However, the positive breastfeeding advocacy role of ACM by not dismantling *BFHI Australia* despite financial pressure to do so was also acknowledged:

"When the ACM were given the tender they immediately said, 'Well, we're stopping all assessments and everything else' and then everything just died for two years. The amount of anger that was generated by all these people that were working towards becoming accredited, all the volunteer hours that people had been putting in, was just huge." ("Drew")

"There was this push for the [National Steering] Committee [NSG] to understand the College's position which was, it's [BFHI] costing us a lot of money and we need to change that situation.... the College was broke." ("Dale")

"The erratic-ness of the whole business seems to me to be about different personalities and different individuals leading, pushing or resisting. And until we can get past that then it's just different individuals and we go nowhere really, we keep batting our head against a brick wall." ("Kelly")

"Despite everything and despite it not being their core business they [the ACM] have kept it going. And I don't know whether anyone else would have managed to." ("Drew")

Participants revealed their perceptions of an apparent mismatch of agendas that appears to persist as an ongoing influence on governance and dissemination of *BFHI Australia.* All participants viewed the priorities for *BFHI Australia* through their own particular lens:

"Each of those stakeholders has very different agendas. The way that BFHI is being implemented in Australia is not about advocacy and a lot of the stakeholder groups are advocacy organisations." ("Stevie")

Stakeholders' agendas and governance structures have all exerted an influence at some time point on the actions of individuals and organisations. As a result, barriers to *BFHI Australia's* dissemination have occurred through decreased political will and the presence of internal tensions within the organisation itself.

8.4.4 Moving forward

Participants were asked their opinion of the future in Australia for the BFHI and *BFHI Australia*. Three interrelated themes emerged: *"The Environment"; "Leadership"* and *"Collaboration."*

8.4.4.1.1 The Environment

A politically sympathetic environment with active government involvement and tangible support was revealed as crucial to providing the impetus required for future expansion. A review of the programme was also identified as an opportunity to create a fresh image and strengthen the product:

"I want to see a directive from above, that all hospitals will become 'baby-friendly." ("Drew")

"BFHI needs a new image." ("Morgan")

8.4.4.1.2 8.4.4.2 Leadership

Participants were divided about whether *BFHI Australia* should stay under the current governance structure. Irrespective of where *BFHI Australia* sat, strong and effective leadership was identified as an essential requirement to drive a committee and secure agreement about desired outcomes:

"You're going to have to get people around the table and say, 'We can agree on this. There's a whole lot of things we can't necessarily agree on. But we can agree on this specific strategy and plan'." ("Jules")

8.4.4.1.3 Collaboration

Consensus and collaboration between key stakeholders was recognised as an effective strategy to increase capacity for BFHI uptake and to assist *BFHI Australia* to meet its aims. Proposed outcomes demonstrated the nature of participants' agendas, incorporating both increased political advocacy opportunities and sustained practice change:

"Stakeholders do have to be involved so that change can actually come to fruition. So, that over the next 10 years it [the BFHI] will actually look quite different to what it looks like now, and those organisations will all be intricately linked. Their resources will all refer to each other and we'll be referring to each other. For the mothers, it's a done deal. The hospitals are helping them do this. The community organisations are helping do that. Those private advocacy organisations are helping them do that. It all fits together like a big jigsaw puzzle, and all they [mothers] have to do is - do it." ("Stevie")

Overall participants were of the opinion that the capacity of the BFHI to have a measurable positive effect in Australia will be increased with the synergistic influences of a strong political will, effective leadership and collaboration between key stakeholders.

8.5 Discussion

Australian researchers have previously investigated various aspects of the BFHI, for example measuring women's experiences of supportive practices, staff attitudes and systems barriers. This is the first study to gather a diverse range of participants from the

health system, volunteer organisations and government to examine factors influencing the dissemination of the BFHI and *BFHI Australia*, its accreditation programme. All participants were supportive of the BFHI in principle but also critical of some aspects of its dissemination. The perceptions of *BFHI Australia* were also influenced by participants' organisation or association's lens: government, business or advocacy-based. The complexity of harnessing different agendas and creating synchronicity to achieve a common goal was seen as a limiting factor. This discussion of the findings of participants' interviews makes recommendations for future activities to support breastfeeding and a potential pathway for *BFHI Australia.*

The previously published document analysis that is an integral part of this case study (Atchan, Davis & Foureur 2016) mapped the BFHI's early implementation period in Australia. The analysis of National policy reports and organisational archival documents provided an understanding of the Australian socio-political context for breastfeeding support around the time of the BFHI's introduction. Resourcing, culture, level and type of support and the dichotomy of business and advocacy activities played a significant role in *BFHI Australia's* formative period. The issues were shown to be interrelated with fewer enabling factors than barriers. The lack of Commonwealth persuasive effort also hampered early traction. Analysis of the findings from participant interviews in this study supports and builds on the document analysis. Issues identified in both analyses include: dissonance between political rhetoric and actual support; the positive influence of breastfeeding advocates in pursuing a breastfeeding culture in Australia; the barriers to momentum from inadequate resourcing and concerns about governance at all levels. The lack of congruence between stated and actual government support has been further highlighted as impacting on an individual level with women being 'let down' by the system.

The findings from the analysis of both the participants and documents reflect the experience of many other countries trying to disseminate the global programme into their national settings. The WHO *2nd Global Nutrition Policy Review 2017* (World Health Organization 2017) published the results of a survey sent to all 194 WHO Member States in 2016 that included questions on their implementation of the Baby-friendly Hospital Initiative. The overall response rate was 60.3% (117 countries) with 66.6% of responders (78 countries) identifying they have an active programme. Some limitations may exist as data collection was by self-report. Nevertheless, this document provides the most recent and comprehensive report on the global BFHI's current status.

"*Baby-friendly fatigue*" (World Health Organization 2017 p.20) was a term used to

describe the waning interest in and attention to BFHI in many countries, particularly around funding. Our findings support this concept, revealing that the long-term lack of fiscal resourcing for accreditation and re-accreditation has had a wide-ranging effect on many other barriers, particularly capacity building. According to the report approximately 18% of countries (including Australia) have hospitals pay for accreditation, although the cost varies widely. Significantly more countries receive government or aid agency funding. Whilst self-funding hospital accreditation could have a positive impact on sustainability, our findings reveal an increased disincentive for Australian hospitals exists, irrespective of size. The document analysis and key informant interviews also indicated that *BFHI Australia* is perceived as a vertical programme and having the standards integrated into national policy was identified as a way to decrease the bureaucratic burden and increase dissemination. The same idea was proposed by numerous other countries to help move BFHI from being a "programme basically managed by passionate people" (p.25) to a requirement. Similar to our participants the report also recommends a revitalising of the initiative, with changes that ensure sustainability over time.

Our findings about the responsibility of governments to actively promote the BFHI rather than relying on rhetoric are also supported by robust international literature. A 2012 integrative review assessed 45 English-language articles to identify enabling factors or barriers to the implementation of the BFHI (Seminic et al. 2012). Similar to Australia the political will, resource commitment, leadership and collaboration exhibited at all levels of government and the health system served to influence adoption or act as a barrier. A 2015 systematic review and meta-analysis of 195 relevant articles (Sinha et al. 2015) also stated a strong political will was required to scale up implementation strategies in combination with a multidimensional approach to breastfeeding interventions. The 2016 Lancet Series on Breastfeeding 2 (Rollins et al. 2016) performed multiple meta-analyses on the determinants of breastfeeding examining interventions to improve breastfeeding practices. The recommended action points included showing political will to: demonstrate that promoting breastfeeding has equal value to commodity-based interventions such as vaccines; regulate the breast-milk substitute industry; monitor breastfeeding trends and interventions and legislate that all maternity services adhere to BFHI.

The capacity to adopt BFHI practices is negatively affected by current maternity care service delivery. Participants revealed busy postnatal wards and fractured models of care are not conducive to supportive breastfeeding practices. Women are further disadvantaged when 'cherry picking' of 'baby-friendly' practices occur to create a fit with an organisation's philosophy and or for its convenience. International and Australian

literature confirms our findings. International literature cites money, time and a fractured model of service as barriers to providing high quality postnatal care (Schmied & Bick 2014). Australian midwives have stated they have no time for BFHI practices (Walsh, Pincombe & Henderson 2011), with supportive interventions taking a back seat to time pressures and increased workload (Reddin, Pincombe & Darbyshire 2007).

The Australian Commonwealth government has recognised the importance of breastfeeding and the BFHI as an enabling factor through published policy statements (National Health and Medical Research Council 1996, 2003, 2012). Document analysis demonstrated that national breastfeeding statements are an example of 'soft' policy due to the absence of tangible incentives or measurable, time-based outcomes. The findings from the participant's interviews reinforce the view that this level of support is a significant barrier to achieving a 'breastfeeding culture' in Australia.

Analysis of participant's interviews also builds on the document analysis by examining further the complexities revealed when trying to combine divergent priorities within a single governance structure. A lack of synergy has been revealed at Commonwealth government, health system and organisational levels. Commonwealth and state funding for the BFHI is subject to the transitory, 3-4 yearly cycle of appointment of government and health ministers, with health system priorities driven by the need to comply with health and safety governance requirements. At an organisational level, multiple priorities may develop within a volunteer committee if the views of stakeholders' representative organisations are naturally divergent. The history of *BFHI Australia* contains an example of the tension that arises when competing priorities are unable to align. ACM has historically governed *BFHI Australia* using a cost recovery model. Any revenue generated by *BFHI Australia* accreditation assessments covers the outgoings associated with management, creating a cost neutral programme. Stakeholders representing aid agencies prioritise advocacy activities which aim to increase *BFHI Australia's* profile and dissemination across the country but may have financial implications. Communication between ACM and state/national BFHI Committee members has not always been optimal. The push-pull between the two agendas has previously created a distancing between committee members, affected governance and presented a fractured image of the programme. There is a need to develop a strong communication and strategic business plan that will expect *BFHI Australia* to make a small profit, allowing an increase in advocacy activities and creating a synergy between the two agendas.

This study reveals a potential future for the BFHI and its accreditation programme in Australia. Participants identified that wide ranging support and collaboration with key

government and non-government stakeholders would help move the BFHI and accreditation programme forward and increase its potential. A supportive environment for women, national leadership and inter-professional collaboration are the foundations of the *Innocenti Declaration* (United Nations International Children's Emergency Fund 1990), which Australia is a signatory to but has not fully enacted. The Australian Commonwealth government missed an early opportunity to support the BFHI by not adopting the *Innocenti Declaration* into a measurable health policy and incentivising the States to implement practice change. Inter-professional and intersectorial collaboration is also recognised by international (Rollins et al. 2016) and Australian (Walsh, Pincombe & Henderson 2011) researchers as an enabling factor for BFHI uptake. Our final recommendation, a review of the current BFHI programme to ensure a robust process and determine relevance to the Australian setting is also supported by a previous Australian study (Schmeid et al. 2011).

A strategy needs to be adopted to clearly determine the current state of support for breastfeeding in Australia that will also inform *BFHI Australia* activities. The World Breastfeeding Trends Initiative (WBTi) (IBFAN(Asia)/BPNI(India) 2014) can provide stakeholders and policymakers with useful data to determine future policy and initiatives. The WBTi assists the main breastfeeding support agencies and organisations within a country to collaborate on assessing the strengths and weaknesses of the policies and programmes that currently exist to protect, promote and support optimal infant and young child feeding practices, including the BFHI. There are 15 indicators provided in the web-based tool with data quantified and a colour coded report produced. The process is repeated three to five yearly to track trends. To date 83 countries have completed the assessment (http://worldbreastfeedingtrends.org). For example, the United Kingdom has recently released their inaugural 'report card' with a lack of leadership and skilled consistent breastfeeding support identified as issues requiring urgent attention.

8.6 Strengths and Limitations

The inclusion of a variety of participants who had in common an association with *BFHI Australia* provides a unique lens to investigate the implementation and subsequent development of a complex global programme into a national setting. Deeper understanding of the issues uncovered through the interviews was achieved with thematic analysis (Braun & Clarke 2006). While the Australian context is distinctive the similarities shared with other high-income nations have been identified and examined. The perceptions, experiences and opinions of participants apply primarily to Australia however other researchers may find the results resonate with their own findings. The

findings from this study add to the general body of midwifery knowledge and increase the understanding of challenges to disseminating global programmes in national settings. The understanding of multilevel factors that influence the translation of knowledge into practice is enhanced. The findings may also offer other midwifery research opportunities.

Limitations occur in all studies. In this doctoral study, the data were coded, and themes identified by the first author. The supervisory panel were given samples of coding and explanations of the coding process for discussion. This approach provided consistency in method but did not allow for multiple perspectives from a variety of people with differing expertise. The first author has worked extensively in the area and has a broad base of professional colleagues. Potential bias towards data selection and decreased objectivity due to any collegial relationships is acknowledged. Every effort was made to include the greatest diversity of participants possible however to ensure a balance of viewpoints was obtained. As a number of participants chose not to participate some statements could not be verified and potential bias may also be present here.

8.7 Conclusion and Recommendations

A diverse group of participants have revealed that *BFHI Australia's* dissemination has been hampered by multi-level systems, philosophical and governance issues however a way forward is possible given key needs can be met. The lack of tangible commitment and capacity building for the BFHI lends weight to the perception that the Australian health system does not provide support for childbearing women to its fullest extent possible. *BFHI Australia's* dissemination was also hampered by historical internal tension and long-term challenges to effective governance which resulted from the emergence of competitive forces between the pursuit of advocacy activities and financial viability. Stakeholders naturally view priorities using their own 'lens': government, business or advocacy-based. The capacity to align mismatched agendas and achieve a common goal therefore remains an ongoing challenge and influence on the strategy as a whole and *BFHI Australia's* dissemination in particular.

Despite being critical of some aspects an overall positive perception of the BFHI's potential exists. A supportive environment for women will be demonstrated through increased political will, inter-professional collaboration and adequate resourcing for the BFHI. These factors are crucial to any future expansion of *BFHI Australia*. A comprehensive review of the programme to determine currency is also an opportunity to revitalise the initiative.

Drawing on the findings of this study and those of previous research further areas of research could include mapping the extent of BFHI implementation at the hospital level to

reveal a clear picture of its uptake in Australia and inform future research opportunities. In line with participant's recommendations a review of *BFHI Australia's* processes and dissemination is also timely.

In summary

The presentation of findings from participant interviews builds on the document analysis by exploring and examining their perceptions of the influences on the dissemination and future of the BFHI in the Australian setting. Using the pipeline model as a framework to 'measure' gaps in the BFHI's uptake in Australia similar issues to the document analysis were revealed. Incongruence between public policy rhetoric and the reality of breastfeeding support was reinforced. The BFHI is seen to be heavily dependent on the prevailing political will. Essential criteria for forward movement includes a politically sympathetic environment with tangible support and widespread stakeholder collaboration.

The previous two chapters presented the study's main findings. Chapter Nine amalgamates these findings and uses triangulation to present an overall conclusion. Recommendations for the future of the BFHI in Australia and *BFHI Australia* are also presented.

9 Summary, Discussion and Recommendations

9.1 Introduction

My thesis has used case study research to derive a greater understanding of the political and organisational support that historically and currently exists for breastfeeding in Australia, with a focus on the BFHI. An extensive and critical narrative review of the literature was attended. A knowledge translation model informed the conceptual framework. The research methodology was justified, and the methods described in detail. Thematic and contextual analysis methods informed the interpretation of data.

In this final chapter I synthesise and discuss the key findings of this study. As a reminder, I firstly revisit my aims, objective and research questions. My findings are then reviewed and discussed and their importance in relation to the existing published literature is highlighted. I demonstrate the interrelatedness of Knowledge Translation theory and conceptual model to my findings and discussion. The implications of my study and findings for policy, practice and future research are presented for consideration. I highlight the contribution of this body of work to midwifery knowledge and, reflecting on the findings from this program of research, I propose a set of key recommendations. To conclude I identify the strengths and limitations of the results and my study.

My research aimed to analyse the past and current policy support of breastfeeding in Australia with a specific focus on the Baby Friendly Health Initiative (BFHI). To meet this aim three broad objectives were developed:

1. Examine women's decision-making around their infant-feeding practices
2. Examine the relationship between a global public health strategy and breastfeeding practice
3. Determine elements key to the policy support of breastfeeding in the Australian national setting

My research aims, and objectives led to the formation of two focused research questions that have guided my study:

1. How was the implementation and dissemination of a global health strategy, the Baby-friendly Hospital Initiative into the Australian setting achieved?
    a. What enabling factors and barriers influenced its dissemination?
2. How do enabling factors and barriers influence any demonstration of the Baby Friendly Health Initiative's (BFHI) relevance and currency in the current Australian socio-political setting?

9.2 Discussion

Enabling childbearing women to make and practice their preferred infant feeding method has three interrelated elements: promotion, protection and support. This thesis develops the argument that there is an ongoing relationship between historical decisions made by the Australian Commonwealth government in response to the need for action on international Declarations such as the *International Code for the Marketing of Breast-milk Substitutes* and the *Innocenti Declaration* and the BFHI's subsequent dissemination. My study has identified evidence of promotion but there is a lack of evidence regarding protection and support. The Commonwealth government has not provided clear leadership as it has promoted breastfeeding without providing equal measures of protection and support for breastfeeding: protection in the form of legislation and/or a national coordinating body and incentivising the health care system as a supportive action.

The *Innocenti Declaration* has core targets: appoint a national breastfeeding coordinator of appropriate authority; establish a multi-sectoral national breastfeeding committee composed of representatives from relevant government departments and non-government organisations; implement the *Ten Steps to Successful Breastfeeding*; give effect to the *International Code of Marketing of Breast-milk Substitutes* (WHO Code) and legislate to protect the breastfeeding rights of working women (United Nations International Children's Emergency Fund 1990). Australia's response has included a response to the WHO Code in the form of the NHMRC publications *Infant Feeding Guidelines for Health Workers, Australian Dietary Guidelines and* the *MAIF Agreement;* food standards covering the composition of infant formula sold in Australia plus paid maternity leave.

The targets of the *Innocenti Declaration* are interconnected, integral to the creation of a supportive environment and exert a long-term epidemiological impact on the health of all members and all aspects of society (Rollins et al. 2016). In contrast, the Australian response has used a segregated vertical rather than whole of government horizontal approach. Participants revealed that budgetary implications influence the feasibility of implementing health strategies and justification for allocation/reallocation of funds was required.

This thesis further argues that the BFHI did not gain momentum under the governance of the ACM as it was hampered by financial constraints and the existence of conflict when the ACM's and BFHI's ideological and advocacy agendas did not align. My study supports international findings. Twenty-five years post implementation, global stakeholders believe

the principles of the Baby-friendly Hospital Initiative are sound however there is a need to revitalise the programme due to 'BFHI fatigue' (World Health Organization 2017).

This thesis began by addressing the first research objective and presented a comprehensive review of the literature published between 1990 and 2010 on women's infant-feeding decisions and practice. Chapter Two revealed the social determinants of breastfeeding are similar across high-income nations. There is uniformity in the demographics of women who decide not to breastfeed, namely being from a lower socio-economic group, with a non-professional occupation, less formal education and younger in age. Consistency in the process of making infant-feeding decisions were also revealed as being pragmatic and contextual, with the presence (or absence) of previous exposure to breastfeeding and influence of the partner, family and peer group as significant factors. My findings indicated that the reverse is also true. In Australia, affluent women are the demographic more likely to initiate breastfeeding in accordance with national recommendations. The *2010 Infant Feeding Survey* shows over 90% of Australian women seemingly want to breastfeed however, 40% of babies receive formula baby milk by one month of age and 70% by five months (Australian Institute of Health and Welfare 2011). In comparison, in low and middle-income nations affluent women are the demographic less likely to initiate breastfeeding irrespective of government recommendations (Victora et al. 2016). There could be a number of explanations for this psychosocial development.

These findings have been supported by a recently developed global conceptual model that describes the components of a 'whole of society' enabling breastfeeding environment (Rollins et al. 2016). While breastfeeding is often portrayed idealistically, in reality there are significant barriers: societal attitudes, media, the availability of products that undermine breastfeeding, health policy, workplace restrictions and health providers' influences. By way of example, where governments do not have or are unwilling to allocate health resources ‘trade offs’ occur using taxpayer’s dollars or reallocation of funds from other strategies. Cost-benefit, cost-effectiveness and cost-consequence analyses will reveal alternative options and inform which policies should be counselled and which mandated. When considering the health problems associated with suboptimal infant nutrition however the challenge is presenting summary measures of lifetime or yearly economic costs per condition (Frick 2009). Recent international (Bartick et al 2017) and Australian (Smith & Harvey 2011) analyses have provided supportive data to support the feasibility and imperative for health strategies that support global feeding strategies.

This study also highlighted the influence of intergenerational female family members' advice in directing the new mother's infant feeding decisions and practices. The experiences of previous generations of inexperienced Australian women have been reported (Thorley 2012). Health system practices at the time precluded the development of instinctive mother-baby relationships for many women and the advice around formula baby milk normalised its use. Alterations in women's perception of the benefits of breastfeeding has influenced their advice to subsequent generations. In my discussion of the beneficence of breastfeeding I also referred to the moral imperative that has arisen around the infant-feeding decision. The experience of 'shame' has been recently reported by both breastfeeding and non-breastfeeding women over their infant-feeding decisions and practices (Thomson, Ebisch-Burton & Flacking 2015). New mothers describe feeling fear, humiliation, inferiority and inadequacy particularly with regards breastfeeding in public or coming to terms with acting in opposition to mainstream breastfeeding advocacy and ideologies of the 'good mother' (Marshall, Godfrey & Renfrew 2007).

A recent study of American women's interpretation of formula baby milk advertising reveals the confusion experienced in differentiating between public health messages and product messages (Parry et al. 2013). Exposure to industry advertising generates maternal doubt about the importance of breast milk, offers a quick solution to perceived feeding 'problems' and promotes the expectation of breastfeeding 'failure.' The increasing use and positive public perception of baby formula milk also suggests a deliberate positioning by industry manufacturers of their product as a lifestyle choice and a desirable symbol of prosperity rather than a decision with health and economic consequences. Per child consumption of all types of formula in the 0-36-month range is currently highest in Australasia and Western Europe (Rollins et al. 2016). The ability to create and grow a formula baby milk market share is facilitated where there is an absence of country-level implementation of the *International Code of Marketing of Breast-milk Substitutes* (World Health Organization 1981) in its entirety, or an adaptation exists. The increased accessibility and uptake of baby formula milks suggests an absence of, or inadequate support by the health system to understand that breastfeeding is a positive health-related behaviour and protection is required by government against targeted marketing activities.

My review further revealed that the lack of support for childbearing women evident in high-income nations included issues of access to and equity of services, in combination with health professionals using personal attitudes and experiences to inform their practice. A gap in the research has since been identified (Gavine et al. 2017), with a lack of evidence to inform the design and delivery of effective education and training to upskill

the multidisciplinary health care team noted. This finding is of concern when considered alongside a recent meta-analysis (Skouteris et al. 2017) that identified successful interventions to promote exclusive breastfeeding featured a combination of long-duration (between four and six months), postpartum education and support. A curious finding in the literature published up till 2010 however was that while health professionals and support services were identified in general terms any specific mention of the BFHI in any form was absent. This absence in the literature suggests the BFHI had experienced a low public profile in many countries up to this point in time.

However, despite the seeming low early public profile my study found a demonstrable relationship between the BFHI's potential to affect women's infant feeding decisions and practice. To answer the second research objective my critical appraisal of the BFHI's impact considered global and local issues. The review acknowledged that the BFHI's global evidence is drawn from lesser quality individual studies. The sum of evidence from a systematic review and a population-based randomised controlled trial (Ip et al. 2007; Kramer et al. 2001) suggests a positive association exists between breastfeeding and the BFHI at local, regional and country-levels. Further high-level published work has supported my findings. In a recent systematic review of 58 articles Pérez-Escamilla and colleagues (2016) stated that observational evidence supports experimental and quasi-experimental findings in their assessment of breastfeeding outcomes from a structured breastfeeding programme. Implementation of the *Ten Steps to Successful Breastfeeding* demonstrates a positive impact on short, medium and long-term breastfeeding outcomes across geographies (Pérez-Escamilla, Martinez & Segura-Pérez 2016). There is a dose-response relationship between the number of practices aligned to the *"Ten Steps"* that women are exposed to and the likelihood of improved breastfeeding outcomes. Furthermore, breastfeeding practices respond positively to interventions delivered in multiple settings: health systems, communities and homes.

Global literature states the BFHI is essential to the package of enabling interventions that, when implemented in conjunction with each other, remove structural and societal barriers interfering with women's capacity to freely make informed infant-feeding decisions (Rollins et al. 2016). However, challenges to implementing the BFHI package of interventions have been identified (WHO 2017b). Sustainability, funding and competing priorities are revealed by a lack of internal monitoring systems, insufficient resources for staff training and general apathy about the importance of breastfeeding. The challenges resonate with this study's findings. Recurrent international themes: vertical implementation with a reliance on champions and inadequate compliance with the *WHO*

Code also feature in the Australian setting, as identified by the document analysis and participant interviews. To aid policymakers, administrators and health care settings WHO has recently published an updated guideline *Protecting, Promoting and Supporting Breastfeeding in Facilities providing maternity and newborn services* (WHO 2017a). This guideline makes 15 key recommendations for practice based on the evidence of 22 systematic reviews under three themes: immediate support to initiate and establish breastfeeding; feeding practices and additional needs of infants; and creating an enabling environment.

The BFHI's potential impact in Australia is not easily assessable however, due to the low number of facilities accredited (24%), the unknown standard of BFHI implementation, concerns about the quality of postnatal care provision and the lack of a clear mandate that directs the service delivery of states and territories. For example, similar to national policy, the Victorian government encourages hospitals 'in principle' to implement the *Ten Steps to Successful Breastfeeding.* BFHI implementation was a self-reported indicator for a number of years (Victoria State Government 2009, 2012, 2014). Hospitals reported on their level of compliance with each of the steps. Step 6: 'give newborn infants no food or drink other than breastmilk unless medically indicated' was regularly identified as the most commonly missed BFHI practice even though giving formula baby milk in hospital is known to be associated with suboptimal breastfeeding, or early weaning (Bartick et al. 2017). The maternity indicators have since been revised (Victoria State Government 2016). Initiation, discharge and in-hospital baby milk formula supplementation is now reported. The most recent data reveals an average supplementation rate of 25.2% in the public sector and 39.5% in the private sector. Individual identification of hospital's practices does not appear to have any effect. Similar to international studies, overcrowded postnatal wards and lack of adequate staffing has also been described in the Victorian public health system (Forster et al. 2014), which may be a contributing factor. One third of all women after a normal birth are discharged home within two days and almost half the women who have an uncomplicated caesarean section are home by four days (The Consultative Council on Obstetric and Paediatric Mortality and Morbidity (CCOPMM) 2012). Domiciliary support is variable. While the reasons for supplementation are not identified, the data constitutes further evidence of the policy-practice gap that exists at a local level that may be amenable to Commonwealth intervention strategies.

An accurate ongoing national monitoring system has long been recommended to record Australian breastfeeding trends (Lund-Adams & Heywood 1994) but not actioned. *Australia's mothers and babies* report (Australian Institute of Health and Welfare 2017)

publishes key statistics from the AIHW National Perinatal Data Collection. Breastfeeding is not included in the data collection. Consequently, due to the lack of Commonwealth direction and the paradox of the Constitution where the states and territories deliver most of the health care, especially in hospitals, significant variation exists between the methods and indicators used to collect and publish any breastfeeding data.

The three states on the east coast of the Australian mainland provide a perfect example of the variance that exists. Victoria includes selected in-hospital breastfeeding practices as a reportable perinatal indicator that is published annually. Victoria's latest published data (Victoria State Government 2016) indicates an initiation within the hospital stay ('ever breastfed') rate of approximately 94.0%, which is higher than the national average of approximately 90% (Australian Institute of Health and Welfare 2011). Exclusivity is not reported although in-hospital baby milk formula usage is included. In direct contrast, the Queensland government publishes periodical state-wide infant feeding surveys. The latest telephone survey (State of Queensland [Queensland Health] 2014) includes six indicators that are the same as those found in the *2010 Infant Feeding Survey* (Australian Institute of Health and Welfare 2011). Queensland reports an 'ever breastfed' rate of 96% and a 92% exclusive rate, both higher than Victoria and the national average. There is no hospital data included. Community data shows exclusivity declines to 68% in the first month and to 29% in four-month old infants. The state data is comparable to national data. Nationally, exclusivity drops in the first month to around 60% and further decreases to below 30% by 5 months (Australian Institute of Health and Welfare 2011). Demonstrating further variability in monitoring practices, the New South Wales (NSW) Ministry of Health publishes an annual perinatal health statistics report *NSW Mothers and Babies.* Reported in-hospital data includes the percentage of babies fully breastfed (breastfed or receiving expressed breast milk), received any breast milk (mix feeding with formula baby milk) or fed solely with a formula baby milk (no breastfeeding) on discharge from hospital (Centre for Epidemiology and Evidence 2016). The latest publication (2014) reports a fully breastfeeding rate of 78.9%, 'any breastfeeding' at 10.5% (total 89.4%) and formula baby milk feeding at 9.7%. The results from the three states show the lack of comparability that exists at a local level and inability to easily contribute to a national database.

Despite the lack of national breastfeeding data to inform policymakers, breastfeeding is promoted as a valuable and positive health behaviour and the BFHI a useful health system intervention that can make a difference (National Health and Medical Research Council 2012). The *WHO Code* (World Health Organization 1981) and subsequent World Health Assembly (WHA) resolutions are also endorsed. However, there is little evidence of

government protection against targeted advertising towards childbearing women. The main thrust of protection is through the *MAIF Agreement* (Commonwealth of Australia 2003) which is a voluntary set of regulations previously criticised by a Senate inquiry into the benefits of breastfeeding for its narrow scope (Commonwealth of Australia 2007). Australian research has shown that the formula industry circumvents the *MAIF Agreement* and the *WHO Code* (Berry, Jones & Iverson 2009) using misleading health statements, of which women are highly uncritical. Parallels can be drawn with another Commonwealth endorsed health programme, one used to address obesity. Front-of-pack labelling is promoted as a standardised user-friendly strategy that will overcome any misconceptions from manufacturers, accurately inform the public about the nutritional value of pre-packaged food and promote healthy choices (Food Regulation 2016). Major criticisms of the programme stem from the Commonwealth's decision to make the system voluntary and therefore dependent of the goodwill of food companies and reducing its capacity for widespread dissemination. Criticisms also include the potential for manufacturers to shift any cost of implementation onto the consumer, inaccuracies in the algorithm used to determine the rating and the system being amended to meet the needs of the very powerful dairy industry (Brennan 2015). A mandatory system is considered an essential requirement however, similar to the formula industry any move toward legislative regulation will meet with opposition from companies with vested interests. The BFHI programme similarly lacks tangible policy support to aid translation from health policy into clinical practice and achieve demonstrable widespread adoption in Australia.

A conceptual framework was revealed in Chapter Four that may help explain the 'policy-practice gap' in the BFHI's dissemination previously identified in international and Australian studies. Knowledge Translation Theory is proposed as a useful framework. The knowledge translation process concerns changing behaviour to achieve better health outcomes, plus using the strengths of all stakeholders to create synergy and overcome challenges. The research to practice 'pipeline' model examines the impact of identified barriers on the integration of the BFHI in the Australian health care system.

Examination of each element in the pipeline: awareness, acceptance, applicability, ability and being acted-upon identifies policy-practice gaps. The process is neither linear nor ordered and overlapping occurs. Alteration to one element exerts a random or purposive effect on one or more of the other components. My findings reveal the Commonwealth government's actions to be highly influential individually and collectively on all the elements. Facilitative management strategies at all levels of the health system are required to demonstrate acceptance and applicability. Adequate human and fiscal resourcing is

essential to drive change that will create and sustain a supportive organisational culture. A growing awareness of the importance of breastfeeding is seen through the inclusion of increasing amounts of supportive evidence in successive policy documents (Australian Health Ministers Conference 2009; Commonwealth Department of Health 1982; National Health and Medical Research Council 2012). However, capacity building strategies with measurable outcomes that demonstrate acceptance and applicability, create ability or facilitates action at a local level are absent.

One recently developed tracking, assessing and monitoring system that has been taken up by 84 countries to date is the World Breastfeeding Trends Initiative (WBTi) assessment tool (IBFAN[Asia]/BPNI[India] 2014). The tool contains 15 indicators that when completed identify strengths and weaknesses in policy and practice with particular reference to the *Global Strategy for Infant and Young Child Feeding* (WHO 2003). The results provide critical information to government to bridge the policy-practice gap. Data is produced for economic policy evaluation, informing resource allocation for specific interventions and opportunities for further research. The tool has some similarity to the initial proposed BFHI schedule which contained the 'suggestion' to perform a baseline country-level assessment when determining implementation strategies. Australia did not perform this early assessment however it is currently undertaking the WBTi assessment.

Facilitating high-level research will increase knowledge and awareness of the BFHI and/or breastfeeding in the Australian setting. A recent meta-ethnographic study of health care staffs' perceptions of the BFHI suggests diametrically opposing views exist. Its desirability is juxtaposed against a sense of organisational financial burden and cultural change and imposition on women's choices (Schmied et al 2014). A clear determination of the levels of implementation across Australian hospitals and examining women's satisfaction with their care in 'baby friendly' and non-accredited facilities would be useful both as a baseline and for comparative purposes. Australian women's satisfaction with the BFHI may or may not support international findings and influence policymaker's decisions. Canadian women have recently identified maternal satisfaction with and are experiencing positive differences in care, support and education when birthing in a hospital with high BFHI versus low BFHI implementation (Groleau et al. 2017), demonstrating a consumer driven preference. The BFI Community programme in Australia has also had limited uptake and while it hasn't been evaluated it is not unreasonable to suggest there are similar challenges to the hospital setting. Implementation evaluation in the UK has described a multidisciplinary facilitative approach, engagement with key partners and credible leadership as essential elements (Thomson et al. 2012). Despite a potential argument that

health care organisations and health professionals are accountable to practicing in an evidence-based manner my findings strongly suggest that the lack of political will to drive change also represents a major barrier to any sustained movement of evidence into practice.

Triangulation of my findings from the document analysis and participant interviews demonstrated congruence and promoted confidence in the conceptual model as a means to explain the enabling factors and barriers to the translation of evidence into practice. Document sources and participants' perceptions concur that the Australian Commonwealth government is the BFHI's key stakeholder and consequently highly vulnerable to any changes in political will. The Australian Commonwealth system and Constitution places responsibility for service delivery on the states and territories with subsequent variances in health system structure and funding observable. National approaches however depend on the Commonwealth 'tying' policy to funding (Lin & Fawkes 2007). Implementation of the BFHI using a national approach serves a leadership and agenda-setting role that will accelerate developments at the state and territory level and create a flow-on effect at an individual organisational level.

Document analysis revealed that ambivalence from key stakeholders and inadequate resources during the implementation period hampered the BFHI's early momentum. Case study participants were of the opinion that adequate fiscal and human resourcing was vital to any current and future sustainability of the BFHI and improvement in breastfeeding practices in Australia. Furthermore, they regarded the Commonwealth government as having the key role in ensuring this support was made available. These findings echo the barriers identified in the knowledge to practice 'pipeline'. Analysis of both the documents and interviews revealed the Commonwealth government's actions influenced either enabling factors or barriers to support breastfeeding and the BFHI's success. The Commonwealth government's early decision to not engage with UNICEF nor take ownership or provide sustained tangible support for the BFHI has had a profound and long-lasting effect.

Evidence for substantive Commonwealth government support for breastfeeding and the BFHI is notable by its absence. Strong, clear direction from government should include an appropriately resourced policy to promote growth and sustainability. The BFHI in Australia is vulnerable as it is not protected by legislation, a position it would otherwise enjoy if the government had pursued and enacted their obligations to the *Innocenti Declaration* (United Nations International Children's Emergency Fund 1990). A recent evaluation of the *National Breastfeeding Strategy 2010-2015* revealed the unfulfilled hopes

of stakeholders and infant feeding experts that protection was forthcoming through an effective implementation approach (Hull, Schubert & Smith 2017).

This study has revealed the usefulness of the knowledge to practice 'pipeline' model in analysing the Commonwealth government's decision not to enact the international Declarations to which they were signatory. UNICEF Australia's ability to retain governance of the BFHI was hampered by their internal lack of acceptance. UNICEF Australia was also limited by its financial capacity. Internal competition between local and global priorities plus the lack of experience with managing a domestic programme were revealed as key to UNICEF Australia's ambivalence towards the BFHI. The philosophy underpinning the BFHI programme uses an inclusive multi-layered health promotion framework found in the principles of the *Ottawa Charter* (World Health Organization 1986). The BFHI strategy is at heart an advocacy activity and meant to be part of a package of interventions rather than a standalone vertical programme. In contrast, the mandate from Head Office (United Nations International Children's Emergency Fund 1991) as revealed in my document analysis and through the implementation schedule presented in Table 16 suggests a 'top down' approach to implementation was used, hampering acceptance and contributing to stakeholder resistance. There is no available evidence to confirm or deny if UNICEF offices in other countries were funded during the early implementation phase. UNICEF Head Office indicated in its Executive Directive that it would not routinely provide additional resourcing for implementation as all countries were expected to use their own funds. The absence of support may have been due to the mistaken, optimistic or possibly naive expectation that the Australian Commonwealth government would naturally assume responsibility. Political turmoil between UNICEF and the World Health Organization also existed at the time (Brown, Cueto & Fee 2006) which may have been a further contributory factor to the level of resourcing available. UNICEF's unwillingness and/or inability to further sustain the BFHI and the Commonwealth's lack of buy-in left the BFHI in Australia highly vulnerable as it was not financially viable at that stage. My findings reveal the decision to award the BFHI to the ACM in 1995 was to secure the BFHI's future. Situating the BFHI within another organisation however was perceived to be a challenge both from the ACM's perspective and the BFHI stakeholder's. There was an unforeseen cost as the ACM's financial constraints hampered their ability to act on the BFHI and resource it adequately.

My study suggests a fundamental 'tension' existing between the BFHI programme and the ACM may be unique to Australia. According to a recent WHO report (World Health Organization 2017) eight high-income nations: Australia, Austria, Japan, Netherlands, New

Zealand, Singapore, Spain and the United States of America self-reported that a non-government organisation has oversight of the BFHI in their country. Of those eight countries Australia has the only BFHI programme governed by a midwifery professional organisation. *BFHI Australia* functions primarily as an accreditation programme and advocacy activities do not feature in the BFHI *Strategic Plan 2012-2017* (Australian College of Midwives 2012). Interestingly, 'enabling women to be strong and confident mothers' is key to the ACM's *Strategic Plan 2015-2020* (Australian College of Midwives 2017) and represents a more focused advocacy agenda. The perceptions of and priorities for the BFHI in Australia are influenced by the stakeholder's 'lens', be that government, business or advocacy-based and challenges in aligning mismatched agendas is inevitable. The push-pull of competing priorities within and between committees was revealed through document review and interview analysis as damaging to the BFHI's capacity for effective functioning and national dissemination. The tensions revealed by my study will not fully resolve if breastfeeding advocacy is perceived by BFHI stakeholders to be a lower priority to the ACM's business activities and other programmes.

My findings reveal a belief by stakeholders that adequate human and fiscal resourcing of the BFHI by the Commonwealth government will facilitate its expansion into the community, paediatric and neonatal settings. Participants also highlighted the current negative impact of insufficient funding on capacity building. There is generally limited government funding for health promotion research and evaluation in Australia except under certain circumstances (Lin & Fawkes 2007). Specific targeted areas such as Aboriginal and Torres Strait Islander health and chronic disease self-management would appear to be exceptions. Success also needs to be easily measured, for example tobacco control and road safety have evaluation well integrated into programme delivery. Another global health programme, immunisation, has received significant support from the Commonwealth, with a well-funded whole of government approach (Australian Government Department of Health 2013) and a strong relationship has developed between industry and some academic institutions (Wilyman 2015). Uptake of vaccination programmes is easily measured and outcomes-based (Bloom, Canning & Weston 2005). Tracking breastfeeding trends and measuring health cost savings can take many years (Smith & Harvey 2011), which may be a disincentive for policymakers.

However, breastfeeding is important for women and babies, their families and society in general. Practices at all levels of the health system impact on women's infant-feeding decisions and practice. To fully realise this foundational concept the protection promotion and support of breastfeeding needs to be a whole of society endeavour and responsibility,

with clear leadership and unequivocal engagement at all levels. For the BFHI to expand to its full scope the Commonwealth will need to allocate significant and long-term resources. The evolution of *BFHI Australia* may lead to a redesign of the current governance arrangements to ensure the needs of all stakeholders are addressed and service needs met.

9.3 Contributions and implications of my study, findings for policy and practice

There are numerous findings from this study which contribute to the body of midwifery knowledge. Health professionals are seen to be a variable source of support to childbearing women and may be unknowingly influenced by their own personal experiences. The presence of support increases the initiation and duration of breastfeeding, the absence decreases it. The BFHI has a positive association with increases in breastfeeding practice, although this increase is dependent on country-level factors. The positive association that exists has not translated into a widespread uptake in the Australian health system however, a conceptual model utilising knowledge translation theory has 'mapped' barriers and provided recommendations that could lead to higher levels of implementation. The applicability of case study research for midwifery context studies has been strengthened raising the profile of this approach in midwifery and providing a tool to use as a 'benchmark' for quality methodological inclusions. A clear mapping of the early implementation period and influencing factors provide documentary evidence of the decisions made around the policy and actual support of breastfeeding and the BFHI in Australia. The lack of availability of resources interrelated with governance issues demonstrates the existence of a negative effect on breastfeeding policy support in general and the BFHI in particular. My study reveals that because of the numerous historical and current socio-political barriers, the BFHI's dissemination continues to be hampered by multi-level systems issues. These issues include prioritisation, stakeholder collaboration and adequacy of resourcing. The lack of clear leadership at national level emerges as a strong theme, one which has had and will continue to exert long-term effects on the efficacy of breastfeeding support in Australia.

Previous studies have examined: the attitudes and practices of managers and staff in BFHI and non-BFHI maternity facilities; women's historical and current experiences of breastfeeding and recollection of the hospital or community support received; midwives' language when supporting women to breastfeed; mothers' understanding of the impact of formula baby milk advertising and evaluating policy documents. The point of difference with my thesis is its examination of factors that have led to the findings reported by other

researchers. I have delved into the historical antecedents of the BFHI's inception to examine and understand the contextual factors that influenced the Australian implementation. Using my understanding of those influences I examined the perceptions and experiences of participants who have had a significant association with the BFHI at some time point to reveal the impacts on the BFHI's dissemination. I have engaged the Commonwealth government and other non-government organisations in the process of reflection by inviting a representative to interview and share experiences, which also provided the opportunity for multiple and contrasting viewpoints to be considered. My examination has led to the understanding that there are more barriers than enabling factors to the dissemination of the BFHI in Australia. Barriers tend to be tangible, such as human and fiscal resourcing. These are barriers that can be overcome. Enabling factors are intangible, representing the value that is placed on the importance of breastfeeding and the belief in BFHI principles and other advocacy programmes as a mechanism to enable women's freely made infant-feeding decisions. In my study barriers have been seen to exert a greater influence although enabling factors demonstrate sustainability to mitigate the negative impact. The passion and dedication of a small volunteer cadre has sustained the BFHI since its implementation and dissemination. Using my conceptual model, I can identify the barriers and their likely effect. Similarly, I can use the model to identify the expected outcome of replacing barriers with enabling factors. I have also used the opportunity provided by publishing throughout the study to inform the Commonwealth government's views and promote the concept of a targeted tangible national programme that has measurable outcomes.

9.4 Key recommendations

My study has identified gaps in the translation of knowledge and evidence into practice in the Australian health care system. The following key recommendations have been drawn from the findings of my literature reviews and data analysis. They facilitate enhanced support for breastfeeding, the BFHI and will provide future opportunities for research in Australia:

1. The Commonwealth government make provision to adopt the updated targets of the *Innocenti Declaration 2005* (United Nations International Children's Emergency Fund 2005) to provide the full spectrum of protection, promotion and support for breastfeeding in Australia rather than the current piecemeal approach:
    a. Appoint a national breastfeeding coordinator with appropriate authority and establish a multisectoral national breastfeeding committee
    b. Ensure every facility fully practices the *Ten Steps to Successful Breastfeeding*

c. Give effect to the *International Code of Marketing of Breast-milk Substitutes* and subsequent resolutions in its entirety
d. Maintain legislation to protect the rights of breastfeeding working women

2. Provide stakeholders and Australian policy makers with useful data to develop targeted and measurable strategies that will facilitate key recommendation #1:
    a. Complete and publish the results of the World Breastfeeding Trends Initiative (WBTi) assessment
    b. Map the current level of BFHI implementation in maternity facilities nationally
3. Opportunities for future research projects include the following:
        a. Identify and examine Australian women's understanding of the BFHI and its impact on their breastfeeding practices

9.5 Strengths, limitations and generalisability of the results

The strengths of this research lie in the variety of data sources, type of analysis employed, and conceptual model used to construct a deeper and different understanding of the issues facing the implementation and dissemination of a global strategy into a national setting. Clearly defined strategies promoted trustworthiness in the research process and confidence in the findings. The findings add to the general body of midwifery knowledge. It is difficult to generalise as each country experience is unique due to the specificity of their internal and external influences. The Australian context is distinctive however the findings have been shown to be similar to other high-income nations. Researchers from other backgrounds who are investigating the BFHI in their own country may find a resonance with their own studies. Limitations include the recognition that all potential private documents may not have been accessed, therefore limiting alternate explanations. Potential bias from participants may also have occurred as only those who were happy to be interviewed consented to the process. My position as an 'insider' is both a strength due to my deeper knowledge and an acknowledged bias. While every effort has been taken to provide the fullest explanation, it is recognised that alternates may remain uncovered.

9.6 Conclusion

This study is based on the premise that breastfeeding is an important health promotion activity with established benefits across society. This study has asked the question: why there is an evidence-practice gap in breastfeeding support at all levels of the health system? An instrumental case study design and multiple sources of data examined the enabling factors and barriers to the implementation and dissemination of a global health strategy to support breastfeeding into a national setting. Case studies cannot make the

claim of being typical of a larger population or group as there is no probability test to determine representation. Instead of being representative case studies provide theories that are transposable into a variety of settings where the findings 'ring true' for other researchers (Hodkinson & Hodkinson 2001).

The combined findings of the document and interview analyses demonstrated that historical events and situational context are interrelated, and both exert either an enabling influence or barrier on the awareness, acceptance, sense of applicability and uptake of the BFHI strategy at all levels of the health system in Australia. Australia's colonial past influences the Constitution with resultant tension between health services administered by either the Commonwealth at a national level or the seven States and Territories. The support of breastfeeding and the BFHI is subsumed within nutritional policy statements rather than as a stand-alone programme as per international recommendations. Historically, tension between the ACM Executive and the volunteer BFHI Committee over governance issues hampered momentum and hindered the uptake of BFHI across the country.

Enablers for the BFHI are intangible, consisting of an altruistic belief in breastfeeding support as being important for women, babies and the world. Barriers are tangible: inadequate resourcing at all levels of the health care system has constrained delivery of the BFHI at local levels.

The long-term impact of the Australian Commonwealth's decision not to adopt the *Innocenti Declaration* in its entirety is a failure to consolidate and further expand effective, appropriate and timely breastfeeding support. Nevertheless, the BFHI has slowly developed and consolidated under the governance of the ACM. Future expansion requires authentic government engagement and tangible incentives in collaboration with key stakeholders.

List of Appendices

Number One: Approval to view ACM archival documents

Australian College of Midwives

Wednesday, 1 May 2013

Marjorie Atchan, Student Number 96036710
Professional Doctoral Candidate
Faculty of Health
University of Technology, Sydney
E: Marjorie.A.Atchan@student.uts.edu.au
P: 0408 696 877

Dear Marjorie

Thank you very much for taking the time to respond to the concerns of the ACM regarding your PhD research in your letter dated 27th February 2013. We look forward to working with you, and agree to give you full access to all the BFHI archives other than the ones that we feel need to be kept private.

If you have any concerns or queries about the archives, or any issues that arise from your research, please feel free to consult with the ACM Professional Development Officer.

The ACM looks forward to working with you over the next couple of years.

Yours sincerely,

Production Note:
Signature removed prior to publication.

Ann Kinnear
Executive Officer

Australian College of Midwives
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ABN 49 289 821 863

Number Two: UTS Ethics Approval

Marjorie.Atchan

From: Research Ethics <research.ethics@uts.edu.au>
Sent: Monday, 18 March 2013 3:13 PM
To: Maralyn Foureur; Marjorie.A.Atchan@student.uts.edu.au; Research Ethics; IEC RIO; Post Award Grants
Subject: HREC Approval Granted

Dear Applicant,

Thank you for your response to the Committee's comments for your project titled, "The Baby Friendly Health Initiative Australia: a case study". Your response satisfactorily addresses the concerns and questions raised by the Committee who agreed that the application now meets the requirements of the NHMRC National Statement on Ethical Conduct in Human Research (2007). I am pleased to inform you that ethics approval is now granted.

Your approval number is UTS HREC REF NO. 2013000053

Please note that the ethical conduct of research is an on-going process. The National Statement on Ethical Conduct in Research Involving Humans requires us to obtain a report about the progress of the research, and in particular about any changes to the research which may have ethical implications. This report form must be completed at least annually, and at the end of the project (if it takes more than a year). The Ethics Secretariat will contact you when it is time to complete your first report.

I also refer you to the AVCC guidelines relating to the storage of data, which require that data be kept for a minimum of 5 years after publication of research. However, in NSW, longer retention requirements are required for research on human subjects with potential long-term effects, research with long-term environmental effects, or research considered of national or international significance, importance, or controversy. If the data from this research project falls into one of these categories, contact University Records for advice on long-term retention.

You should consider this your official letter of approval. If you require a hardcopy please contact Research.Ethics@uts.edu.au)

To access this application, please follow the URLs below:
* if accessing within the UTS network: http://rmprod.itd.uts.edu.au/RMENet/HOM001N.aspx
* if accessing outside of UTS network: https://remote.uts.edu.au , and click on "RMENet - ResearchMaster Enterprise" after logging in.

We value your feedback on the online ethics process. If you would like to provide feedback please go to: http://surveys.uts.edu.au/surveys/onlineethics/index.cfm

If you have any queries about your ethics approval, or require any amendments to your research in the future, please do not hesitate to contact Research.Ethics@uts.edu.au.

Yours sincerely,

Professor Marion Haas
Chairperson
UTS Human Research Ethics Committee
C/- Research & Innovation Office
University of Technology, Sydney
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UNIVERSITY OF TECHNOLOGY SYDNEY

INFORMATION SHEET

The Baby Friendly Health Initiative Australia: a case study
(UTS APPROVAL NUMBER 2013000053)

My name is Marjorie Atchan and I am a student at UTS. My supervisor is Professor Maralyn Foureur.

This research informs my doctoral study. The aim is to obtain information about the development of and influences on the Baby Friendly Health Initiative in Australia. I plan to publish my findings in relevant journals and present at a variety of conferences.

IF I SAY YES, WHAT WILL IT INVOLVE?
I will ask you to participate in an interview about your perceptions and experiences with regards to the Initiative's development and influence in Australia. I will ask if I can record the interview and make notes. I will use an audio tape recorder and possibly a video recorder to form part of an oral history.

ARE THERE ANY RISKS/INCONVENIENCE?
There are very few if any risks because the research has been carefully designed. The interview will take place at a time and place that is mutually suitable and convenient. The interview will take approximately 60 minutes. I will ask you some questions that require you to express an opinion. The extent of your disclosure about your perceptions and experiences is your personal choice.

DO I HAVE TO SAY YES?
You don't have to say yes.

WHAT WILL HAPPEN IF I SAY NO?
Nothing. I will thank you for your time so far and won't contact you about this research again.

IF I SAY YES, CAN I CHANGE MY MIND LATER?
You can change your mind at any time and you don't have to say why. I will thank you for your time so far and won't contact you about this research again.

WHAT IF I HAVE CONCERNS OR A COMPLAINT?
If you have concerns about the research that you think I can help you with, please feel free to contact me at the following email address: Marjorie.A.Atchan@student.uts.edu.au .

If you would like to talk to someone who is not connected with the research, you may contact the Research Ethics Officer on 02 9514 9772, and quote this number **2013000053**.

Thank you

Production Note:
Signature removed prior to publication.

Marjorie Atchan
Student Number 96036710

Number Four: Study Consent Form

UNIVERSITY OF TECHNOLOGY SYDNEY

UNIVERSITY OF TECHNOLOGY, SYDNEY

CONSENT FORM – STUDENT RESEARCH

I, _____ (participant's name) agree to participate in the research project **"The Baby Friendly Health Initiative Australia: a case study"** (HREC Approval number 2013000053) being conducted by Marjorie Atchan of the University of Technology, Sydney (student number 96036710) for the degree of Doctor of Midwifery.

I understand that the purpose of this study is to obtain information about the development of and influences on the Baby Friendly Health Initiative in Australia.

I understand that I can contact Marjorie Atchan or her supervisor Dr Maralyn Foureur if I have any concerns about the research. I also understand that I am free to withdraw my participation from this research project at any time I wish, without consequences, and without giving a reason.

Please tick or mark as N/A the following:

1. ☐ I agree that Marjorie Atchan has answered all my questions fully and clearly
2. ☐ I agree to my interview being audio-taped
3. ☐ I agree to my interview being visually recorded
4. ☐ I agree to the researcher making field notes during the interview
5. ☐ I agree that the research data gathered from this project may be published in a form that identifies me

If no to Number 5:

☐ I agree that the research data gathered from this project may be published in a form that does not identify me

_____ ___/___/___
Signature (participant)

_____ ___/___/___
Signature (researcher)

1

Marjorie Atchan
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Broadway NSW 2007
P: (
E: |

NOTE:
This study has been approved by the University of Technology, Sydney Human Research Ethics Committee. If you have any complaints or reservations about any aspect of your participation in this research which you cannot resolve with the researcher, you may contact the Ethics Committee through the Research Ethics Officer (P: +61 2 9514 9772 Research.Ethics@uts.edu.au) and quote the UTS HREC reference number. Any complaint you make will be treated in confidence and investigated fully and you will be informed of the outcome

Number Five: Example of Coding - Document analysis

Data extract	Text Represents	Coded for	Theme
"The Commonwealth Government is committed to protecting, promoting and supporting exclusive breastfeeding for at least the first four to six months of life. Australia is one of the few developed countries in the world to include a guideline on breastfeeding in its dietary guidelines for adults." NHMRC (1996). *Infant feeding Guidelines for health workers*	Declaration of commitment/Inclusion in public policy Contrasts with international recommendations and declarations that were ratified by Australian government	Enabling factor Barrier	A breastfeeding culture
"Australian hospitals are encouraged to actively adopt the Ten Steps to Successful Breastfeeding." NHMRC (1996). *Infant feeding Guidelines for health workers*	Example of policy encouragement	Enabling factor	A breastfeeding culture
"At country level, activities should be funded from existing country-level budgets." UNICEF (1991). *Executive Directive Re: Baby-Friendly Hospital Initiative*	No financial support available	Barrier	Resource implications
"Considerable time and effort is involved in the BFHI." UNICEF Australia (1994). *Internal correspondence: Baby Friendly Hospital Initiative*	Example of stakeholder's negative perception of resources required	Barrier	Resource implications
"Some of your strategies are too restrictive for Australian women and Australian hospitals." RACOG (1992). *External correspondence to UNICEF Australia*	Example of stakeholder's negative perception	Barrier	Ambivalent support for breastfeeding and the BFHI
While strongly supporting the philosophy and basis for establishing the BFHI in Australia and acknowledging the powerful and rapid impact that has been made to date, UNICEF Australia is unable to	Withdrawing financial support Prioritising international	Barrier	Advocacy versus business

justify major financial and administrative support of this project when faced with the considerable demands of other vital international initiatives in support of needy women and children in the world's poorest countries." UNICEF Australia (1995). *Report for UNICEF Australia BFHI Project by JAM Marketing Services*	aid activities over the needs of Australia's children		
"I am really beginning to think we may have taken on the wrong thing business wise." ACM (1995). *Internal correspondence: BFHI*	Expression of concern for financial viability of the BFHI	Barrier	Advocacy versus business

Number Six: Example of Coding – Participant interviews

Data extract	Key words/phrases	Coded for	Theme
"They keep saying it's a good thing but they don't do anything about it. They don't actively promote it. I suppose they do on their website but it's like the usual lip service to things like, don't smoke, eat well, breastfeed but there's nothing put in there, government-wise to support. They certainly don't through their Federal Government - promote breastfeeding all that well." (#11 - Reese)	*keep saying it's a good thing* *It's on their website* *don't actively promote it.* *nothing put in there, government-wise to* *support.* *lip service*	Health promotion without support = Rhetoric Lack of actual support =Rhetoric/reality Lip service=Rhetoric	Rhetoric versus reality
"What's the point of telling women they should breastfeed if the institutions and the health professionals ensure that they can't succeed? All you do is add to the burden of misery they're going to feel." (#3 - Charlie)	*telling women they should breastfeed* *institutions and the health professionals ensure that they can't succeed* *add to the burden of misery*	Making rules about breastfeeding=Reality ensure that they can't succeed=Reality Increases maternal guilt=Reality	Rhetoric versus reality

Marjorie.Atchan

From: Jennifer James <bfreditor@gmail.com>
Sent: Thursday, 30 November 2017 11:25 AM
To: Marjorie.Atchan
Subject: permission

Dear Marjorie
Congratulations on nearing completion of your PhD.
We give permission for you to include the following publications in your thesis

Atchan M., Davis, D. & Foureur M. 2011, 'The decision not to initiate breastfeeding - women's reasons, attitudes and influencing factors - a review of the literature.' *Breastfeeding Review,* vol. 19, no. 2, pp. 9-17
Atchan, M., Davis, D. & Foureur, M. 2013, 'The impact of the Baby Friendly Health Initiative in the Australian health care system: a critical narrative review of the evidence.' *Breastfeeding Review,* vol.21, no. 2, pp. 15-22.
Sincerely
Jennifer

Jennifer James
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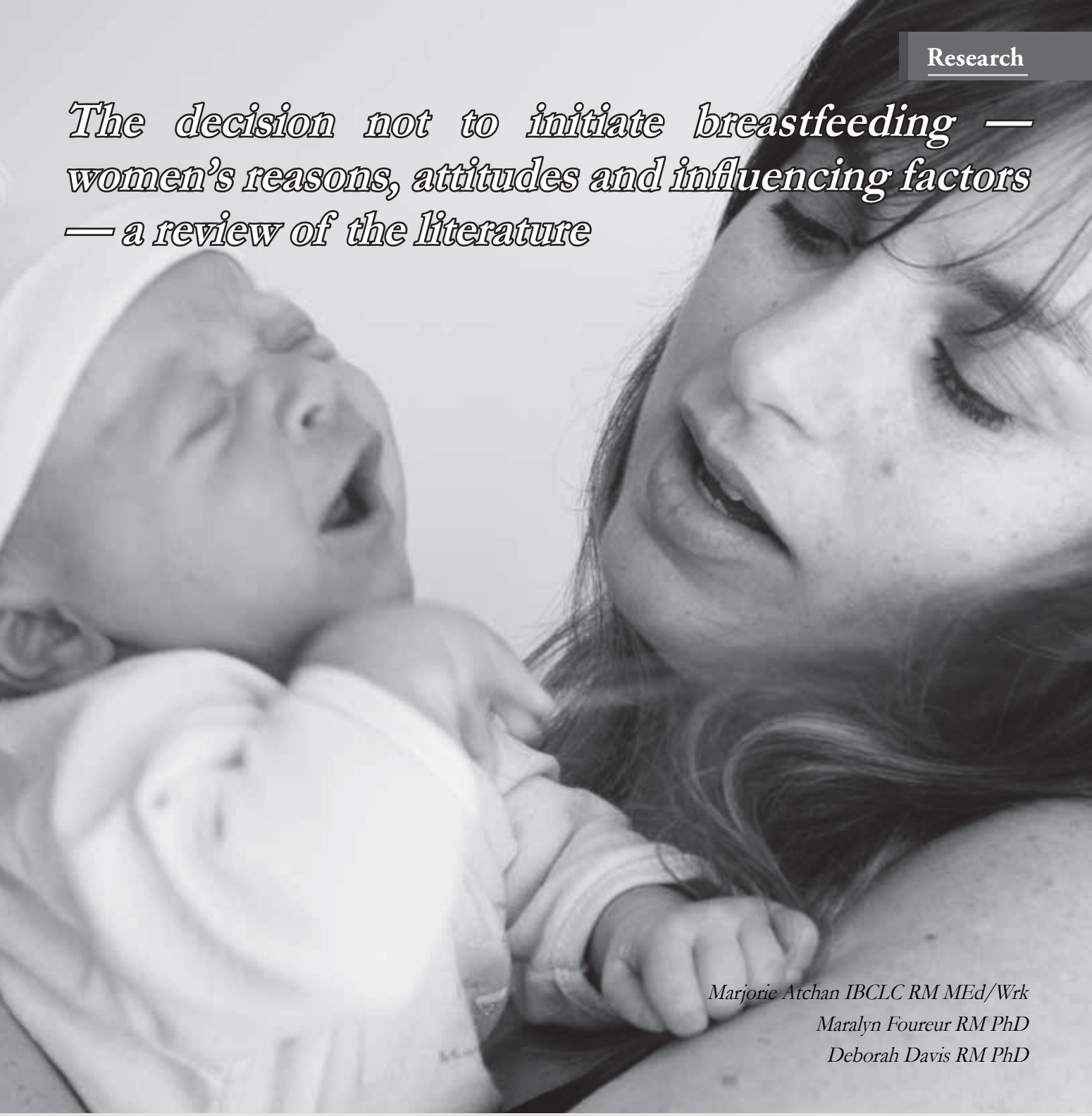
The decision not to initiate breastfeeding — women's reasons, attitudes and influencing factors — a review of the literature



Marjorie Atchan IBCLC RM MEd/Wrk
Maralyn Foureur RM PhD
Deborah Davis RM PhD

ABSTRACT

Breastfeeding is the biological feeding norm for human babies. Encouraging breastfeeding is a primary health promotion strategy, with studies demonstrating the risks of artificial baby milks. Each year approximately 10% of the women who give birth in New South Wales decide not to initiate breastfeeding, and the demographic characteristics of this group of women have previously been identified. This paper reviews the literature to explore the factors that influence women's decisions about breastfeeding, and their reasons for not initiating breastfeeding. The review revealed there are relatively few studies that explore the experiences of women who decide not to initiate breastfeeding, especially in the Australian context.

Keywords: infant feeding decision making, formula feeding, artificial feeding, bottle feeding, infant formula, artificial baby milk, breastfeeding

***Breastfeeding Review* 2011; 19(2): 9–17**

INTRODUCTION

This paper provides a narrative review of the current understanding of factors that affect the infant feeding decision. Key findings are highlighted, but the main focus is to examine the literature exploring the reasons why women decide not to initiate breastfeeding.

The rationale for this literature review stems from the premise that breastfeeding is the biological norm, and the optimal source of nutrition for human newborns, infants and young children. The decision not to breastfeed carries inherent short-term and long-term risks for the mother, her child, the family, the workforce and society (Horta et al 2007). Many high-quality studies support the benefits of breastfeeding, and it is a significant primary health promotion strategy (Kent 2006). To understand the current rates of breastfeeding initiation, it is necessary to review the literature describing the processes and influences driving the infant feeding decision. The main focus is on studies that examine the infant feeding decision, including the influence of health professionals and fathers/partners; the impact of the social context and culture; the influence of support; and the way that media and public opinion shape attitudes towards breastfeeding and how this affects support. The review identifies gaps in the literature, which will assist in defining future research questions.

The paper is divided into seven sections. Section one describes the search strategy and inclusion criteria for the literature review. Section two identifies the evidence in support of breastfeeding while section three describes the risks of artificial baby milks. Section four outlines breastfeeding practices in Australia. Section five discusses studies that examine the infant feeding decision and practice while section six reviews the various factors that may influence these decisions and practices. Finally, section seven outlines gaps in the literature and directions for future research.

SECTION ONE — SEARCHING THE LITERATURE

The initial search strategy included searching relevant databases (Medline, CINAHL, Psych Info) using the following terms: mothers, formula, formula feeding, bottle-feeding, not breastfeeding, artificial feeding. Limitations were abstracts with full text available, written in English and published between the years 1990 and 2010 (inclusive). The rationale for this large date range was to fully explore all work on the topic. Initially, 45 abstracts were perused and the full text selected if deemed relevant. A snowball search strategy was used to identify further relevant literature; that is, the reference lists of these articles were reviewed and further relevant articles were identified, the contents pages of lactation/infant feeding journals were scanned, and colleagues were asked to suggest further documents of interest. For the final review, 86 articles and documents were used and ten articles were excluded as being not relevant.

SECTION TWO —THE EVIDENCE IN SUPPORT OF BREASTFEEDING

All babies have the right to adequate nutrition, the right to the highest attainable standard of health and the right to life, and these rights can be argued to support a baby's right to breastmilk (Ball 2010).

The World Health Organization (WHO) has made global recommendations for breastfeeding as best practice for infant feeding (WHO 2003) — recommendations that are supported by the weight of evidence from a wide range of studies demonstrating both the short-term and long-term health benefits and importance of breastfeeding and breastmilk for mothers, infants, the family, society, the workforce and the environment. A range of authors and organisations (for example AAP 2005; Horta et al 2007; Kramer et al 2008; Leon-Cava et al 2002; NHMRC 2003) have systematically reviewed evidence from well-designed cohort and case-control studies, and have conducted meta-analyses to confirm the importance of breastfeeding.

While there are very few contraindications to breastfeeding, there are significant health problems associated with artificial feeding and artificial baby milks.

SECTION THREE — THE RISKS OF ARTIFICIAL BABY MILKS

The risks of artificial baby milks (commonly known as infant formula or artificial breastmilk substitutes) have been clearly identified. Many studies discuss how breastfeeding can reduce the risks of many preventable illnesses, but few acknowledge that not breastfeeding therefore increases the risks of these illnesses.

There is a strong association between the intake of formula and the risk of hospitalisation for infectious causes (Hengstermann 2010; Quigley, Kelly & Sacker 2007; Talayero et al 2006). Bartick and Reinhold (2010) demonstrate how increasing breastfeeding rates in the United States to the recommended levels would produce significant savings and prevent infant deaths. In the Australian population, Smith and Harvey (2011) have estimated that the attributable proportion of chronic disease is 6–24% for a 30% exposure to premature weaning.

SECTION FOUR — BREASTFEEDING IN AUSTRALIA

A range of policy documents demonstrate government support of breastfeeding in Australia (for example, Commonwealth Department of Health and Aged Care 2001; Commonwealth Department of Health and Ageing 2007; NHMRC 2003). Australia's goals and targets for the year 2000 and beyond (NHMRC 2003) appear to not have been met, but the lack of a national monitoring system, and the current fragmented approach to monitoring, are barriers to adequately reviewing breastfeeding data (Australian Health Ministers' Conference 2009). Further potential data issues include the validity of long-term maternal recall of feeding practices (AIHW 2009) and interpretation of the concept of the questions (ABS 2007). A review of Australian National Health Surveys (NHS) (Amir & Donath 2008) indicated that there has been little change in the overall initiation rates since 1995: 87.8% in 2004–05 compared with 86% in 1995.These data sets examine 'any breastfeeding', which is a combined measure of fully, exclusive or complementary feeding. What is clear from the data is that a socioeconomic gradient exists with regards to initiation,

with fewer infants in the lowest socioeconomic quintiles being breastfed (Amir & Donath 2008). Low socioeconomic status is also identified by the National Breastfeeding Strategy 2010–2015 as a barrier to the initiation of breastfeeding (Australian Health Ministers' Conference 2009).

The situation is similar when data from individual states are examined. For example, in New South Wales the percentage of infants 'ever breastfed' was estimated at 90% in 2001 (Hector, Webb & Lymer 2004) and 87% in 2003–04 (Garden et al 2007). These data were gathered using random phone survey techniques and are subject to similar limitations as the national surveys discussed above. Based on the data available, it would appear that, despite the range of policies that support breastfeeding, at least 10% of Australian women decide not to initiate breastfeeding.

SECTION FIVE —STUDIES EXAMINING THE INFANT FEEDING DECISION AND PRACTICE

Losch et al (1995:510) stated that, in the profiles of women who decided not to breastfeed, one of the most consistent findings was that 'women who decide to formula feed are not so much embracing this method of infant feeding as rejecting breastfeeding'.

The infant feeding decision

Women have been identified as less likely to initiate breastfeeding if they are younger than 25 years old when they have their first child, have not received tertiary education and are in a lower socioeconomic group (Productivity Commission 2009). While an important finding, these demographic characteristics do not provide any reasons as to how, why or when these women made the decision not to initiate breastfeeding.

Studies that have investigated the infant feeding decision have identified a range of reasons offered by women for their decision not to breastfeed. These reasons include:

- convenience (Dix 1991)
- dislike of the breastfeeding act (Losch et al 1995)
- embarrassment at feeding in public (Forste, Weiss & Lippincott 2001)
- personal health concerns (Sheehan, Schmied & Cooke 2003)
- fear of pain (Wambach & Cole 2000)
- concerns about ability to produce enough milk (Anderson et al 2004)
- partner involvement/approval (Earle 2000)
- early return to work (Lee & Furedi 2005)
- previous experience (Wojcicki et al 2010)
- preference (Wen et al 2009)
- comparability/superiority of formula (Murphy 1999).

Less commonly recognised factors such as body image (Wambach & Cole 2000) and maternal obesity may also be linked to decreased rates of initiation (Donath & Amir 2000; Dykes & Griffiths 1998). Childhood sexual assault has been suggested as another factor; several studies have found that the link cannot be confirmed, but underreporting of childhood sexual assault may have been a confounding factor in this research (Bowman et al 2009; Kendall-Tackett 1998; Prentice et al 2002).

Maternal characteristics

The reasons cited by mothers for breastfeeding appear to be infant-centred while the reasons offered for bottle-feeding with artificial baby milk would appear to be predominantly mother-centred (Britton & Britton 2008; Giugliani et al 1994; Wagner et al 2006) because reasons for bottle-feeding appear to be motivated primarily by concerns about the impact of the feeding process, as opposed to the feeding process itself (Losch et al 1995). Certain maternal personality traits (such as being reserved, sceptical or less likely to try new things) have been associated with being less likely to initiate breastfeeding (Wagner et al 2006). Women with lower self-concept (self-confidence) (Britton & Britton 2008) and decreased personal knowledge about breastfeeding (Ordway 2008) are less likely to breastfeed.

Responsible motherhood

The social construct of 'responsible motherhood' affects the infant feeding decision; no matter how mothers choose to feed their babies, they are likely to feel that they have to justify this choice. Shaker, Scott and Reid (2004) suggest that parents of infants fed with artificial baby milk, particularly mothers, may feel required to excuse or justify their feeding choices. Murphy (1999:205) stated 'formula feeding women are concerned to demonstrate that an act which, superficially, seems irreconcilable with responsible motherhood, is perfectly justified'. Lee and Furedi (2005) also suggest that the choice of infant feeding method has become a measure of motherhood. Departing from what is 'best' (breastfeeding) is perceived as questionable, and symptomatic of a woman's failure as a mother. There is a paucity of research about these societal pressures, but there has been more research into the timing of the infant feeding decision.

The timing of the infant feeding decision

The infant feeding decision is made well before conception or in the early stages of pregnancy (Earle 2000; Lawson & Tulloch 1995; Lee 2008) with figures suggesting 30–50% of women choose a feeding method before conception (Wagner et al 2006). Numerous studies have found that behavioural intentions assessed before the birth of a child are closely linked to mothers' actual feeding practices (Bonuck, Freeman & Trombley 2005; Donath, Amir & the ALSPAC study team 2003; Scott & Binns 1998; Shaker, Scott & Reid 2004).

SECTION SIX — FACTORS THAT MAY INFLUENCE THE INFANT FEEDING DECISION

The factors influencing the decision not to initiate breastfeeding, apart from the perceived barriers cited above, are varied and complex. In the United States, it has been identified that for Hispanic women, their mother tends to exert the most influence; for African-American women, their friends are most important; and for Caucasian women, it is their husband or partner who is most important (Losch et al 1995).

The partner (father of the baby)

Sheehan, Schmied and Cooke (2003) found that the father did not appear to play an integral role in women's breastfeeding decisions, and Scott, Shaker and Reid (2004) failed to find an independent association between infant feeding choice and paternal attitudes, but other literature is quite consistent and conclusive that the woman's partner is a strong influence in her infant feeding decision (Arora et al 2000; Earle 2000; Freed, Fraley & Schanler 1992; Hauck & Irurita 2003; Scott & Binns 1998; Rempel & Rempel 2004; Tohota et al 2009). The results of other studies that used multivariate analysis (Giugliani et al 1994; Scott et al 2001) support and strengthen these findings, because they have controlled for potentially confounding demographic and clinical variables. They have found that a partner's influence is a constant variable, irrespective of maternal age, educational level, ethnic group or marital status.

Fathers participate in, and influence, the infant feeding decision by acting as a key support or deterrent. Compared to the partners of breastfeeding women, the partners of women who use artificial baby milk are more likely to be younger, from a lower social class, have a lower level of education and demonstrate less knowledge of the benefits of breastfeeding (Shepherd, Power & Carter 2000). Studies have shown, however, that no matter which method of feeding is chosen, partners still have the attitude that women breastfeeding in public is embarrassing and unacceptable (Pollock, Bustamante-Forest & Giarratano 2002; Shaker, Scott & Reid 2004). Tohota et al (2009) identify this attitude as being due to the difficulty in the required shift in male perception from a sexual to functional use of the breast.

The mother's perception of the father's preference has been found to be a significant factor in her infant feeding decision (Arora et al 2000). Men's prescriptive breastfeeding beliefs can cause women to change their behaviour to match their partners' beliefs, rather than their original breastfeeding intentions (Rempel & Rempel 2004). The importance of paternal support, both emotionally and physically, is also a common theme (Tohota et al 2009) with some women choosing not to initiate breastfeeding in order to further engage the father in the relationship with the child (Earle 2000).

While women may seek direction from their partner in their feeding decisions, they may not necessarily seek the same support from health professionals (Sheehan, Schmied & Cooke 2003), who are uniquely placed to provide a positive influence.

Health professionals

Unfortunately, the literature is unclear on the issue of health professionals' influence. This is confounded by a lack of clarification in terminology. Various studies have reported the following:

- minimal impact (Giugliani et al 1994; Scott & Binns 1998)
- perception of attitude and support affected initiation and duration (DiGirolamo, Grummer-Strawn & Fein 2003)
- strong support of breastfeeding/not supportive of decision to bottle-feed (Lakshman, Ogilvie & Ong 2009; McIntyre, Hillier & Turnbull 1999)
- doctor's opinion/support positively associated with breastfeeding duration (Bentley et al 1999; Zhang, Scott & Binns 2004)
- part of midwives' role is to recommend breastfeeding (Cantrill, Creedy & Cooke 2003) but support is hampered by knowledge deficits.

In most studies on infant feeding, artificial baby milk is used as the standard for comparison (McNiel, Labbock & Abrahams 2010; Smith, Dunstan & Elliott-Rudder 2009), an approach that is inconsistent with the accepted use of the optimal treatment approach (ie breastfeeding/breastmilk) being the standard group or control group in research design. The explicit and implicit attitudes of medical professionals may also be positive or ambivalent due to a perceived equivalence between breastfeeding and use of artificial baby milk (Brodribb et al 2010). Their advice may be influenced by their personal attitudes and experiences, which have been formed by their social context and culture.

Social context and culture

Social and cultural norms predict breastfeeding initiation. There are major differences in the incidence of breastfeeding amongst various ethnic groups (Ryan, Wenjun & Acosta 2002; Scott & Binns 1998). For example, in the United States, lower rates of breastfeeding are consistently found among African-American and Hispanic women when compared with Caucasian women. Fooladi (2001) demonstrated that the free artificial baby milk provided to women enrolled in the US government funded program known as the Special Supplemental Food program for Women, Infants and Children (WIC) had a significant deleterious impact on young women's infant feeding decisions (Fooladi 2001). For young African-American women, bottle-feeding with artificial baby milk appears to have become the cultural norm. Australia may be experiencing some similarities due to the variances in race and culture in this country.

Australia's multiculturalism is evidenced by the population characteristics in the 2006 Census (ABS 2007). There is limited research in Australia into the infant feeding practices of women from culturally and linguistically diverse (CALD) backgrounds (Dahlen & Homer 2010); however, it is known that initiation rates are not consistent across all ethnic groups (Homer, Sheehan & Cooke 2002; Li et al 2004; Rossiter 1992).

A report on New South Wales mothers and babies (NSW Department of Health 2010) stated that 60.8% of Aboriginal/Torres Strait Islander (ATSI) women in NSW were fully breastfeeding on discharge from hospital in comparison with 78.8% of non-ATSI women; however, these results should be interpreted with caution due to maternal underreporting of Aboriginality. Despite the difficulties in obtaining reliable data, urban Indigenous mothers have been identified as being less likely to initiate breastfeeding (Australian Health Ministers' Conference 2009).

Support received by women of different cultures could be quite variable and it would appear that support is another influencing factor in the infant feeding decision.

Available support

The infant feeding decision is affected by the support a woman has access to within her social and cultural context. Sources of support may vary in different populations (Giugliani et al 1994) according to the woman's age, social class, ethnic group or culture (Matich & Sims 1992). Support may be tempered by the prevailing knowledge, opinion, approval and perception of infant feeding methods and practices (Hannan et al 2005) of a particular demographic group.

Matich and Sims (1992) measured tangible (eg money, time, services), emotional (eg affection, empathy, love) and informational (eg facts, knowledge, advice) aspects of social support and confirmed that these aspects have the capacity to affect infant feeding outcomes. A link has been identified between socioeconomic status and breastfeeding initiation (Australian Health Ministers' Conference 2009; Hector, Webb & Lymer 2004) with women from lower socioeconomic backgrounds using friends and family for support and to inform their infant feeding attitudes to a greater degree than do women from higher socioeconomic backgrounds (Lawson & Tulloch 1995).

Attitudes

Knowledge of having been breastfed as an infant or having a friend who breastfed generates a positive attitude towards breastfeeding (Anderson et al 2004; Cox & Turnbull 1994; DiGirolamo, Grummer-Strawn & Fein 2003; Donath, Amir & the ALSPAC study team 2003), increases confidence (Mossman et al 2008) and may be more influential than the demographic variables typically associated with breastfeeding (such as age and education) (Bonuck, Freeman & Trombley 2005). Similarly, women who perceive their own mother to prefer breastfeeding are more likely to initiate breastfeeding (Scott et al 2001).The lack of a positive attitude towards breastfeeding is especially significant among adolescent pregnant women or adolescent new mothers. The decision to breastfeed in this group is also related to the prevailing attitude and degree of support from their families (Mossman et al 2008).

Positive attitudes towards breastfeeding are a more important predictor of breastfeeding initiation than knowledge about breastfeeding (Losch et al 1995). An early study in the United States (Dix 1991:224) included mostly young single women enrolled in the WIC program and who were living with their families: 'from their families they learnt about feeding methods, observed how other women fed their infants, listened to their opinions and problems, developed attitudes, and chose a method of feeding their own infants'. The majority of the 81 young women in this study (84%) bottle-fed with artificial baby milk.

The media

The infant feeding decision-making process may be undertaken in isolation (Lee & Furedi 2005) or after seeking information from a variety of sources including the media. Different socioeconomic groups access different resources (Lawson & Tulloch 1995) — higher socioeconomic groups are more likely to use written materials such as books and magazines to inform their views.

The eroticism of breasts and idolisation of slim and immature bodies are incompatible with images of motherhood, breastfeeding and fertility (Rodriguez-Garcia & Frazier 1995). Breastfeeding and male sexual privilege have all been subject to much discussion (Maher 1995) and there has long been the suggestion that some women do not breastfeed due to their awareness of the erotic value of breasts to men. Public opinion in the United States considers it inappropriate to show breastfeeding on television (Hannan et al 2005). Although many children and young adults are never or rarely exposed to breastfeeding, most will be exposed to bottle-feeding through the media (Van Esterik 2002), often in the form of advertising.

Through advertising, the media not only alerts the public to new merchandise, but also teaches people why they need the product (Foss & Southwell 2006). Market researchers have estimated that 20% of Australian women read a monthly glossy magazine (Handfield & Bell 1996) with magazines often seen for years after their publication in a variety of settings. The content of these magazines may help formulate some negative ideas about breastfeeding amongst women, particularly young women who do not have the benefit of additional education. A recent Australian study of women's understanding of toddler milk advertisements (Berry, Jones & Iverson 2010) indicated that women clearly understood that the advertisements were not just for a single product but an affiliated range of products that undermined breastfeeding — yet they accepted the advertising claims quite uncritically. The use of scientific or technical sounding language was most persuasive. Supporting the findings of other studies, some of the women in the study indicated they would seek advice from other mothers to assist with verification of claims (that is, to inform their attitude and determine their infant feeding behaviour). This also suggests a practice of aligning behaviour in accordance with perceived public opinion.

Public opinion of breastfeeding

Research findings within the sociology literature suggest that social perception can automatically influence behaviour and the development of social norms (Ferguson & Bargh 2004), in this case the public opinion of artificial baby milk as an attractive or at least comparable alternative to breastfeeding (Merewood & Heinig 2004). Regional variation in public knowledge, attitudes, and support of breastfeeding, as demonstrated by Hannan et al (2005), has implications for the approval and support of women's infant feeding decisions and practice.

SECTION SEVEN —GAPS IN THE LITERATURE AND DIRECTIONS FOR FUTURE RESEARCH

This literature review has confirmed the importance of breastfeeding and the risks of formula-feeding (Horta et al 2007; McNeil et al 2010). Cost analyses have been performed in several nations with suboptimal rates of breastfeeding (Bartick & Reinhold 2010; Black, Morris & Bryce 2003). Australia, which also has suboptimal breastfeeding rates, would benefit from a similar review.

This review has identified the reasons women decide not to initiate breastfeeding (convenience, dislike, embarrassment, personal issues, fear of pain, returning to work, partner involvement/approval, simple preference, comparability of infant formula) but few studies have investigated this decision as a social construct (Lee & Furedi 2005; Murphy 1999) and not in the Australian context.

There are studies examining how issues such as attitudes, knowledge and support affect the infant feeding decision and practice in a variety of settings (for example, Arora et al 2000; Giugliani et al 1994; Losch et al 1995; Shaker, Scott & Reid 2004). In the majority of studies, however, mothers who feed with artificial baby milk are a subgroup and the focus of the study is on the promotion of breastfeeding or a comparison of 'breastfeeders' and 'bottle feeders' (mother/father/couples) on some aspect of infant feeding decision/practice.

Little published research specifically investigates the experiences of women who decide not to initiate breastfeeding, particularly first-time mothers. This conclusion is supported by a systematic review of qualitative and quantitative studies of mothers' experiences of bottle-feeding (Laksham, Ogilvie & Ong 2009) that identified only six qualitative studies that explored mothers' experiences, of which only one study (Lee & Furedi 2005) focussed exclusively on mothers who fed their babies artificial baby milk (although a proportion of these women had started out breastfeeding). Australian studies to specifically examine the influences on, attitudes and experiences of first-time mothers who decide not to initiate breastfeeding are lacking.

While there is quite a lot of literature on the influence of the partner/father of the baby with regards to infant feeding decisions and practices (for example Earle 2000; Pollock, Bustamante-Forest & Giarratano 2002; Rempel & Rempel 2004), there is a scarcity of studies specifically on fathers' experiences of formula feeding.

As the literature seems to suggest that women make their infant feeding decision prior to conception or early in pregnancy, outside the scope of health professionals, research to evaluate strategies aimed at altering public opinion would be useful. Public opinion of American families with regards to their attitudes and support of breastfeeding (Merewood & Heinig 2004) indicated a perception that breastfeeding was healthier and better, but artificial baby milk was 'good enough'. Similarly, while breastfeeding was seen as ideal, artificial baby milk was seen as 'standard' (rather than inferior). This research has not been replicated in the Australian context to determine if similar opinions exist.

This review has also highlighted that other issues impact on public opinion. The sexualisation of the breast as described by Rodriguez-Garcia and Frazier (1995) and the resulting conflict is another area that has not been thoroughly investigated in women who decide not to initiate breastfeeding and would be a worthwhile area of exploration.

While numerous studies have explored infant feeding in recent years, most have either adopted a quantitative approach or focussed on obstetric/socioeconomic/demographic factors. Although this information has been valuable there has been only minimal research to clarify how and why women make either their infant feeding decisions or the meaning of this decision for women, especially in contemporary Australian society.

SUMMARY AND CONCLUSION

Breastmilk confers a wide range of benefits at all levels of society, while the risks of artificial breastmilk substitutes are numerous. Australia's progress in monitoring breastfeeding rates has been hampered by a fragmented monitoring system.

The reasons women give for deciding not to initiate breastfeeding are varied and complex. The decision appears to be mother-centred as opposed to infant-centred and the mother may well have to justify her initial decision. The common influencing factors include: previous exposure to breastfeeding/attitude to breastfeeding, personality/self-concept, the influence of the partner/mother/peer group and accessibility to artificial baby milk. Age, income and education level also may influence the decision.

The woman's partner is the primary influencing factor in the infant feeding decision and practice. Fathers' degrees of support are informed by their level of knowledge and cultural influences, which in turn affect their attitudes and practices. A woman also bases her decisions on her perception rather than actual knowledge of her partner's preference. One attitude that many fathers share, however, is opprobrium for women breastfeeding in public.

Health professionals have been identified as seeming to provide support once a woman is breastfeeding but not necessarily with the decision process. They would appear to be hampered by a lack of clear and unbiased published information available. Their advice may also be influenced by their personal attitudes and experiences.

Social norms significantly predict breastfeeding initiation. Norms are influenced by culture and the woman's social context or culture. Culture is not easily defined, meaning different things to different people. Some cultural groups such as African-American women in the United States have identified they 'prefer' bottle-feeding. Within Australia, two cultural groups have been identified as requiring more support — Aboriginal and Torres Strait Islander women and CALD women (Productivity Commission 2009). Aboriginal women may experience difficulties accessing appropriate support systems. Migrant women face unique challenges when trying to assimilate into a new culture without knowledge of the available health care system and support services.

The effect of support and attitudes is a recurring theme in the literature. The presence of support increases confidence, while absence decreases it, both of which influence the initiation and duration of breastfeeding. Sources of support vary according to age, social class, ethnic group or culture.

The media has influenced attitudes and public opinion. The sexualisation of the breast, especially within cultures where bottle-feeding is the norm has resulted in conflicting social and sexual values for women. The attitude towards breastfeeding as displayed in parenting and women's magazines has been described as destructive.

It would appear from the literature that the experiences of women who decide not to initiate breastfeeding, as a separate specific group, have largely been ignored. The majority of research includes both breastfeeding mothers and mothers who use artificial baby milk. Any research on mothers who do not breastfeed has incorporated both women who are having their first baby and women who are having subsequent children. There are no studies exclusively focussing on women having their first baby who have decided not to initiate breastfeeding. This is an important group to investigate because women having their first baby may well experience confidence and commitment in a different way to mothers who have a past experience of infant feeding.

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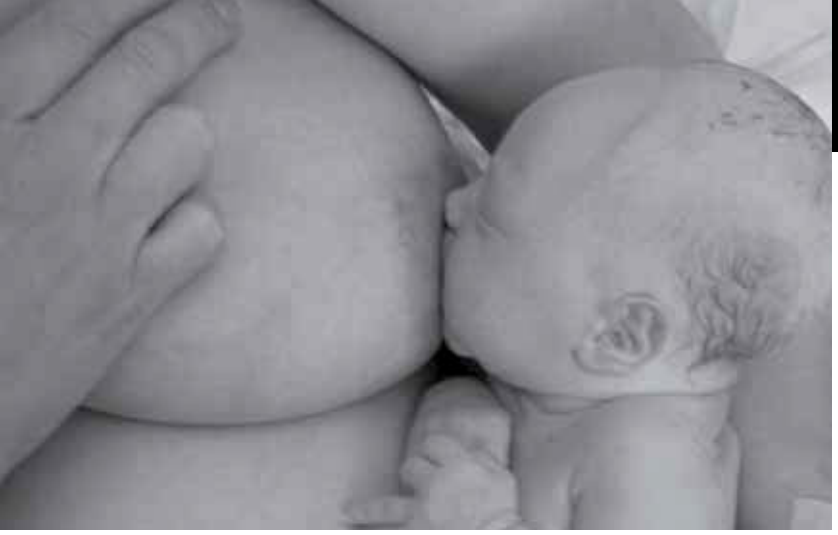

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The impact of the Baby Friendly Health Initiative in the Australian health care system: a critical narrative review of the evidence

ABSTRACT

Studies have identified that the practices of maternity facilities and health professionals are crucial to women's experience of support and breastfeeding 'success'. The Baby Friendly Hospital Initiative (BFHI) was launched globally in 1991 to protect, promote and support breastfeeding. While a direct causal effect has not been established and critics suggest the rhetoric conflicts with women's lived experiences as new mothers, a positive association between the Initiative and breastfeeding prevalence is apparent. Internationally, impact studies have demonstrated that where the Initiative is well integrated, there is an increase in rates of breastfeeding initiation and, to a lesser extent, duration. In consideration of the known health risks associated with the use of artificial baby milks this would suggest that BFHI implementation and accreditation should be a desirable strategy for committed health facilities. However, a variation in both BFHI uptake and breastfeeding prevalence between nations has been reported. This narrative review critically discusses a variety of issues relevant to the uptake and support of breastfeeding and the BFHI, utilising Australia as a case study. Whilst it enjoys 'in principle' policy support, Australia also suffers from a lack of uniformity in uptake and perception of the benefits of BFHI at all levels of the health system. Australian and international studies have identified similar enablers and barriers to implementation.

Keywords: *breastfeeding*, *breastfeeding support*, *Baby Friendly Hospital Initiative*, *Baby Friendly Health Initiative*, *Australia*

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INTRODUCTION

The evidence supporting the importance of breastfeeding is significant (Ip et al 2007). Breastfeeding promotion is an important public health strategy although women's breastfeeding decision-making processes and practices do not necessarily follow recommendations. Obtaining accurate data, through the implementation of robust reporting systems, to determine infant feeding trends and further support the impetus for implementing improvements in this area is challenging. Globally, key stakeholder meetings resulted in the development and dissemination of recommendations, supportive policy documents, strategies and resources such as the Baby Friendly Hospital Initiative (BFHI). In Australia the Initiative is governed by the Australian College of Midwives, who endorsed a name change from 'Hospital' to 'Health' in 2006 with the aim of including the community within the Initiative. It is now known and referred to as the Baby Friendly Health Initiative in Australia.

Impact studies propose that implementation of the Initiative and accreditation of maternity facilities as 'baby friendly' have positively influenced breastfeeding prevalence and practice (Abrahams & Labbok 2009). However a direct causal relationship has not been established and critics suggest conflict exists between the assumptions of the BFHI and the individual woman (Gottschang 2007). In Australia, uptake and implementation of the Initiative in maternity facilities has been variable. Attitudinal studies have identified both organisational and cultural barriers (Walsh, Pincombe & Henderson 2011), including a lack of policy

support and funding as well as a misunderstanding of the aims and outcomes of the Initiative (Schmeid et al 2011). To date, research on the Initiative has tended to focus on seemingly disparate aspects. This narrative review presents a synthesis of various issues related to breastfeeding and the BFHI — the sum of the parts that make up the whole. The paper discusses the issue of beneficence as it relates to women's experiences of breastfeeding support. It explores the state of evidence on which the Baby Friendly Health Initiative in high-income nations is based. The challenge of successfully developing and reporting on breastfeeding indicators is examined in detail. Finally, the impact of the Initiative on breastfeeding is also explored in order to examine the relationship between breastfeeding and BFHI practices using the Initiative in Australia as an illustrative case study.

SEARCHING THE LITERATURE

An initial search of the Clinical Information Access Portal (CIAP) maternal and infant care database of NSW Health and the Cochrane database was made using the following search terms: 'Baby Friendly Hospital Initiative', 'Baby-Friendly Hospital Initiative', 'Baby Friendly Initiative' and 'Baby Friendly Health Initiative'. Limitations included full text, human subjects and English language, with a date range of 1991 to current. This located around 70 articles which reduced to 38 after abstracts were reviewed for relevancy and duplicates removed. Further references were obtained from the reference lists of articles or were previously known to the author. The volume of material located was divided into two major categories. Category 1 data which is presented in this paper focussed on the impact of the Baby Friendly Hospital Initiative in international studies and the impact of the Baby Friendly Health Initiative in the Australian health care system.

The beneficent assumption that 'breast is best'

Breastfeeding is the biological norm for human infants yet globally, maternal resistance to exclusive breastfeeding remains. Motherhood carries social responsibilities, with the infant feeding decision and practice being one of the most outwardly visual. 'Breast is best' is a message given to pregnant women and new mothers by well-meaning people, including health professionals. Paternalism in healthcare provision occurs where there is a genuine beneficent assumption made that the recommended intervention will provide a health benefit (Cody 2003), and that people are obliged to do what is good for them. Within the social context of infant feeding, potential for conflict then arises between health professionals' beliefs in their moral obligation to promote breastfeeding and the rights of the individual woman to make her own pragmatic infant feeding decision/s. 'New mothers make infant feeding decisions in an increasingly consumer-oriented society that values choice and individuality' (Gottschang 2007 p65). Mothers may view their healthcare provision as paternalistic (Nelson 2006) and identify 'disconnection' as opposed to 'authenticity' in their experience of breastfeeding support (Schmied et al 2009). 'Good' mothers breastfeed (Marshall, Godfrey & Renfrew 2007); therefore women who act in opposition to this moral view are required to justify their decision within their social context (Lee 2007). Yet human rights law supports the infant's right to be breastfed/receive breastmilk while simultaneously supporting the woman's right to make a fully informed and supported free choice (Ball 2010), even if that decision is considered, in a public health context, to be less than optimal. Significant resources have been allocated to strengthen the evidence and reaffirm exclusive and sustained breastfeeding as a desirable infant feeding goal.

Reconsidering the evidence supporting the link between BFHI and breastfeeding outcomes

A review of the evidence base supporting BFHI and its impact on breastfeeding outcomes reveals that the evidence has been drawn mostly from observational studies. The inability to identify all variables that could affect or explain differences in outcomes when using an observational study design limits the evidence (Wolf 2011). Other methodological limitations include inadequate sample sizes, poor quality of data sets and ambiguity of operational definitions. Further potential for bias exists due to the differing characteristics of mothers who initiate breastfeeding and those who do not (Atchan, Foureur & Davis 2011). Consequently, the published evidence of individual studies is not considered compelling. However, after pooling data from many individual studies into systematic reviews and meta-analyses, for example Ip et al (2007), several health benefits achieve statistical significance. A randomised controlled trial (RCT) study design however, significantly minimises bias and provides the most robust evidence.

One such RCT was undertaken in Belarus (the PROBIT study) (Kramer et al 2001). This large prospective study used a cluster randomisation design with long-term follow up to 'assess the effects of breastfeeding promotion on breastfeeding duration and exclusivity and gastrointestinal and respiratory infection and atopic eczema amongst infants' (p413). The intervention was a structured breastfeeding support program. Hospitals and associated clinics throughout Belarus were randomised to the intervention or control arms of the study. All staff in the intervention group received significant training and support. Only women who were breastfeeding (17,046 mother-infant pairs) were enrolled into the study. Eligibility criteria included: the baby was born healthy, more than 37 weeks gestation, weighed at least 2500 g, with an Apgar score of greater than 5 at 5 minutes.

There were several contextual conditions that acted as enabling factors for the success of the PROBIT study. The recruitment period was 1996 to 1997 and the country's

maternity hospital practices were undeveloped. The intervention was implemented quickly into health care facilities with little resistance to policy change; many women came from a higher education group; caesarean section rates were low, as were smoking rates; discharge from hospital was commonly 6–7 days and the breastfeeding initiation rate was already 95%. Analysis consisted of multivariate techniques on the observational cohort studies nested within the RCT to control for potential biases. The Belarus study has continued to demonstrate a range of improved health outcomes (Kramer 2010) including short-term support for a reduced risk of gastrointestinal infection but not asthma and allergy. Long-term analysis has yielded mixed results: supporting previously found relationships between breastfeeding and neurocognitive development, whilst contesting any protective relationship between breastfeeding and obesity (Kramer, Moodie & Platt 2012). The Belarus study also provides robust evidence of the context bound, positive influence of a structured breastfeeding support program in a supportive environment. However, the almost 'utopian' conditions that contributed to the success of implementing the intervention limit the generalisability of the findings to other contexts. Furthermore, as there were no non-breastfed babies enrolled in the study, caution is required in interpreting the results; there is no comparison drawn between breastfed and non-breastfed infants.

The intervention used by the PROBIT study was a structured breastfeeding program modelled on the global Baby Friendly Hospital Initiative standards and used the World Health Organization/United Nations Children's Fund (WHO/UNICEF) lactation management training courses (Kramer et al 2001). The validation of this intervention in a RCT has provided supportive evidence for its inclusion in health policy at national levels.

The Baby Friendly Hospital Initiative

As maternal breastfeeding prevalence declined and a 'bottle feeding culture' emerged in the twentieth century there was a corresponding negative impact on infant mortality and morbidity. The WHO and UNICEF encouraged maternal healthcare providers and authorities to review their policies and practices related to breastfeeding support and make changes accordingly, in order to avoid (unwittingly) further contributing to the decline in breastfeeding (World Health Organization and the United Nations Children's Fund 1989). After successful testing, the Baby Friendly Hospital Initiative was officially launched in 1991 (Kyenkya-Isabirye 1992): a multi-faceted programme designed to guide the recommended health service change. The *Ten Steps to Successful Breastfeeding* (Baby Friendly Health Initiative 2012) serve as the foundation of the Initiative.

The expected result of implementation is an increase in breastfeeding prevalence. As a multilateral program, some of the Initiative's elements are prescriptive, highlighting how women should adjust to their role as a breastfeeding mother. Gottschang (2007) related the experience of women in China in the 1990s who identified a conflict between the rhetoric and assumptions of the Initiative and their contextual experiences. Similarly, Burns et al (2010) suggests that Australian women are adversely influenced in the way they see their body and their baby via 'biomedical discourses' (p215) concerning the Initiative and public health messages. Nevertheless, since its inception significant work has gone into providing supportive evidence for the Initiative's interventions.

Reconsidering the evidence supporting the Initiative

Structured breastfeeding promotion interventions have been demonstrated in systematic reviews by the prestigious Cochrane Collaboration and others, to show a statistical increase in exclusive and 'any' breastfeeding rates: reviewing randomised, quasi-randomised, non-randomised, cross sectional, cohort and descriptive studies and meta-analyses (Beake et al 2011; Britton et al 2007; Fairbank et al 2000). The effect is more obvious in nations with pre-intervention low breastfeeding uptake and duration. A number of impact studies have occurred in a variety of settings to assess the influence of BFHI interventions. An examination of global trends, population-based as well as regional and local studies follows.

Global assessment of BFHI impact

Demographic and health surveys, plus UNICEF BFHI reports comparing pre- and post-Initiative trends in exclusive breastfeeding, have indicated a statistically significant annual increase in exclusive breastfeeding rates in a number of low income countries (Abrahams & Labbok 2009). Worldwide, approximately 27.5% of all maternity facilities have 'ever' been designated 'Baby Friendly' (Labbok 2012). There are acknowledged limitations to the conclusions that can be drawn from this survey for the following reasons: only two-thirds of countries provided information and data was not collected originally for research purposes. Definitive statements on statistical associations were not drawn, rather 'chronological, ecological correlates, open to discussion and alternative interpretations are presented' (p220). There is also no way of knowing the currency of BFHI designations as only 'ever designated' data was requested for the assessment. Despite these acknowledged limitations the strength of the assessment is that this is the only continuous global data available for the Initiative. Population-based studies are more numerous.

Population-based studies

A number of population-based studies (Bartington et al 2006; Broadfoot et al 2005; Chalmers et al 2009; Chien et al 2007; Declercq et al 2009; Merten et al 2005; Venancio et al 2012) in a variety of countries have used large, randomly selected cohorts and proportional probability

sampling methods to assess breastfeeding prevalence and duration and the influence of BFHI implementation on breastfeeding success. The studies all used either a postal survey and/or interview at one or more points in time to collect data based on 24-hour maternal recall. Limitations of these methods will be addressed in the next section. Multivariate analysis was used to identify significant determinants of breastfeeding. In all studies there was a positive association between birthing in, or experience of, a number of baby friendly practices in the birthing facility. There was a corresponding reported increase in breastfeeding rates, both in exclusivity and, to a lesser extent, duration. Studies at the regional and local level have also investigated links between breastfeeding prevalence and practice and the Initiative.

Regional and local studies

At the regional and local level, studies using surveys of maternal recall have investigated breastfeeding indicators pre- and post-implementation of the Initiative (Braun et al 2003; Caldeira & Gonçalves 2007; Çamurdan et al 2007). These studies recruited smaller sample sizes than the population studies but also surveyed at several similar time points. Analysis likewise indicated a positive impact post- implementation. Evidence also suggests the degree of positive impact on breastfeeding rates at the hospital level is influenced by the number of interventions actually implemented in clinical practice (Merten et al 2005). This further suggests a cumulative effect and dose-related response (DiGirolamo, Grummer-Strawn, & Fein 2008). The average breastfeeding duration is reportedly longer in babies born in a BFHI hospital that maintains good compliance with the Initiative's strategies once implemented. However, variations in the degree of compliance amongst BFHI accredited hospitals may negatively impact on breastfeeding practices. There is also a correlation between the number of baby friendly hospital practices implemented and breastfeeding prevalence (Declercq et al 2009; DiGirolamo et al 2008). The greater the number of hospital practices experienced by mothers, the more positive the reported association with any breastfeeding. In contrast, mothers who reported experiencing no baby friendly practices in the hospital setting were 13 times more likely to cease breastfeeding before 6 weeks than mothers who had experienced at least six practices (Chien et al 2007). Links between breastfeeding and BFHI implementation have also been assessed by other means.

Other studies linking changes in breastfeeding practices with BFHI implementation

A large observational study in Scotland (Broadfoot et al 2005) used a mixed methods approach to examine the effects of the BFHI on breastfeeding rates in Scotland. Multivariate analysis was used to determine associations. An increase in breastfeeding rates at 1 week of age was linked to the level of BFHI implementation and accreditation obtained. Limitations included only measuring breastfeeding at one point in time and omitting standardised breastfeeding definitions. The potential for hospital reporting bias also existed but was not identified or discussed.

A 2001 examination of 29 baby friendly hospitals in the United States of America indicated higher breastfeeding rates than the general population (national average) in the same year, regardless of demographic factors (Merewood et al 2005). Significant variation was exhibited in definitions of exclusivity used to establish breastfeeding rates as well as in methods of data collection and analysis. A further identified limitation was that the national survey that was used as a data comparison utilised maternal recall whilst the study accessed hospital records. Finally, analysis was limited due to the small number of hospitals in the sample.

The studies described above have utilised a variety of indicators at one or more time points to assess breastfeeding characteristics, prevalence and duration and the influence of BFHI implementation on breastfeeding 'success'. Methodological limitations are apparent and a direct causal link has not been demonstrated, although a positive association is highly probable. As the proportional risk of artificial baby milks and preventable illness (Bartick & Reinhold 2010) and the increased risk of hospitalisation for infectious causes (Quigley, Kelly & Sacker 2007) are well established, an accurate and consistent measurement and reporting system for infant feeding is essential to comprehensively determine the effects of breastfeeding promotion activities and inform health policy.

Developing and reporting on breastfeeding indicators

Infant feeding practices vary widely during the first six months of life and breastfeeding indicators are hard to define. To be accurate, the definition of an indicator needs to remain constant each time it is measured and reported. Few countries have successfully implemented an accurate and consistent measurement and reporting system (Hector 2011) with significant disparity between reported breastfeeding rates occurring when different data sources are used (Chapman & Perez-Escamilla 2009; Flaherman et al 2011). Confounding issues include the clarity of the wording of indicators, the boundaries of ages reported against and the interpretation of data gathered.

On WHO recommendations (World Health Organization 2008b), surveys routinely gather data using 24-hour maternal recall at one or more separate points in time, known as 'current status'. Current status is used to minimise the potential for recall bias. It collects data within a relatively short period of time and is cost effective. The acknowledged and accepted outcome is a potential overestimation of exclusivity in the first

6 months and a misinterpretation at measured time points thereafter, as accuracy of the data measured for exclusivity is questionable if the infant received artificial baby milk in the time periods not assessed (Noel-Weiss, Boersma & Kujawa-Myles 2012). Other limitations include misunderstanding of the question, intentional deception on the part of the respondent who provides the answer he or she thinks the interviewer wants to hear, and the large sample sizes required to precisely estimate subpopulation practices (Australian Institute of Health and Welfare 2011a). A Swedish study (Aarts et al 2000) compared the breastfeeding practices of 506 mother-infant pairs who completed daily recordings on infant feeding for 9 months. This data was analysed using both 'current status' and 'since birth', that is, how the infant was fed over time. There was a wide discrepancy between the two indicators and a significant overestimation of breastfeeding prevalence at all time points. Notwithstanding the above, the use of 'current status' appears to be the accepted indicator measure.

Despite reporting against the established WHO definition of exclusive breastfeeding (World Health Organization 2008a), it is also apparent that some researchers have accepted data that skews results, for example ignoring the use of early pre-lacteal feeds while simultaneously classifying the baby as exclusively breastfed (Hector 2011; Perez-Escamilla et al 1995). Finally, the current WHO definitions merely address the needs of statisticians and policy makers where determination of infant feeding trends, that is, 'what' the baby is fed, are required to help determine health policy. This presents a dilemma for breastfeeding and lactation researchers who argue that the current definitions do not accurately describe 'how' breastfeeding occurs within the complex relationship that exists between the breastfeeding mother and her baby (Noel-Weiss et al 2012). Breastfeeding is highly complex physically, emotionally and socially. The method of feeding, the context in which it occurs as well as the 'product' consumed could be equally important in influencing health outcomes.

Australian studies support many of the findings in the studies described above, both in the divergence from international breastfeeding recommendations, the need to establish an accurate reporting mechanism and variance in uptake of the BFHI. A description of the Australian context follows.

Australia as a 'case study'

The National Breastfeeding Strategy 2010–2015 (Australian Health Ministers' Conference 2009) has been commissioned by the Federal government to increase the percentage of babies exclusively breastfed in the first 6 months. An identified socioeconomic discrepancy in breastfeeding duration is apparent (Amir & Donath 2008) although significant effort has since gone into developing accurate indicators to measure breastfeeding practices (Australian Institute of Health and Welfare 2011b). Using a random sample of 28,759 women, 'current status' and statistical adjustment weighting, the 2010 Australian National Infant Feeding Survey (Australian Institute of Health and Welfare 2011a) identified that while over 90% of mothers initiated breastfeeding, only 39% of infants were exclusively breastfed to 3 months and 15% to 5 months. Furthermore, artificial baby milks were identified as being an attractive or at least a comparable alternative to breastfeeding. Twenty six percent of women surveyed stated they did not breastfeed/continue to breastfeed because 'infant formula was as good as breastmilk' (p39). The demonstration of comparability supports other studies' illustration of the success of formula industry advertising in Australia (Berry, Jones & Iverson 2009). It also raises questions about the efficacy of the current monitoring systems and the accuracy of information sources of health care workers (Berry, Jones & Iverson 2011). The lack of government protection negatively impacts on women's capacities to make fully informed infant feeding choices—a human right. Finally, whilst a recent Australian study did not identify any association with the BFHI, it clearly demonstrated that midwives' language and practices when providing breastfeeding support and assistance was not necessarily cognisant or accommodating of women's context and needs (Beake et al 2012).

In Australia the BFHI is supported in principle at a national level (National Health and Medical Research Council 2012). Implementation is also encouraged through its inclusion in health policy in several, but not all, states. Similar to other middle and high-income nations (Philipp & Radford 2006) accreditation of Australian facilities has been protracted and implementation is varied. An exact determination of the percentage of current BFHI facilities in Australia is challenging due to an apparent data mismatch. *Australia's mothers and babies 2009* (Li et al 2011) provides the latest figures for hospitals and birth centres. However in some jurisdictions, a birth centre and co-located hospital labour ward would be considered as one maternity unit' (p54). As a result, information about the exact number of facilities in each state eligible for BFHI accreditation is open to interpretation. The Australian College of Midwives uses the same set of definitions for maternity units as the Australian Institute of Health and Welfare. The BFHI website is updated as facilities achieve or relinquish accreditation and reaccreditation. It was last updated in 2012. Despite the potential for inaccuracy, this still remains the only information about BFHI prevalence and trends in Australia and is an important tool. Based on the current available data currently, 76 or approximately 19% of the 394 hospitals and birth centres in Australia are accredited as baby friendly (Baby Friendly Health Initiative 2013). Variability in accreditation across states exists and is clearly demonstrated in Table 1.

Table 1. BFHI accredited facilities in each state using data from *Australia's mothers and babies 2009*[a] (Li, McNally, Hilder & Sullivan 2011) and BFHI Australia[b] (Baby Friendly Health Initiative 2013).

State	Hospitals and birth centres[a]	BFHI accredited facilities[b]	Percentage*
Tasmania	10	8	80%
Northern Territory	6	4	66%
Australian Capital Territory	4	2	50%
South Australia	43	15	35%
Queensland	104	19	18%
Victoria	83	14	17%
New South Wales	105	9	8.5%
Western Australia	39	5	7.5%
Total	394	76	19%

Percentages have been rounded up or down for convenience

Whilst these achievements are applauded, the extent to which Australia provides a consistent standard of BFHI practices, irrespective of accreditation status, has not been identified. It is therefore difficult to fully determine the degree of impact of BFHI in Australia. Allocating funds to support BFHI implementation and accreditation has been questioned due to the already high rate of initiation (Fallon et al 2005). However, full implementation of Step 10 (Baby Friendly Health Initiative 2012) is vital for supporting duration as it is encourages the development of community-based peer support, an identified evidence-based strategy.

Australian studies have revealed further barriers at all levels of the health system. Managerial support within health facilities for BFHI accreditation is hampered by a lack of funding, with the result that seeking accreditation is a low priority (Walsh et al 2011). A lack of formal breastfeeding management training for midwives (Cantrill, Creedy & Cooke 2003) has resulted in a deficiency in the understanding and practice of BFHI standards (Cantrill, Creedy & Cooke 2004). Furthermore, midwives have identified the use of divergent practices while working in a hospital preparing for accreditation (Schmeid et al 2011) and in a facility already designated as baby friendly (Reddin, Pincombe & Darbyshire 2007).

CONCLUSION

In summary, despite the complexities of researching infant feeding and a number of identified limitations, the sum of impact studies attended at all levels provides enough evidence to strongly suggest an ongoing positive relationship between the Baby Friendly Health Inititiative, changes in practice and breastfeeding prevalence. The relationship between a single national program and breastfeeding behaviour change will always be challenging to measure accurately. It is naïve to expect that one program will single-handedly have an ongoing positive impact on breastfeeding determinants and outcomes as it is not necessarily able to address the complex priorities of women's infant feeding decisions and practice. Individual, group and societal factors, plus other potentially complementary government and non-government programs, all exert an influence. The lack of clearly worded and sensitive indicators, inaccurate reporting against accepted indicators and the lack of studies with sufficient sample size has reduced the capacity for researchers to make conclusive statements about the existence of direct causal effects between breastfeeding practices and the Initiative, although a positive association is clearly apparent. Australian studies reflect many of the international findings. The degree of comprehensive ongoing support in the national agenda to protect, promote and support breastfeeding in Australia appears to be minimal. Further research to identify the extent of BFHI implementation in Australia and the impact on breastfeeding is required urgently to provide policy makers with evidence on which to base specific recommendations and facilitate governmental support for women to achieve their breastfeeding goals.

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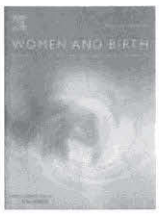

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Review article

Applying a knowledge translation model to the uptake of the Baby Friendly Health Initiative in the Australian health care system

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ABSTRACT

Background: The Baby Friendly Hospital Initiative is a global, evidence-based, public health initiative. The evidence underpinning the Initiative supports practices promoting the initiation and maintenance of breastfeeding and encourages women's informed infant feeding decisions. In Australia, where the Initiative is known as the Baby Friendly Health Initiative (BFHI) the translation of evidence into practice has not been uniform, as demonstrated by a varying number of maternity facilities in each State and Territory currently accredited as 'baby friendly'. This variance has persisted regardless of BFHI implementation in Australia gaining 'in principle' support at a national and governmental level as well as inclusion in health policy in several states. There are many stakeholders that exert an influence on policy development and health care practices.
Aim: Identify a theory and model to examine where and how barriers occur in the gap between evidence and practice in the uptake of the BFHI in Australia.
Results: Knowledge translation theory and the research to practice pipeline model are used to examine the identified barriers to BFHI implementation and accreditation in Australia.
Conclusion: Australian and international studies have identified similar issues that have either enabled implementation of the BFHI or acted as a barrier. Knowledge translation theory and the research to practice pipeline model is of practical value to examine barriers. Recommendations in the form of specific targeted strategies to facilitate knowledge transfer and supportive practices into the Australian health care system and current midwifery practice are included.

What is already known on the subject:

- The full range of breastfeeding support nationally in Australian maternity facilities is unknown.
- Organisational and individual attitudinal barriers to implementation and accreditation of BFHI have been identified.

What this paper adds:

- A conceptual model utilising knowledge translation theory provides a structured framework for the translation of knowledge into the Australian health care system and midwifery practice with regards to BFHI implementation and accreditation.
- Recommendations arising from the conceptual model may lead to higher levels of implementation of the 'Ten Steps' and BFHI accreditation.

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1. Introduction

Protecting, promoting and supporting breastfeeding is an important public health strategy. There is international evidence that implementation of the global strategy known as the Baby Friendly Hospital Initiative and accreditation of maternity facilities as 'baby friendly' has positively influenced breastfeeding initiation and short-term duration.[1,2]

In Australia the Initiative changed its name in 2006 to demonstrate its inclusion of the community and is now known as the Baby Friendly Health Initiative (BFHI). Implementation of the Initiative in maternity facilities has been variable indicating an evidence-practice gap at all levels of the health care system. Although the Initiative is supported 'in principle' in Australia, studies have identified organisational and cultural barriers to implementation.[3] Barriers include a lack of policy support and funding as well as a misunderstanding of the aims and outcomes of the Initiative. This theoretical paper seeks to provide a model for understanding the issues influencing the translation of knowledge into the Australian health care system and midwifery practice with regards to BFHI implementation.

This paper is organised in four sections. A brief description of the BFHI and the evidence supporting its implementation is presented, namely the positive association between the Initiative's practices and breastfeeding prevalence. The BFHI is then situated in the Australian context. Knowledge translation theory is proposed as a means of understanding the issues that influence the translation of knowledge into practice in healthcare. Finally an adaptation of a knowledge translation conceptual framework,[4] which also considers the process of change management is utilised to explore issues that influence the translation of evidence underpinning the BFHI into the Australian healthcare system and midwifery practice. Recommendations in the form of specific targeted strategies to facilitate knowledge transfer and supportive practices into the health care system and current midwifery practice are included.

2. The evidence supporting the implementation of the BFHI

The BFHI is a multifaceted intervention. "The Ten Steps to Successful Breastfeeding"[5] are intended to present the complexities of the strategy in a simple, easy to understand format. Each "step" comprises a minimum quality standard to achieve and maintain. Full implementation is designed to provide a framework for clinical practice and enable a breastfeeding culture in maternity facilities. The expectation is that hospital policies that do not support breastfeeding are replaced with evidence-based strategies to promote best practice and facilitate maternal informed infant feeding decision-making and practices. The anticipated result is an increase in breastfeeding and breastfeeding-related health outcomes at a local and national level.

Impact studies to demonstrate the effectiveness of the Initiative have been undertaken internationally at population, national and local levels. There are a number of complexities in researching infant feeding. The sum of research findings however provides enough weight of evidence to strongly suggest an ongoing positive relationship between the Initiative, changes in practice and breastfeeding prevalence.[6] When added to the well documented health outcomes BFHI implementation and accreditation is a desirable strategy for policy makers and health service managers to actively pursue and implement.

The evidence supporting the benefits of implementing the BFHI has been drawn from a single large randomised controlled trial (the PROBIT study). The PROBIT study[7] minimised multiple sources of potential bias to provide robust evidence of the impact of the Initiative with follow-up data on breastfeeding and health outcomes. This study, together with two large systematic reviews and meta-analyses of many small, individual studies of breastfeeding have established there are clinically and statistically significant health benefits for breasteeding.[8,9]

The World Health Organization (WHO) has made strong recommendations for exclusive breastfeeding for the first six months of life followed by continued breastfeeding (with the addition of nutritious family foods) until well into the second year or beyond.[10] In Australia, despite national health policy endorsement[11] the WHO recommendations are not being met.[12] One reason may be that commercially produced artificial baby milks have been identified as being an attractive or at least a comparable alternative to breastfeeding. The marketing practices of the breastmilk substitute industry promote and maintain a high public opinion of their products[13] and encourage uncritical acceptance of their health statements.[14,15] Therefore the efficacy of the voluntary regulation to protect breastfeeding that currently exists in Australia is questionable.[16] Since infant feeding is highly emotive and contextualised for each woman and her family, women turn to midwives for advice and support with their decisions and practice. However it is clear that midwives are also subject to situational influences. It is within this context that the Baby Friendly Health Initiative in Australia is operationalised.

3. The Baby Friendly Health Initiative in Australia

The Initiative in Australia is supported 'in principle' at a national level.[11] BFHI implementation is also encouraged through its inclusion in health policy in several states. Similar to other middle and high-income nations[17] accreditation of Australian facilities has been protracted and implementation varied. Currently 74 or approximately 19% of the 394 maternity facilities in Australia are accredited as 'baby friendly'.[18] The number of maternity facilities applying for re-accreditation appears to outnumber those seeking accreditation for the first time.

Currently it is not possible to determine the extent to which a consistent standard of BFHI practices is provided across Australia, irrespective of accreditation status.[19] Published data on implementation are found in the Victorian maternity service performance indicators.[20] The internal audit process and report indicates a high level of implementation is achieved in the majority of Victorian maternity facilities. If researchers, policy makers and health service managers are unable to determine the degree of impact of the BFHI in Australia this may further hamper its uptake. What is apparent is the existence of a gap between the international evidence supporting the Initiative's implementation and its integration into Australian practice. In order to increase our understanding of why the gap exists and how to address it the following section examines the problems associated with, and barriers to, the translation of evidence into practice.

4. How does evidence translate into practice in healthcare settings?

The aim of evidence-based practice is to provide clinicians and patients with choices about the most effective care based on the best available evidence. However, a gap exists between acquired knowledge and actual practice. The progress of adopting evidence-based therapies and implementation of guidelines has been described as both slow and random.[21] Results of the ensuing gap are poorer health outcomes, health inequalities and wasted time and money.[22] Both time and resources have been invested in studies attempting to ascertain why the introduction of new technologies and practices are not readily integrated into the practice of most workers.[23] To successfully introduce a new innovation that involves practice change, strategies that address

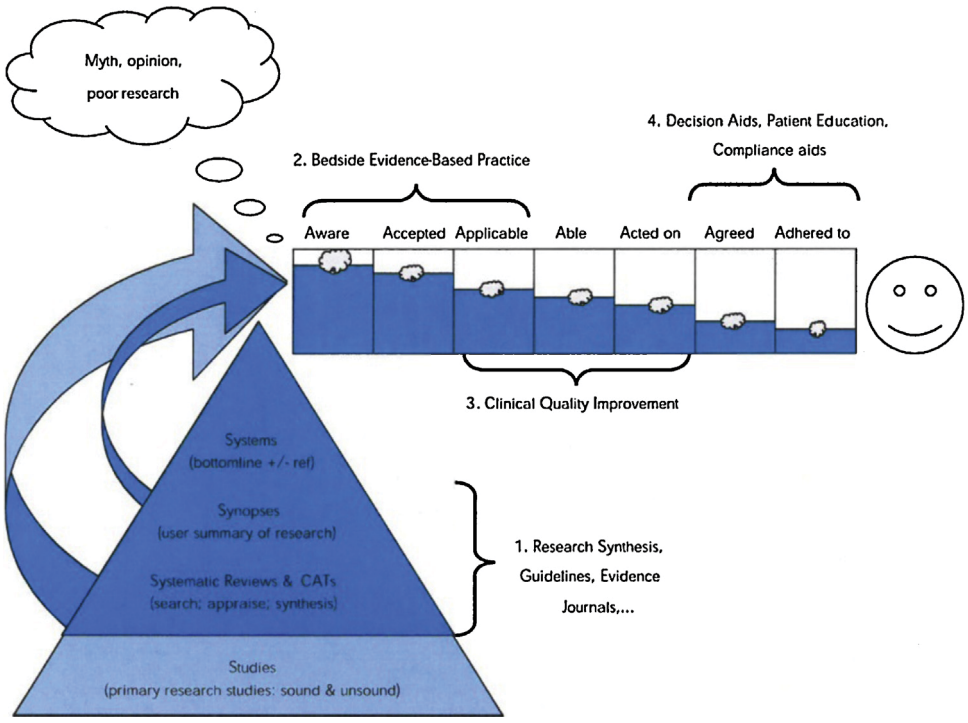

Fig. 1. The research to practice pipeline (reproduced with permission).

both organisational and individual concerns are required. Common and effective interventions used to support change in midwifery practice must include active participation, goal setting and planning for change[24]: regrettably there is still a paucity of research in the field. We propose that the theory of knowledge translation can provide valuable assistance and insight into understanding the change process and change management.

There are multiple terms in the literature to describe all or part of the concept of the knowledge translation process[25] causing confusion to both researchers and users of knowledge. Knowledge translation is about creating, transferring and transforming knowledge from one social or organisational 'unit' to another; it is an intricate, interactive process that depends on human beings and their context.[26] The knowledge translation process is the promotion of practice-based behaviour building on evidence-based research. It concerns health outcomes and changing behaviour, focussing on all possible healthcare participants. International studies reveal the importance of identifying and working to the strengths of all potential stakeholders to achieve 'synergy' in the knowledge translation process and overcome challenges.[27] The knowledge translation process is particularly useful for population health, an area within which infant feeding decisions and practices and the BFHI squarely sit, and health outcome gaps have already been documented.

It is beyond the scope of this paper to discuss the full range of knowledge translation models depicted in the literature[28,29] however one that appears to be useful is the research to practice 'pipeline'.[4] The strength of this model is that it provides a simple but clearly structured method to systematically review barriers to the use of evidence. As with all models it has limitations that require discussion to evaluate applicability. The unidirectional, linear knowledge transfer flow[22] would appear to be at odds with the innovation journey, described elsewhere as a non-linear and unruly process.[30] On face value the pipeline model does not appear to take into account the complexity of human nature and the challenges of effecting change. However if the model is interpreted with these limitations in mind it is possible to examine the issues in greater depth. It is a practical model to identify influences on midwifery practice that may influence BFHI implementation and accreditation.

An early model of the research to practice pipeline[31] utilised a medical paradigm to describe the cognitive and behavioural steps physicians take when they comply with clinical practice guidelines, namely the movement from awareness of, to taking action on evidence. The model was further developed conceptually[4] with extra elements added. The extra elements were the cognitive and behavioural steps the patient or consumer of health care takes when complying with medical recommendations. These processes are shown in Fig. 1.

The original authors of the pipeline model asserted that new knowledge in the form of original or translated research is constantly being generated but not necessarily entering practice in a timely manner to produce improved health outcomes.[4] The authors identified five stages clinicians (in this case meaning doctors) go through in translating knowledge into action before advice is given (to a patient): awareness, acceptance, applicability, ability and acted upon. The major assumption of the model itself is that at each stage from awareness to adherence there is 'leakage' or decrease in uptake, resulting in a reduction in the transfer of knowledge and action between implementation stages. Consequently the patient or clinical outcome impact may be very low and health outcomes are less positive than originally expected. The model has previously been used as a means to discuss the barriers in implementing breastfeeding evidence in general, with suggestions included for practice improvement.[32] The pipeline model has also been used to promote discussion about effective ways of tracing and identifying the impact of evidence and its implementation.[33]

The pipeline model can be adapted to other populations or professional groups quite easily. We propose that this model has significant applicability in identifying the issues that impact on the uptake of the Baby Friendly Health Initiative by midwives and maternity service managers in Australia. To illustrate its applicability the model has been situated within a midwifery context. It describes the behavioural and cognitive steps taken by both health service management and clinical midwives in translating evidence

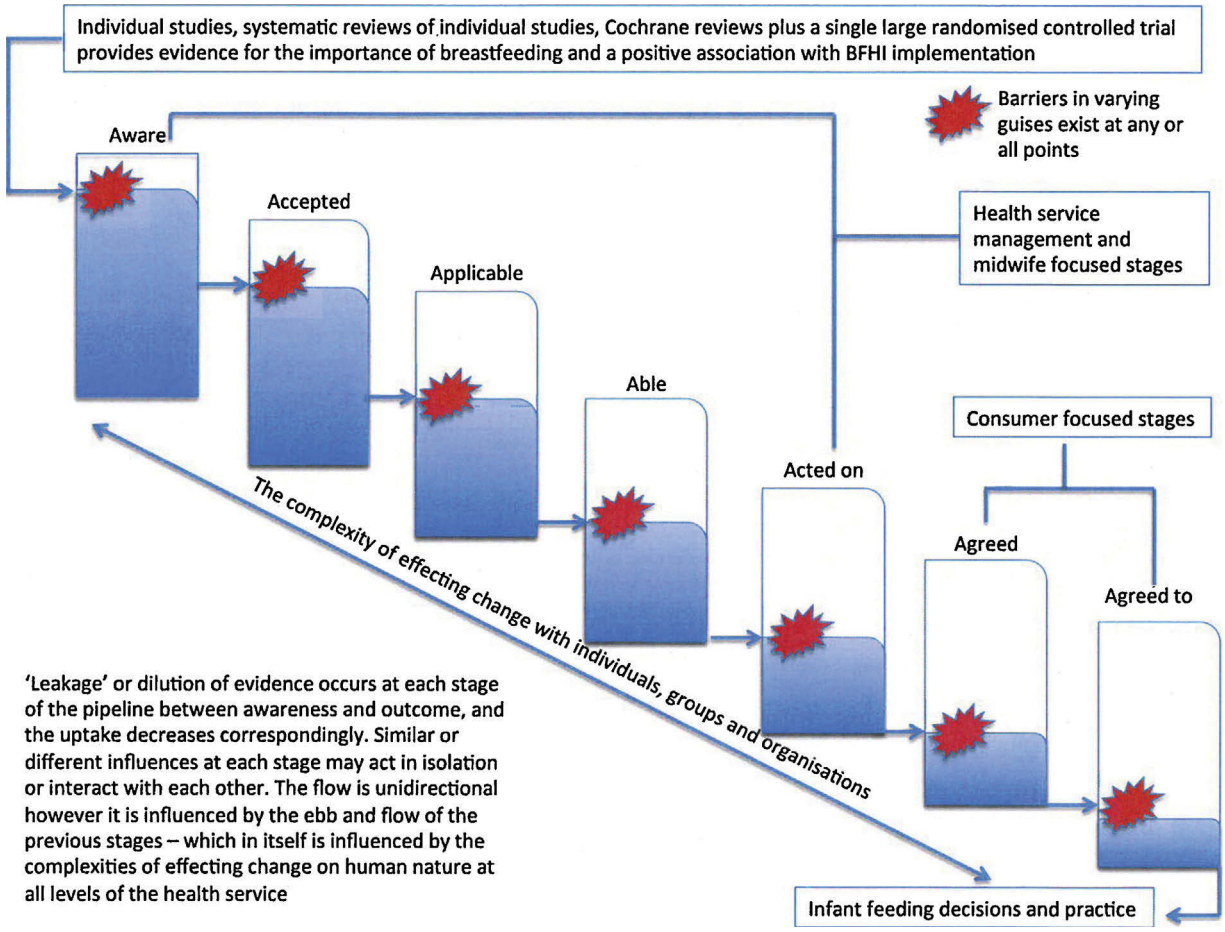

Fig. 2. The BFHI research to practice pipeline model (adapted).

into practice. The final two cognitive and behavioural steps are situated in the context of the consumer; in this case the women who access the service. These processes are shown in Fig. 2.

Compared to the international literature there are relatively few studies pertaining to the BFHI in Australia however the findings are consistent cross nationally. The following section utilises the adapted pipeline model (illustrated above) to identify issues that may be relevant to midwifery practice and the low uptake of the Initiative at all levels within the Australian healthcare system. Recommendations that could potentially increase the uptake of evidence are also provided for consideration.

5. Issues impacting on the implementation of the BFHI in the Australian context

5.1. Awareness (of relevant, valid research by the midwife)

Research clearly demonstrates the importance and positive health outcomes of breastfeeding and practices supportive of breastfeeding as demonstrated in the BFHI standards. Therefore midwives' awareness of contemporary, relevant and accurate research is the first large hurdle in the flow of evidence through the pipeline. Midwives are expected to be involved in research and education as part of their competency requirements.[34] There are a number of systematic reviews and clinical guidelines developed to assist and inform practice. Nevertheless, for a variety of contextual reasons it can be a challenge for many midwives to remain current in their practice.

The structure of published research is important in assisting midwives to increase knowledge and inform practice. It is globally accepted that the breastfeeding of infants and young children is optimal and the desired standard. The changes in and changes resulting from breastfeeding practice and international strategies have long been chronicled for midwives' reflection[35] and critical changes in practice have been noted. However midwives need to seek a wide range of knowledge to support practice.

In the broader health care arena it has been proposed that an odds ratio model be used on research published on preventable infant conditions.[36] This type of information message uses "loss framing" rather than "gain framing"[37]; for increased effectiveness the risk of not breastfeeding rather than the benefit of breastfeeding is emphasised. In Australia, the risks of commercially produced artificial baby milk use at a population health level have been identified[38] using this language to convey risk information. Using the same framing method Smith and colleagues reviewed the titles and abstracts of 78 scientific studies of health impacts of breastfeeding versus formula feeding.[39] Only 4% made a clear reference to health risks and infant formula in the title. Two thirds were neutral statements and one third misleadingly associated breastfeeding with illness or disease. Of the abstracts 11% clearly communicated an association between artificial infant feeding and increased risk of illness. 17% used the terms "advantages of breastfeeding" while 72% made no mention of formula or did not compare formula feeding to breastfeeding other than when describing the method. Using a revised risk ratio model will further highlight the risks of formula feeding rather than the 'benefits of breastfeeding' in the minds of health care providers resulting in increased encouragement of exclusive breastfeeding.

Australian midwives' general level of knowledge and management about practices supporting BFHI implementation has also

been studied.[40] Results indicated Step 4 of the "Ten Steps to Successful Breastfeeding",[5] which promotes immediate and prolonged skin to skin contact after birth, was not clearly understood or well-practised. The responses of over a third of the sample demonstrated poor practice suggesting the research findings that guide this practice were not known or not accepted by many of the midwives. To date midwives' understanding of the evidence underpinning the "Ten Steps" has not been studied.

Recommendation: Facilitate midwives' knowledge and capacity to access and appraise research findings to optimise care provision.

To assist with capacity building: (a) conduct an evaluation of midwives' current knowledge and understanding of BFHI and the underpinning evidence; (b) encourage, lobby, facilitate and support health researchers to analyse, review and publish current and future evidence with clear operational definitions and breastmilk/breastfeeding as the standard and (c) encourage publication of a document that provides an update of the evidence for the "Ten Steps to Successful Breastfeeding."

Capacity building will increase Australian midwives' breastfeeding knowledge, their awareness of the BFHI's principles and philosophy and potentially facilitate the next stage, acceptance.

5.2. Acceptance (of the evidence by the midwife and or health manager)

Within the healthcare system the impact of the degree of midwifery acceptance of the Initiative is demonstrated through practice. For any number of reasons, both personal and or organisational, midwives may choose to maintain familiar practices regardless of knowledge and experience with BFHI practice standards. In Australia there is a discrepancy between BFHI philosophy and practice. Australian midwives have identified using divergent practices despite working in a facility supporting the Initiative[41] or in an organisation committed to maintaining BFHI standards.[42]

The BFHI has prescriptive elements that require 'hard evidence' to demonstrate uptake, compliance and organisational change. The organisation may decide not to provide resources to audit practice and collect the evidence required. The individual midwife may perceive practice change as being irrevocably linked to procedure adoption rather than behavioural adaptation. Furthermore, without sustained attention and assistance via inspirational leadership, change may be difficult to achieve and maintain.

Recommendation: Support change management at a local level.

To facilitate effective change, appoint a dedicated BFHI coordinator or team to act as change agents. The identification, use of and organisational support of champions at all levels will facilitate acceptance and influence the perception of applicability across the health service in the Australian setting.

5.3. Applicable (to the maternity service and the midwife's practice)

Arguably, a variation exists in the interest and number of "steps" implemented in non-BFHI accredited facilities across the country. This suggests that multi-level barriers may exist. One barrier could be a perception that the resource allocation outweighs the benefit[17] although this has not been confirmed by any Australian cost analysis. If the healthcare facility does not identify any, or supports only limited applicability of the Initiative within their organisation and practice it may also be difficult for midwives to perceive value and act as champions to effect change. A key finding of an examination of maternity staff attitudes towards implementing the Initiative in Australia[3] found that 'BFHI is valued by those who use it and misunderstood by those who do not' (p. 606). Furthermore, similar to other studies on knowledge translation and health policy,[27] stakeholders may choose to ignore evidence they regard as unconvincing.

Recommendation: Identify the specifics of the investment required to create an enabling environment for breastfeeding and BFHI implementation.

To detail the investment: (a) conduct and publish a cost analysis of the package of interventions that supports breastfeeding in Australia and (b) encourage administrators to include and/or maintain BFHI implementation as part of their suite of maternity performance indicators and regularly report on them to provide comparability across states and territories.

Include the BFHI in the costing analysis and compare not only the financial outlay required by facilities to achieve and maintain accreditation but also the expected outcomes and health care savings that will demonstrate cost recovery. The recently released IBFAN World Breastfeeding Costing Initiative Report[43] includes a tool that may be helpful as it is designed to support project coordinators and personnel in preparation of project budgets and undertaking costing analyses. This costing will provide health service managers with accurate data to use to create an environment that supports women to breastfeed and midwives to provide optimal care. When cost is weighed against the potential healthcare savings resource allocation may be more achievable.

5.4. Ability (of resources and ability to carry out the intervention in the maternity services context)

Funding has not been attached to the national endorsement of BFHI implementation, nor to most states and territories. Australian managers have identified the lack of funding as a significant impediment.[3] An independent government inquiry into breastfeeding in Australia[44] recommended significant funding enhancement for the Initiative; this recommendation was noted but not actioned.[45]

At a clinical level Australian midwives may have concerns about their ability to provide effective breastfeeding support if they have received little formal or only incidental training. For many midwives most or part of their knowledge has been gained from personal experience or "on the job".[46] To carry out evidence-based interventions (such as the BFHI) knowledge and training is required, with supportive underpinning guidelines. Staff education is the central component of the BFHI programme and only with well-trained staff can necessary practice changes be made.[17] International studies have demonstrated that guidelines will not usually affect a change in practice unless they are supported by other strategies, such as interactive education programmes to increase confidence.[47]

Recommendation: Access economic resourcing to enhance practice and further build capacity.

To access economic resourcing: (a) complete a comprehensive analysis that clearly details one-time and recurring costs; (b) lobby policymakers and funding bodies to allocate and release the necessary funds and (c) identify the existence of current, relevant and freely available resources and programmes to offset the initial outlay.

At a local level it will be important to identify the barriers to organisational and attitudinal change prior to commencing any programme. This will increase the effectiveness of the education intervention and further facilitate change.[24] In this case the midwife will feel more confident to practice different behaviours.

5.5. Acted upon (by the health care system and the midwife)

Implementing BFHI strategies may be challenging, if an altered philosophy and changes in practice are required. Maintaining the

changes in practice may challenge the midwife's newly learnt skills and self-confidence might falter. The midwife's capacities to act upon the new skills acquired and provide accurate advice and support could then be compromised. The transformation of behaviour/change in practice is also influenced by the physiological way the brain accepts or resists change.[48] To put new behaviours into place, entrenched attitudes need to be reframed.[49] The acceptance of the importance of breastfeeding and breastfeeding support is an essential prerequisite for acting on the practice changes accompanying BFHI implementation at an individual and organisational level.

Finally, the midwife needs to be able to implement the practice. There are numerous pressures on the health care system and the prevailing organisational culture may not always be supportive. In international studies midwives have stated their ability to individualise care is hampered by a shortage of time resulting from lack of staff or a lack of skilled staff.[50,51] Australian studies[42] support these findings; the outcome being that BFHI practices are potentially only complied with if time and workload allow.

Recommendation: Refocus postnatal care provision to more effectively support women.

To refocus postnatal care provision: (a) implement a clinical redesign of the organisation of models of care to be woman-centred rather than structured around organisational requirements and (b) provide supportive and inspirational managerial practices to facilitate and model effective and sustained change management.

The organisation and structure of hospital-based postnatal services in Victoria has identified a number of barriers to postnatal care provision.[52] A supported clinical redesign may provide consistency, timeliness, accuracy and efficacy of advice and assistance. Women will ideally have a more 'authentic' breastfeeding experience.[53] Managerial plus peer support is required to encourage and assist individual midwives to model BFHI supportive practices that focus on the individual woman's needs.

The two further stages described in the pipeline model are attributes of the patients/clients/consumers of maternity service i.e. women and their families: a*greeing to* and *adhering to*. Glasziou and Haynes[4] assert that the consumer similarly moves through the above stages (from 'awareness' to 'acted upon') before agreeing to and adhering to a health professional's recommendation. It is beyond the scope of this paper to discuss these final two stages in detail. A woman's infant feeding decisions and practices are affected by the degree of accurate and timely information, support and assistance she receives.

6. Summary and conclusion

This paper has identified issues pertinent to the Australian health care system, maternity facilities and midwives that influence the protection, promotion and support of breastfeeding, which is embedded in the implementation and accreditation of the Baby Friendly Health Initiative. A lack of awareness and understanding of the Initiative has been demonstrated at an individual practice and organisational level. Acceptance of the underpinning evidence is influenced by policy makers, health service management, the midwife's personal belief system and desire for practice change. Applicability is also affected by the midwife's perception of how his/her practice will be affected. It is further dependent on managers' beliefs in the applicability of the Initiative to their organisation and stakeholders. Organisational and clinical leadership is required to implement change. To maintain a sustained change in professional practice behaviours, the midwife requires both ability and resources equal to the situation including clinical support and education.

The pipeline model has been demonstrated as useful in examining where and how barriers occur in the gap between evidence and practice in the uptake of the BFHI in Australia. It is a worthwhile model to use in identifying issues relevant to midwives' translation of knowledge into practice. The model is also beneficial in examining the relationship between knowledge translation and the progress of BFHI implementation and accreditation in Australia.

It is apparent there is an overlap of issues within the various stages and a common thread is the complexity of change management. One of the strengths of the model is that it highlights the different stages where impact could occur. The degree of uptake resulting in translation at each stage can be further investigated so that transfer can be examined, traced and optimised through the use of effective intervention strategies.

Unfortunately Glasziou and Haynes[4] did not shed any light on a way forward other than to state 'evidence-based practices should not just be concerned with clinical content but also with the processes of changing care and systems of care' (p. 38). Changing care and systems of care also needs to be concerned with the effective management of change, at an individual practice level and across organisations. BFHI is a multifaceted intervention. It operates within a framework where the attributes of society, culture and economy exert an influence on the midwife and woman's philosophies and practices.

Each stage in the pipeline warrants further individual study and testing of interventions. Suggestions for strategies to influence policy, organisational and attitudinal change have been included, with some overlap included to compensate for the potential of change in one component at one stage of the pipeline leading to a loss of uptake in another stage further down. In an economic climate where vying for decreasing amounts of health funding grows ever more competitive the evidence to influence the translation of knowledge into practice needs to be compelling and convincing to all stakeholders. For the Baby Friendly Health Initiative to have an assessable impact in the Australian health care setting it needs to be accepted, endorsed, implemented and sustained by a wide range of stakeholders at an individual, organisational and health system level.

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REVIEW PAPER

A methodological review of qualitative case study methodology in midwifery research

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Abstract

Aim. To explore the use and application of case study research in midwifery.

Background. Case study research provides rich data for the analysis of complex issues and interventions in the healthcare disciplines; however, a gap in the midwifery research literature was identified.

Design. A methodological review of midwifery case study research using recognized templates, frameworks and reporting guidelines facilitated comprehensive analysis.

Data Sources. An electronic database search using the date range January 2005–December 2014: Maternal and Infant Care, CINAHL Plus, Academic Search Complete, Web of Knowledge, SCOPUS, Medline, Health Collection (Informit), Cochrane Library Health Source: Nursing/Academic Edition, Wiley online and ProQuest Central.

Review Methods. Narrative evaluation was undertaken. Clearly worded questions reflected the problem and purpose. The application, strengths and limitations of case study methods were identified through a quality appraisal process.

Results. The review identified both case study research's applicability to midwifery and its low uptake, especially in clinical studies. Many papers included the necessary criteria to achieve rigour. The included measures of authenticity and methodology were varied. A high standard of authenticity was observed, suggesting authors considered these elements to be routine inclusions. Technical aspects were lacking in many papers, namely a lack of reflexivity and incomplete transparency of processes.

Conclusion. This review raises the profile of case study research in midwifery. Midwives will be encouraged to explore if case study research is suitable for their investigation. The raised profile will demonstrate further applicability; encourage support and wider adoption in the midwifery setting.

Keywords: case study research, maternity, methodological review, methodology, midwifery, midwives, qualitative research

Why is this research or review needed?

- A gap was identified in the uptake of case study research conducted by midwives.
- Methodologically strong case study reports provide guidance for other researchers seeking to use the same approach.
- This review mapped the uptake of midwifery case study research and critically analysed the application, strengths and limitations of case study methods.

What are the key findings?

- Although case study research has a low profile in midwifery contexts, the papers examined had investigated diverse situations using a broad array of research questions.
- A high standard of authenticity was observed, suggesting authors considered these elements to be routine inclusions.
- Technical aspects were lacking in many papers, namely a lack of reflexivity and incomplete transparency of processes.

How should the findings be used to influence policy/practice/research/education?

- Midwifery researchers will be provided with increased resources on how to design conduct and report a methodologically strong case study.
- Midwives will be encouraged to explore if case study research may be suitable for their investigation.
- The raised profile will further demonstrate applicability; encourage support and wider adoption in the midwifery setting.

Introduction

Midwifery research is a rapidly growing global field with a range of qualitative and quantitative studies. Epidemiological methods and randomized controlled trials (RCT) are used due to an interest in 'cause and effect' and implications for clinical practice. However, when the evidence-based intervention is applied the findings may not translate into practice in the real world (Glasziou & Haynes 2005, Woolf 2008). The well-regarded RCT is insufficient to answer all types of research questions (Mackenzie *et al.* 2010), particularly with complicated healthcare problems (Blackwood *et al.* 2010). The focus of qualitative research is on experience and the ways the everyday world is understood and interpreted (Jirojwong & Welch 2011). Qualitative research assists the evaluation of 'complex interventions' (Craig *et al.* 2008) by providing an in-depth understanding of human behaviour.

Case study research (CSR) enhances the understanding of complex contextual/cultural/behavioural factors (Stake 1995, Yin 2014) through its deep and multi-faceted examination of the issue of concern. CSR may influence the translation of knowledge into practice. CSR's potential does not appear to have been fully realized in midwifery research. A gap in the English-speaking literature was identified with apparently fewer studies using CSR in midwifery than in nursing. This paper presents a methodological review of midwifery context CSR.

The review process is informed by previous work in the CSR field in nursing (Anthony & Jack 2009), using a specific analysis framework (Whittemore & Knafl 2005). The framework's advantage is the inclusion of strategies to enhance rigour. The review seeks to explore the use and application of CSR in midwifery. The purpose of the review was to analyse the application, strengths and limitations of midwifery case study methods. The results will be useful to midwives contemplating the use of CSR by providing information on how to design, conduct and report methodologically strong studies.

Background

While CSR first appeared around 1900 in the discipline of anthropology (Yin 2014), its profile in textbooks did not become visible until after the 1980s (Merriam 2009). Different CSR approaches have been employed and its interpretation has caused confusion (Woodside 2010), which may have contributed to the low profile in midwifery. Table 1 briefly describes different 'types' of case study that have been proposed by authors in the CSR field, demonstrating its flexibility as a research approach.

The case study report is a detailed narrative. It is a story with a beginning, middle and end that is written to suit the intended audience. The report must detail the literature review and methodology; demonstrate the significance of the study and its findings while providing alternative perspectives that enable the reader to draw their own conclusions (Yin 2014). An integrative review by Anthony and Jack (2009) informed the use of CSR in nursing. A range of researchers used CSR to further develop nursing knowledge, with the authors identifying 42 published papers over a 30-month period (January 2005–June 2007). Categorical analysis of the literature revealed nine classifications including 'family/maternal child'. Two of the papers in this category were clearly midwifery context studies (Sittner *et al.* 2005, Hindin 2006). A gap in the literature

Table 1 Typology of 'types' of case studies described in the literature (Stake 1995, Bogdan & Biklen 2007, Merriam 2009, Yin 2014).

'Type' of case study	Explanation
Collective	Also known as cross-case, multi-case, multisite or comparative case studies, conducting a study using more than one case to investigate a population or general condition increases external validity and generalizability of findings
Descriptive	Description of the phenomenon in rich detail to provide a literal portrayal of the incident or entity
Explanatory	Explains aspects and causal arguments identified by the descriptive research
Exploratory	Debates the value of further research, suggesting various hypotheses
Evaluative	Description and explanation of the phenomenon clarifies meaning and communicates implied knowledge, weighing information to produce judgement
Historical	A phenomenon studied over a period of time, for example the development of an organization
Intrinsic	Where the researcher holds a special interest in the particular case
Instrumental	When the case is used to explain or provide insight into an issue or redraw a generalization – the case facilitates the understanding of something else
Observational	Focusing on a whole or particular part of an organization primarily using observation to deepen understanding

was apparent with far fewer studies using CSR in midwifery research than in nursing.

Some places view nursing and midwifery as the same profession. Major changes have occurred in both professions over the last 30 years and midwifery is now considered a discrete entity (Pairman & Donnellan-Fernandez 2015), with Australia recommending regulatory changes to its National Law (Snowball 2014). Either way applied health research aims to improve outcomes in midwifery and for women. Of course nursing and midwifery are complementary professions, sharing a health promotion philosophy, health skills and knowledge and a belief in consumer rights. Midwifery also uses a wellness paradigm and a woman-centred approach to care provision within a clearly defined scope of practice (Nursing and Midwifery Board of Australia 2010). The wide-ranging benefits of midwifery models of care have been demonstrated by a recent Cochrane review (Sandall *et al.* 2015). The fundamental differences in the practice areas means midwifery context research may be more useful to midwife researchers. Midwifery research is relatively 'young', rising from a challenge to improve maternity care (Farley 2005) and continues to create its own identity. Midwifery has steadily built up research capacity (Brodie & Barclay 2001, Nicholls & Webb 2006). The necessity of a research agenda was recognized (Kennedy *et al.* 2007) and priorities for midwives continue to be identified (Jordan *et al.* 2013), in part as 'the future of the midwifery profession is reliant on building research leaders' (Hauck *et al.* 2015, p. 263).

It is interesting therefore to examine CSR's profile in midwifery research. Research questions that ask 'how' and 'why' are well suited to CSR (Yin 2014) because they deal with the lived experience and provide breadth and depth, as opposed to frequencies or incidence. This methodological review sought to explore the extent of CSR in contemporary midwifery literature and examine its usefulness for further research. The next section details the methodological review and outlines the process used.

The review

Aim

The aim of this methodological review was to conduct an analysis of the contemporary literature on qualitative CSR in midwifery. Anthony and Jack's (2009) review offered a useful template. Clearly worded research questions are an important feature of methodological reviews, reflecting the problem and purpose (Whittemore & Knafl 2005). The research questions guiding this review are as follows:

- Where has CSR been used in midwifery research?
- Why has CSR been used in midwifery research?
- How has CSR been used in midwifery research?
- How has midwifery CSR been reported in the literature?

Design

The methodological review provides a narrative summary of the literature on a specific concept or content area. The review has the potential to comprehensively portray complex concepts, theories or healthcare problems, contribute to theory development as well as being applicable to practice and policy (Whittemore & Knafl 2005). A detailed approach to critically review and analyse the designs and methods of a series of studies is used (Whittemore 2005). The review process follows recognized steps: identifying and defining the problem, searching for literature, extracting the data, critically analysing the studies, discussing the

results and presenting the findings (de Souza *et al.* 2010). Published midwifery context methodological reviews include: complementary alternate medicines (Adams *et al.* 2011); choice around the place of childbirth (Hadjigeorgiou *et al.* 2012); professional issues (Nicholls & Webb 2006) and implementing the Baby-Friendly Initiative (Seminic *et al.* 2012). There is no single agreed framework, however, to assist with systematically reviewing the qualitative and quantitative evidence. One framework, the *quantitative case survey method* (Yin & Heald 1975, Mays *et al.* 2005) uses a set of structured questions to extract data from each paper. In this instance data include the nature of the case study, design, methods and findings. Qualitative data are converted into a numerical form to be quantified either in a frequency count or binary form and to aid systematic comparison. Papers in the review were then grouped according to assessment of overall methodological limitations present, namely low medium or high.

Search method

A thorough electronic search of databases where midwifery context literature is published was undertaken using a date range of January 2005–December 2014. The databases searched were: Maternal and Infant Care, CINAHL Plus, Academic Search Complete, Web of Knowledge, SCOPUS, Medline, Health Collection (Informit), Cochrane Library Health Source: Nursing/Academic Edition, Wiley online and ProQuest Central. Search terms included various combinations of the following keywords/subject terms: case stud*, midwi*, matern* care, maternity nurse, nurse-midwi*, method*, qualitative research, research. Reviewing the reference list of accessed papers (ancestry searching) was also attended, as was a review of the 'in press' section of a popular international midwifery journal (Midwifery http://www.journals.elsevier.com/midwifery/, 2015). Using more than one type of searching strategy reduces the potential for an incomplete or biased search and improves rigour (Whittemore & Knafl 2005).

Search outcome

The flow chart of the literature search process is outlined in Figure 1. Carefully considered inclusion/exclusion criteria to ensure the sample was specifically applicable to midwifery CSR (Table 2) were used to assess and review the data. Duplicate publications were identified and a total of 489 papers were excluded.

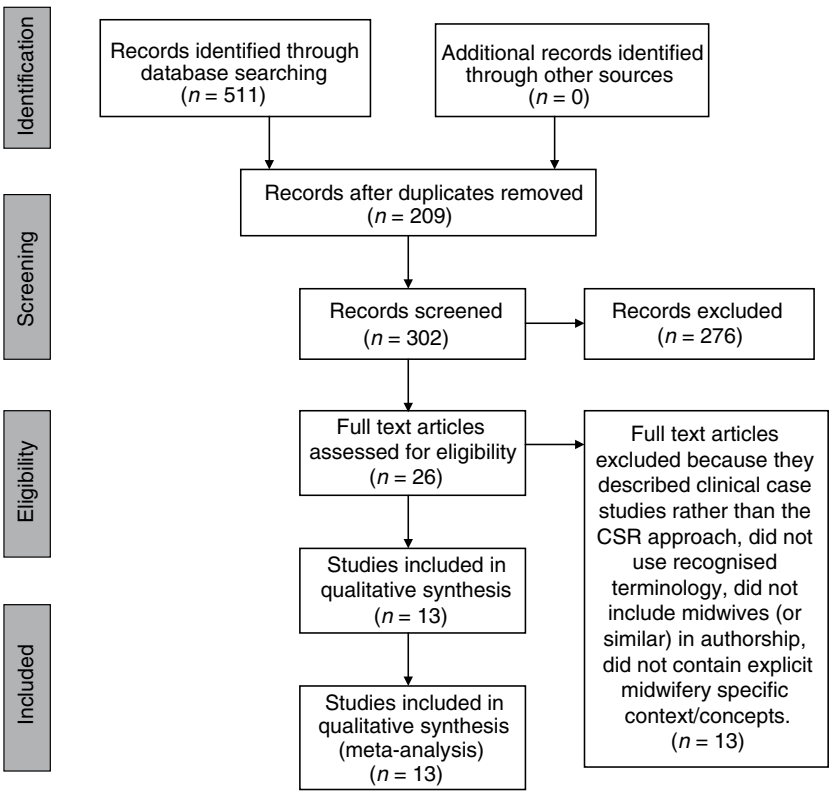

Figure 1 Data search using PRISMA flow diagram.

Table 2 Inclusion and exclusion criteria.

Inclusion criteria	Exclusion criteria
Publication between January 2005–December 2014	Publication not between January 2005–2014
Full text obtainable	Abstracts only available
Peer reviewed journals	Conference proceedings
	Chapters in research texts
English language	Non-English language publications
Midwife* as lead author	No midwife* designated within authorship list
Midwives* in list of authorship	
Original midwifery context research	Secondary source or meta-analysis
	Child and family health/ neonatal care contexts
Met operational definition of CSR†	Did not meet operational definition of CSR†
	Theoretical/methodological papers

*With recognition that in some countries Midwifery and Nursing are not seen as separate professions and a health professional practising or academic researching 'Midwifery' may be titled nurse, obstetric-nurse, maternity nurse, maternal and child nurse, nurse-midwife or similar and may be employed in an allied health university faculty.
†Use of CSR terminology and/or multiple sources of data collection and/or reference to seminal works in the CSR field.
CSR, case study research.

Because of the large number, excluded papers are not listed. Papers were excluded primarily because they described clinical case studies rather than the CSR approach or did not use recognized terminology. The variety of midwife 'titles' currently in use such as nurse-midwife, maternity nurse or maternal and child nurse were included. Papers that were not midwifery specific in terms of context or authorship were excluded. Where the abstract was unclear, the full paper was retrieved and examined to decide on exclusion or inclusion. Thirteen papers remained in the final sample to inform the review. The papers were summarized and reviewed for descriptive details about the included CSR methodology recommended by Yin (2014) (Table 3).

Quality appraisal

An assessment was undertaken to determine if the studies included in the review addressed the recommended criteria for the reporting of qualitative studies. Our assessment was based on the Recommended Standards for Reporting Qualitative Research (SRQR) (O'Brien *et al.* 2014) (Table S1). The majority of papers (10/13, 76·9%) rated highly in mentioning or discussing in detail 16 or more of the 21 recommended items. One paper included 19 items (Wilson 2012). The standards least included were researcher characteristics and reflexivity, conflicts of interest and funding. Ten papers (76·9%) mentioned or discussed in detail nine or more of the 12 items recommended for inclusion in the methods section, with three papers including 11 items (Lagendyk & Thurston 2005, Allen *et al.* 2010, Wilson 2012). Overall, these three papers demonstrated the highest reporting standards.

Data abstraction

The 13 papers were summarized and tables created to compare primary data (Whittemore & Knafl 2005) (Table 3). A table is a good starting point for interpretation of data as any patterns and relationships that may exist are easily visualized.

Most papers classified the type of case study. Only one paper, the second of a three part series, excluded a literature review. The sampling method was clearly identified. The majority of studies used two or more data collection techniques, with interviews and or focus groups a common feature. Most papers identified methods to ensure rigour. Analysis of qualitative data was usually 'thematic'. All papers identified issues of significance about the study and implications for midwifery practice. Half the papers provided a gap analysis or discussed alternative perspectives, namely what the data were not saying and where further analysis or research is required.

Synthesis

In the first phase of data reduction, primary sources were logically divided into subgroups to facilitate analysis (Whittemore & Knafl 2005). The second phase involved extracting and coding data from the primary sources into a manageable framework (Yin & Heald 1975). Concise organization of the literature aids the comparability of primary sources (Whittemore & Knafl 2005). Data were regrouped and numerical values assigned to assist with comparability and answer the research questions. The appraisal system enhanced critical analysis of the methodological processes. The papers were also grouped into one of three broad themes: Clinical, Health Service Design and Education/ Research.

A study's overall generalizability is affected by the methodological criteria and standards that are attained (Daly *et al.* 2007). The validity of qualitative research is stronger if the collection, interpretation and assessment of

Table 3 Summary of papers included in the review.

		Case			Methodology			Findings		
Citation and Country	Study purpose/ aim/objective	Description	Theorist	Literature Review	Sample	Data collection	Rigour	Analysis	Significance/ practice Implications	Alternative perspectives
Gray *et al.* (2014) Australia	Investigation of midwives' responses to changed re-registration requirements and exploration of decision-making and reflections about registration	Not specified	Yin 2009; Stake 2005; 2008	✓	Purposive sampling 20 participants	In-depth interviews	i. Participant checking of transcript ii. Member consultation	NVivo	✓	✓
Luyben *et al.* (2013) Europe	Exploration of factors influencing the course of establishing research as a professional activity in non-English-speaking countries	Qualitative, collective	Stake 1995; Merriam 1998	✓	Not specified 4 participants	Interviews to elicit narrative descriptions of experiential knowledge	Not specified	Pattern matching of narrative descriptions.	✓	✓
Wilson (2012) UK	Design and evaluation of the effectiveness of a clinical midwifery educational programme	Quasi-experimental pre-intervention-postintervention	Nil	✓	Representative, purposive convenience sampling 800 participants	i. Pre and post semi-structured questionnaires ii. Focus group interviews iii. Participant observation	Not specified	i. Quantitative data: SPPS version 12 ii. Qualitative: framework (thematic) analysis	✓	✓
Marshall (2012) UK	Exploration of the effect of the introduction of a work-based learning module	Not specified	Thomas 2011	✓	Purposive sampling 64 participants	i. Questionnaires ii. Focus groups	i. Pilot questionnaire ii. Colleague consultation	i. Quantitative: descriptive statistics ii. Qualitative: thematic content analysis	✓	✗
Dow (2012) UK	Exploration of the application of clinical simulation in the maternity setting	Qualitative instrumental	Stake 1995	✓	Not specified 15 participants	i. Individual interviews ii. Focus groups	i. Inter-observer reliability ii. Member checking	Thematic analysis	✓	✓
Richards (2011) UK	Exploration of the role of supervisors of midwives (SoM) in the notification of critical incidents	Not specified	Yin 2009	Not included Part 2 of 2	Not specified 8 participants	i. Semi-structured interviews ii. Documentary analysis	Not specified	Comparative content analysis	✓	✗
Allen *et al.* (2010) Australia	Examination of safety culture in a maternity service	Descriptive	Nil	✓	Not specified 74 participants	i. Questionnaire ii. Semi-structured interviews iii. Policy audit and policy mapping	i. Manual coding ii. Member checking	Template analysis	✓	✓

Table 3 (*Continued*).

		Case			Methodology			Findings		
Citation and Country	Study purpose/ aim/objective	Description	Theorist	Literature Review	Sample	Data collection	Rigour	Analysis	Significance/ practice Implications	Alternative perspectives
Kreiner (2009) Canada	Examination of strategies employed to improve maternity care for Aboriginal, rural and socially disadvantaged women	Qualitative embedded	Yin 2002	✓	Stratified purposeful sampling 26 participants	i. In-depth interviews ii. Primary document analysis	Participant checking of transcript	Content analysis	✓	✗
Goodman (2007) USA	Investigation of the marginalization of certified nurse-midwives	Qualitative	Nil	✓	Critical case sampling 52 participants	i. In-depth interviews ii. Media, email correspondence demographic and archive data review	Not specified	With-in case and cross-case analysis	✓	✗
Hindin (2006) USA	Exploration of intimate partner violence-screening practices of certified nurse-midwives	Not specified	Lincoln & Guba 1985	✓	Purposeful – self-selecting sampling 8 participants	i. Interviews ii. Demographic survey	Thematic	Thematic analysis	✓	✓
Sittner *et al.* (2005) USA	Examination of psycho-social impact of high-risk pregnancy	Descriptive	Yin 1989	✓	Purposeful 8 participants	Face to face interviews	i. Audit trail ii. Member checking	Thematic analysis	✓	✗
Sinclair *et al.* (2005) Northern Ireland	Exploration of an innovative midwifery role	Single	Yin 2003	✓	Purposeful sampling 3 participants	i. Face to face interviews ii. Observation iii. Documentary analysis	i. Member checking ii. External review of analysis themes	Content analysis	✓	✗
Lagendyk & Thurston (2005) Canada	Documentation of the process and outcome of institutionalization of two health programmes	Qualitative, descriptive, comparative	Nil	✓	Stratified purposeful sampling 16 participants	i. Face to face interviews ii. Document review	Member checking	Template and codebook analysis	✓	✓

data demonstrate authenticity as a primary criteria (Whittemore *et al.* 2001), remains true to the phenomenon under study and accounts for the investigator's perspective. For research to be of benefit to the wider society, authenticity and trustworthiness in the methods of data collection and analysis are essential.

An initial appraisal system was developed to assess the papers' methodological limitations, which would impact the interpretation of evidence and development of findings (Table S2).

Popay (2008, cited in Garside 2014) recommended quality (epistemological and theoretical) aspects be considered separately to reporting (technical) guidelines.

A published template (Anthony & Jack 2009) and recommendations for inclusions in a CSR report (Yin 2014) were amalgamated to inform the assessment of authenticity. Authenticity of the account of the phenomenon being investigated was assessed by the inclusion and description of the process of CSR that occurred: (a) the identification of a specific theoretical support to shape the design of the study and enhance generalizability, (b) the use of multiple data sources to ensure all perspectives were examined and (c) if the consideration of rigour was clearly discussed considered or mentioned. Four criteria of rigour or trustworthiness were used: credibility; dependability; confirmability; and the transferability of findings. To aid systematic comparison, a numerical value of 3 could be assigned for authenticity if all issues (theoretical support, multiple data sources and rigour) were addressed.

Methodological completeness was assessed separately. Interviews and/or focus groups were common to all papers included in the review. The Consolidated Criteria for Reporting Qualitative Research (COREQ) tool for interviews and focus groups (Tong *et al.* 2007) was used. To aid systematic comparison, the three domains of the tool were each assigned a numerical value of 1 if the majority of the items were at least minimally discussed, resulting in a maximum assignment of 3. There is a slight overlap of criteria with both the theorist and rigour appearing in each tool; however, it was considered to be an essential aspect to retain. The papers were then grouped according to their demonstration of low medium or high methodological limitations (Table 4).

Results

The purpose of this review was to analyse the application, strengths and limitations of case study methods found in published midwifery literature. The results answer the four research questions.

Table 4 Papers in the review grouped according to theme and assessment of overall methodological limitations.

	Degree of methodological limitations present		
Citation and theme*	Low	Medium	High
Allen *et al.* (2010)[1]	✓		
Dow (2012)[2]		✓	
Gray *et al.* (2014)[2]		✓	
Hindin (2006)[3]		✓	
Lagendyk & Thurston (2005)[1]		✓	
Kreiner (2009)[1]		✓	
Marshall (2012)[2]		✓	
Richards (2011)[1]		✓	
Sinclair *et al.* (2005)[1]		✓	
Sittner *et al.* (2005)[3]		✓	
Wilson (2012)[2]		✓	
Goodman (2007)[1]			✓
Luyben *et al.* (2013)[2]			✓

*Papers grouped under the following broad themes: [1]Health Service and Design (6/13). [2]Research and Education (5/13). [3]Clinical (2/13).

Where has CSR been used in midwifery research?

Case study research has had a low uptake in English language midwifery research, with 13 papers identified from January 2005–December 2014 (Table 3). The literature originated primarily from the UK (5/13), followed by the USA (3/13), Canada (2/13), Australia (1/13) and Europe (1/13). In this sample, CSR was found primarily in health service design (6/13), followed by education and research (5/13) and least in the clinical setting (2/13) (Table 4). Improvements in health services occurring in response to local need were evaluated (Kreiner 2009). The influence of contextual factors on midwives and the implementation of health programmes were discussed (Lagendyk & Thurston 2005, Goodman 2007). Specific midwifery roles (Sinclair *et al.* 2005, Richards 2011), professional registration issues (Gray *et al.* 2014) and safety culture (Allen *et al.* 2010) were explored in depth. Midwifery practice development evaluations occurred in the tertiary setting (Dow 2012) and the workplace (Marshall 2012, Wilson 2012). The development of midwifery research in four country settings was described (Luyben *et al.* 2013). Clinically, the impact of high-risk pregnancies on families was examined (Sittner *et al.* 2005) and the antenatal screening practices in relation to intimate partner violence (Hindin 2006). To date, health service design with its distinct boundaries and clear need for evaluation seems to have found the greatest application with midwife researchers using the CSR approach.

Why has CSR been used in midwifery research?

Case study research is suited to describing, exploring or explaining a phenomenon in its real-life context (Yin 2014). All studies provided a purpose/aim/objective. CSR was primarily used to 'explore' (6/13), 'examine' (3/13), or 'investigate' (2/13), it was also used to 'evaluate' and 'document' (2/13) a diverse range of phenomena (Table 3). In all studies, gathering and describing the experience, perception and opinion of stakeholders or participants was an essential feature. The phenomena of interest included issues broadly grouped under the themes of: professional practice (Sinclair *et al.* 2005, Sittner *et al.* 2005, Hindin 2006, Goodman 2007, Allen *et al.* 2010), professional development (Richards 2011, Dow 2012, Marshall 2012, Wilson 2012, Luyben *et al.* 2013, Gray *et al.* 2014) and health service delivery (Lagendyk & Thurston 2005, Kreiner 2009) (Table 4). Published CSR reports described and discussed issues of interest to a broad range of midwives.

How has CSR been used in midwifery research?

The methodological processes included in the published reports were appraised to identify any limitations present that would impact on the interpretation of evidence and development of findings (Table 4). One paper (7·8%) (Allen *et al.* 2010) demonstrated a low degree of methodological limitations, suggesting significant confidence could be placed in the interpretation of evidence and discussion of findings. Two papers (15·3%) (Goodman 2007, Luyben *et al.* 2013) demonstrated a high degree of methodological limitations, suggesting the lowest level of confidence. The remaining 10 papers (76·9%) demonstrated a medium degree of limitations were present with moderate confidence applicable.

Authenticity was assessed through the inclusion of a theoretical support, multiple data sources and rigour. Nine papers (69·2%) identified or discussed the 'type' of case study employed; five papers also included a supporting theoretical framework (Sinclair *et al.* 2005, Sittner *et al.* 2005, Kreiner 2009, Dow 2012, Luyben *et al.* 2013). Eight papers (61·5%) described and discussed their use of appropriate strategies to improve rigour, in particular credibility, dependability and confirmability. For example: the use of external peer review of analysis (Sinclair *et al.* 2005); triangulation (Kreiner 2009, Dow 2012); participant confirmation/feedback (Gray *et al.* 2014); the use of an audit trail (Sittner *et al.* 2005) and pilot testing the data collection tool (Marshall 2012). Only one paper (Allen *et al.* 2010) also included evidence of reflexivity as a specific strategy to ensure rigour. Ten studies used multiple sources of data collection, which is a recognized measure of validity (Yin 2014). Ten papers (76·9%) demonstrated low or medium methodological limitations when considering authenticity, suggesting the authors considered these elements routine inclusions.

As all studies included interviews and or focus groups in their data collection, the COREQ checklist for reporting qualitative studies (Tong *et al.* 2007) was used as a further appraisal tool for elements to be expected in a CSR report (Table S2). The critical appraisal tool consists of three domains. Domain 1 considers the research team and reflexivity. Of the eight recommendations, 15·3% of papers included one or two and 84·5% included up to four items in their report, indicating this section achieved low to moderate attention. Personal bias was addressed by indicating gender (13/13), credentials (8/13) and occupation (9/13); however, there was no indication of experience or training included that would reflect on the credibility of findings. Only one paper included a discussion on reflexivity (Allen *et al.* 2010).

Domain 2 examines study design. Of the 15 recommendations, 46·1% of papers included up to 5, 46·1% included up to 10 and 7·8% included 12 items in their report, indicating this section achieved low to moderate attention. Although equal numbers of papers classified the type of CSR case and provided a guiding theorist (9/13), both elements were not necessarily included in the one report (5/13). Detailing recruitment indicated the importance researchers placed on sampling. Inclusion of the type of sampling employed (11/13), sample size (13/13) participant characteristics (9/13) plus a discussion on any refusals to participate (4/13) affected the conclusions able to be drawn from the paper's findings. Only three papers included all four elements (Lagendyk & Thurston 2005, Sittner *et al.* 2005, Allen *et al.* 2010). Minimal discussion occurred of other issues that could act as an enabler or barrier to the amount of data achieved, such as setting of the interview (3/13) and the presence of non-participants (0/13). Additional information to enable the reader to determine transferability of findings to their own context included: the use of question guides (10/13), recording methods (10/13), the length of the interview (4/13) and data saturation (1/13). One paper included all four elements (Luyben *et al.* 2013). Participant checking (3/13) and the use of field notes (1/13) as a further means to ensure validity did not feature significantly.

Domain 3 addresses the analysis and findings. Of the nine recommendations, 7·8% papers included up to three,

53·8% included up to six and 38·4% included the maximum of nine items in their report, indicating this section had received moderate to high attention. The description of the analysis and findings influences a paper's credibility. Themes were invariably derived from the data (12/13) and using a manual process (12/13) rather than a software package (1/13) (Gray *et al.* 2014). Three papers (Sittner *et al.* 2005, Kreiner 2009, Allen *et al.* 2010) created a clear audit trail although several papers included elements such as a coding tree (5/13) and member checking (5/13). Trustworthiness was supported through the wide use of participants' voices (11/13) that were interspersed through the findings. All papers presented major themes and the majority (11/13) also included minor themes.

Only one paper demonstrated low methodological limitations when considering methodology (Allen *et al.* 2010). Five papers (38·4%) demonstrated moderate limitations and seven papers (53·8%) demonstrated high limitations. The high percentage of recommendations that were absent suggests the authors did not consider these elements routine inclusions.

Yin's (2014) recommendation to incorporate a discussion of significance, implications for practice and alternate perspectives into CSR reports were also reviewed (Table 3). All papers clearly identified the significance of the findings of their study and the implications for midwifery practice. However, alternative perspectives, a strategy to clearly demonstrate the researcher has reduced bias, were less frequently present (53·8%). Despite the low number of papers available for review, the results are similar to Anthony and Jack's (2009) review of nursing CSR, suggesting that CSR in midwifery has a comparable authenticity and methodological standard.

How has midwifery CSR use been reported in the literature?

The limited publication of CSR in midwifery literature influences this question. Midwifery context CSR is published in peer reviewed journals making it visible and accessible to midwife researchers. Ten papers (76·9%) were published in a variety of midwifery/maternity care journals: *Midwifery* (4/13), the *British Journal of Midwifery* (2/13), the *Journal of Midwifery & Women's Health* (2/13), *Evidence-Based Midwifery* (1/13) and *Maternal Child Nursing* (1/13). The remaining three papers were published in education journals such as *Nurse Education Today* and *Nurse Education in Practice* and a sociology journal *Social Science & Medicine*.

The papers' titles and keywords did not necessarily match, demonstrating the need for midwife researchers to use broad terms both as keywords and when searching. The title of four papers self-identified as a case study (Lagendyk & Thurston 2005, Sinclair *et al.* 2005, Allen *et al.* 2010, Marshall 2012) and two papers included case study in the list of keywords (Sinclair *et al.* 2005, Gray *et al.* 2014). Keywords were completely absent in three papers (Sittner *et al.* 2005, Richards 2011, Dow 2012). Where included the most commonly used keywords were midwifery/midwives/certified nurse-midwives (5/13) (Sinclair *et al.* 2005, Goodman 2007, Kreiner 2009, Marshall 2012, Luyben *et al.* 2013).

Discussion

This paper reviewed 13 papers that used CSR in a midwifery context. CSR has been established as an approach to deeply explore and evaluate phenomena of professional interest, making a significant contribution to the current body of knowledge and informing practice. CSR publications have been mapped, confirming that this approach is used to a lesser extent in midwifery than in nursing contexts. There is also a lack of literature that suggests how CSR can be implemented in midwifery research. This review has demonstrated CSR's applicability to midwifery, with the design used in a diversity of situations to answer a broad array of research questions. Finally this review has highlighted areas where CSR reports provide clear guidance and where further detail or greater consistency in methodological approach is required.

The answers to the research questions describe what is currently known about midwifery context CSR, namely where, why and how it is being used. There was a broad array of issues investigated and research questions posed demonstrating the overall versatility of midwifery CSR. CSR is a useful choice when researchers are interested in insight, discovery and interpretation rather than hypothesis testing (Merriam 2009). The reviewed papers captured and retained the 'noise' of midwives' professional lives and revealed the highly complex contexts and conditions where they worked. The chronicling of participants' lived and perceived experiences assisted with understanding complex inter-relationships. The findings support the claim that CSR is useful for studying educational innovations, evaluating programmes and informing policy (Merriam 2009). Additions to the body of midwifery knowledge was demonstrated through the examination of professional practice, professional development and health service delivery in relation to maternity health service design, midwifery

education and midwifery research. Clinical issues appeared minimally, even though practice issues such as antenatal and intrapartum care contain a degree of complexity that CSR is well suited to investigate. Midwifery researchers appear unaware of this potential.

The findings of this review indicate that many studies included the necessary criteria to achieve methodological rigour: identification of purpose, case type, theoretical support, literature review, sampling procedure, data collection methods, analysis method and rigour. Critical analysis revealed however that several areas received less attention than is recommended (Tong *et al.* 2007). Reflexivity was lacking yet self-awareness of the researcher is a significant part of the research process (Houghton *et al.* 2013). Reflexivity is strongly recommended by CSR authors (Flyvberg 2011) and midwife academics (Burns *et al.* 2012). Decreased bias and increased credibility of the study's findings will result when researchers 'situate' themselves and their participants clearly in the report (Stake 1995). Furthermore, a demonstrable 'chain of evidence' increases reliability (Yin 2014). There was a lack of detail around the interview process and analysis audit trail to demonstrate how researchers have appraised and developed an understanding of the data.

Papers lacking methodological robustness may decrease CSR's desirability as a research approach in midwifery and lessen its impact. Papers that do not address all the essential components of a CSR report are at risk of presenting a less than optimal product. The lack of methodological substance decreases the finding's value to the wider community, which in turn affects the translation of knowledge into midwifery practice. A criticism of CSR is that there is 'too much data for easy analysis' and the complexity examined is 'difficult to represent simply' (Hodkinson & Hodkinson 2001). Consequently, aspects of the final narrative are omitted. The findings of this review would seem to lend some support to this claim. The methodological completeness of the papers was variable; however, Crowe and Sheppard (2011) suggest it is the author's responsibility to ensure important information is not missing from an article before it is published.

The findings of this review add to the general body of midwifery knowledge, increase the profile of CSR and offer midwife researchers several resources. Access is gained to a list of recent papers to peruse to get a 'feel' for this approach. Clear guidance on the optimal inclusions for qualitative research is obtained. Attaining and maintaining transparency at all stages of the research process should improve quality by surfacing the strengths and weaknesses. An acknowledged limitation of this review is that only English language publications were accessed. Although every effort was made to reduce bias through the data search method (Whittemore & Knafl 2005), there is still potential for incomplete findings. In general, however, most midwifery studies are published in English-speaking journals (Luyben *et al.* 2013) which support the strength of the evidence found here.

Conclusion

This paper presents a methodological review of midwifery CSR using templates (Anthony & Jack 2009, Yin 2014) and a well-established analysis framework (Whittemore & Knafl 2005) to enable a comprehensive analysis (Yin & Heald 1975). The review demonstrated that while the published literature is scarce the findings are similar to Anthony and Jack's (2009) review of nursing CSR, suggesting that CSR in midwifery has a comparable authenticity and methodological standard.

Case study research needs to be seen as an approach rather than as a single methodology. When conceptualized as such, CSR is able to meaningfully privilege participants' 'voices' through its use of a wide range of complementary data collection methods. The understanding of the complex contextual/cultural/behavioural factors that influence the translation of knowledge into midwifery practice is significantly enhanced. This review provides multi-level guidance for the midwife-researcher seeking to undertake CSR. Midwives are encouraged to explore if CSR may be applicable to their investigation. As more studies using this approach are undertaken and methodologically complete reports published, the raised profile will further demonstrate applicability; encourage support and wider adoption in the midwifery setting.

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- substantial contributions to conception and design, acquisition of data, or analysis and interpretation of data;
- drafting the article or revising it critically for important intellectual content.

Supporting Information

Additional Supporting Information may be found in the online version of this article at the publisher's web-site.

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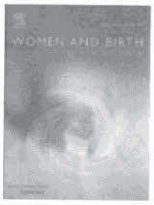

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ORIGINAL RESEARCH – QUALITATIVE

An historical document analysis of the introduction of the Baby Friendly Hospital Initiative into the Australian setting

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ABSTRACT

Background: Breastfeeding has many known benefits yet its support across Australian health systems was suboptimal throughout the 20th Century. The World Health Organization launched a global health promotion strategy to help create a 'breastfeeding culture'. Research on the programme has revealed multiple barriers since implementation.
Aim: To analyse the sociopolitical challenges associated with implementing a global programme into a national setting via an examination of the influences on the early period of implementation of the Baby Friendly Hospital Initiative in Australia.
Methods: A focused historical document analysis was attended as part of an instrumental case study. A purposeful sampling strategy obtained a comprehensive sample of public and private documents related to the introduction of the BFHI in Australia. Analysis was informed by a 'documents as commentary' approach to gain insight into individual and collective social practices not otherwise observable.
Findings: Four major themes were identified: "a breastfeeding culture"; "resource implications"; "ambivalent support for breastfeeding and the BFHI" and "business versus advocacy". "A breastfeeding culture" included several subthemes. No tangible support for breastfeeding generally, or the Baby Friendly Hospital Initiative specifically, was identified. Australian policy did not follow international recommendations. There were no financial or policy incentives for BFHI implementation.
Conclusions: Key stakeholders' decisions negatively impacted on the Baby Friendly Hospital Initiative at a crucial time in its implementation in Australia. The potential impact of the programme was not realised, representing a missed opportunity to establish and provide sustainable standardised breastfeeding support to Australian women and their families.

Summary of Relevance:

Issue

Sociopolitical challenges exist with regards implementing a global programme in a national setting to support breastfeeding.

What is already known

Systems-level and attitudinal barriers have been identified affecting the uptake and development of the Baby Friendly Health Initiative in Australia. Research is lacking to shed light on observable challenges to implementation.

What this paper adds

A clear mapping of the early implementation period and influencing factors. The Commonwealth government's decision not to enact international Declarations despite being a signatory had a negative effect on breastfeeding support. Local advocacy efforts were hampered by availability of resources and governance issues at national and international levels.

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1. Introduction

The events leading to the development and release in 1991 and official launch and implementation in 1992, of the Baby Friendly Hospital Initiative (BFHI) by the World Health Organization (WHO) and the United Nations Emergency Children's Fund (UNICEF) represented landmark policy decisions by international agencies in advocating for women's and children's rights. The BFHI is a global, evidence-based, public health initiative and advocacy activity that supports practices promoting the initiation and maintenance of breastfeeding and encourages women's informed infant feeding decisions.[1]

A positive association between the BFHI and breastfeeding prevalence has been demonstrated.[2] Nevertheless, the variance of 'baby friendly' accredited hospitals across Australian States and Territories reveals only nominal uptake of BFHI accreditation nationally.[3] Research is lacking on the early BFHI implementation period in Australia. The aim of this paper is to examine the introduction of the BFHI into the Australian setting through a focused historical document analysis of the factors that influenced the BFHI's early implementation period in Australia, from 1992 to 1995. An understanding of the contextual factors surrounding this period will increase stakeholders', researchers', midwives' and policy makers' appreciation of issues identified in recent literature such as the significant variation in women's experience of breastfeeding support from health professionals, including midwives.[4]

This paper may also be relevant to researchers in other national settings who are examining the history of the BFHI in their own country. Comprehension of how global initiatives translate into a national setting and are impacted by local context will be enhanced. Understanding the application of knowledge translation from evidence to practice has relevance beyond breastfeeding and the BFHI. Challenges with translating evidence into national policy and maximising funding opportunities have also been observed in the prevention of non-communicable chronic health conditions such as diabetes[5] and obesity.[6]

Implementation of the BFHI globally and in Australia was complex. Reviewing relevant international and national events will contextualise and increase the understanding of subsequent influences on the uptake and development of the BFHI in Australia.

2. Contextualising the BFHI in Australia

Throughout most of the twentieth century support for breastfeeding was eroded at all levels of the health care system and women did not receive consistent, timely or accurate advice and assistance.[7] Mothers and babies were routinely separated; babies were fed according to a predetermined schedule with liberal artificial supplementation. The presence of free and/or highly subsidised formula milks in the hospital environment was seen as a major barrier to exclusive breastfeeding[8] and the situation required high level action.

Table 1 maps the Declarations and actions that informed and represented international aid agencies' pro-breastfeeding policy statements from 1981 to 1992. The policy statements acknowledged breastfeeding as the most appropriate nutrition for babies and introduced the health promotion concept of breastfeeding as a human right. The creation of a global breastfeeding culture was a clearly desired outcome. International Declarations clarified the key concepts, actions and resources required to reorient health care delivery into a social model of health framework to support culture change.

The *Innocenti Declaration on the protection promotion and support of breastfeeding* (the *Innocenti Declaration*) set the goal of increased support for breastfeeding. The culmination of many years planning the *Innocenti Declaration* described four operational targets to achieve its goal. World Health Assembly (WHA) member states, including Australia, were expected to implement any international conventions they ratified by strengthening local standards through the development of national policy.[9] The BFHI was the *Innocenti Declaration's* second target.

The BFHI accreditation programme was conceptualised as a global recognition of excellence and designed to act as an incentive for maternity facilities that implemented and practised all of the *Ten Steps to Successful Breastfeeding*. Between June 1991 and March 1992 the BFHI was announced, developed, field tested and launched.[10] Phase 1 field-testing (June 1991 to February 1992) focused on creating capability in twelve specifically chosen 'early starter' low-income nations, with a significant number of pilot hospitals designated as 'baby friendly.' Whilst field testing was underway, all UNICEF offices were contacted via an Executive Directive that outlined the Initiative and presented a 'suggested' implementation schedule.[8]

Table 2 reveals the actions recommended to occur in 1992.[8] The anticipated result was a rapid embedding of the BFHI programme. Table 2 also presents a timeline of the significant events that occurred in Australia in comparison with the UNICEF targets. Over a three-year period, a number, but not all of the recommended actions were implemented. A national authority (National Steering Group [NSG])[11] assumed responsibility for a number of achievements as described in Table 2. Targets identified in the projected timeline[8] that were not realised during the initial implementation period included a national survey of maternity facilities to inform a baseline assessment of the country's situation and the establishment of a 'lead training facility' to act as a 'train the trainer' for breastfeeding.

UNICEF Australia Executive made internal decisions about its relationship with the BFHI, commissioning an options paper and making the ultimate decision to cease governance. UNICEF Australia received expressions of interest from a consortium of breastfeeding advocacy groups: the Nursing Mother's Association of Australia, Australian Lactation Consultants Association, Lactation and Infant Feeding Association, Aboriginal Birth and Breastfeeding Association plus a separate bid by the Australian College of Midwives (ACM).[12] The ACM bid was submitted without the knowledge of the other NSG members[13] who had assumed that the ACM was part of the consortium. The ACM was announced as the successor body of BFHI in Australia[14] with the transfer of responsibility occurring in November 1995. A critical component of the BFHI's transfer to a new successor body was a financial agreement that was part of the tender process.[14] UNICEF's provision of $25,000 in total over two years to support the ACM take over did not eventuate,[15] leaving the College in an unforeseen financial deficit situation.

How international and national events ultimately impacted on the implementation and uptake of BFHI across Australia is arguably a crucial element of what has emerged as the breastfeeding culture in Australia. Better understanding of the influences on the current translation of evidence-based breastfeeding knowledge into practice in Australia is required. An exploration of factors that influenced the BFHI during its early implementation phase and later development and uptake appears justified. An instrumental case study[16] was undertaken, which was informed by a Knowledge Translation theoretical framework.[2]

3. Methods and analysis

'The case' in this study is the quality assurance programme known as *BFHI Australia*. The case explores the introduction and implementation of this global programme into the Australian setting. In instrumental case study research investigating 'the case'

Table 1
Timeline of the international Declarations, decisions and actions preceding (and including) the global launch of the Baby Friendly Hospital Initiative.

1981	1989	1990	1991	1992
21 May: Resolution by World Health Assembly WHA 33.32: The International Code of Marketing of Breast-milk Substitutes passes by 118 votes to 1 and is ratified by Member States of the World Health Organisation (WHO) including Australia	Publication of "Protecting, promoting and supporting breastfeeding: the special role of maternity services. A joint WHO/UNICEF statement". The "Ten Steps to Successful Breastfeeding" makes its print debut	30 July–01 August: Breastfeeding into the 1990s: A Global Initiative, Florence, Italy. Adoption of the Innocenti Declaration on the protection promotion and support of breastfeeding. Endorsed by the World Health Assembly (which includes Australia) and Executive Board of UNICEF providing increased status. The "Ten Steps to Successful Breastfeeding" are embedded in policy	14 February: World Alliance of Breastfeeding Action (WABA) formed with the purpose of achieving the Innocenti Declaration's operational targets	February: Field-testing completed. 52 hospitals in twelve low-income nations designated as 'baby friendly' and 15 received a "Certificate of Commitment".
				Wellstart International hold UNICEF sponsored "Master Trainer/Assessor" workshop in San Diego with representatives from 24 countries, including Australia
	20 November: At the General meeting of the United Nations the Member States adopted by acclamation i.e. without a vote and ratified the Convention on the Rights of the Child (UN Resolution 44/25). Article 24 reveals agreement by Member States, including Australia, to provide information and support for breastfeeding	30 September: World Summit for Children held at the United Nations. Adoption of the World Declaration on the Survival, Protection and Development of Children and a related Plan of Action. Point 3 of 'The Commitment' clearly states breastfeeding will be promoted	15 May: WHA 44.33 request to UNICEF's Director General to accelerate planned implementation actions following on from the World Summit for Children	March: Official global launch of the WHO/ UNICEF Baby-Friendly Hospital Initiative
			June: Operational launch of the WHO/ UNICEF Baby-Friendly Hospital Initiative and field testing begins	
			30 August: Joint WHO-UNICEF letter to all Heads of state/Government, on the Baby Friendly Hospital Initiative (BFHI)	1–7 August: WABA "World Breastfeeding Week" observed for the first time, celebrating the anniversary of the Innocenti Declaration
			26 September: Official letter to all UNICEF offices informing and advising of BFHI implementation 30 December: Executive Directive to all offices providing further information, goals, objectives and guidelines for country-level actions	

Table 2
UNICEF International recommended and Australian actual implementation timeline.

1992	1993	1994	1995
• **UNICEF: (By December)** • Perform baseline survey to identify country-level goals. • Identify a national BFHI body. Distribute hospital self-appraisal. • Assess hospital conformity with assessment criteria. Identify first and second tier hospitals, a lead BFHI training facility, develop training strategy. • Coordinate on-site appraisals. Award BFHI achievement awards and certificates of commitment.	• Hand over BFHI to government/national body. • Continue representation on national body.		
Australia: • *February*: Australian representative attends Wellstart Int. BFHI Master Trainer/Assessor workshop in USA • *April*: UNICEF hosts preliminary meeting (Melbourne). Formation of National Consultative Group (NCG) and Taskforce to develop implementation strategies. • *May*: The Marketing in Australia of Infant Formulas (MAIF): Manufacturers and Importers Agreement signed and ratified by the Federal govt. • *September*: Adaptation of global documents. Field-testing at a Melbourne hospital.	• *February*: "BFHI in Australia and New Zealand": an invitation-only free workshop to introduce the BFHI to key stakeholders held in Melbourne. • *April*: UNICEF Australia dissolves NCG and Taskforce → National Steering Group (NSG). • *August*: First 'Certificate of Commitment' awarded (Royal Women's Hospital, Melbourne). • *October*: UNICEF Australia provides part-time secretariat support in the form of a Programme Manager. Work demands soon outstrip capacity.	• *March*: First successful hospital accreditation (Mitcham Private Hospital, Melbourne). • *April*: Formal commitment from every state and territory to establish a BFHI (State) Committee. • *September*: Second successful accreditation (Royal Women's Hospital, Melbourne).	• *January*: Review of BFHI by UNICEF Australia (external process). • *February*: UNICEF Australia decision to cease BFHI governance. Call for tenders for successor body. Funding agreement identified. • *July*: Expressions of interest received. • *August*: Australian College of Midwives (ACM) announced as successor body. • *November*: Responsibility transferred to ACM (minus funding). UNICEF Australia withdraws from any further Committee representation.

also serves to facilitate understanding of an intimately related issue. In this study the focus was the support of breastfeeding in Australia. Case Study Research (CSR) has been shown to be an applicable methodology for midwifery research.[17] Case Study Research is an appropriate approach to reveal the highly complex contexts surrounding the development and implementation of a clinical, quality assurance programme such as the BFHI.

The CSR design required the collection of data from National policy documents, government reports, organisational minutes and correspondence. Field notes taken when reviewing documents were also utilised. This paper presents an in depth analysis of public and private documents published and in use leading up to and around the time of initial implementation in Australia. These documents shed light on the challenges of implementing a global programme into a national setting, namely the initial uptake of the BFHI in Australia.

There are good rationales for using document analysis. Documents are distinctive in so far as they exist before the researcher seeks to use them as data[18] and may contain far more information than would be gained from an interview or survey. Documents uncover meaning, develop understanding and help the researcher discover new insights about the research problem. The background information as well as historical insights that are obtained can help researchers understand the roots of specific issues. The capacity for triangulation, namely using a variety of sources to strengthen findings, makes document analysis very valuable to case study research.[16]

This paper contributes to a larger doctoral research study. Ethics approval from the University of Technology Sydney Human Research Ethics Committee was obtained for what was regarded as a low/negligible risk project. Support from the current custodians of *BFHI Australia* included access to private archival documents. Access to publicly available documents did not require ethical approval.

3.1. Sampling strategy

A purposeful strategy was used to obtain a comprehensive sample of information-rich documents. The selection strategy was based on each document's importance and relevance to breastfeeding, the BFHI implementation process and reliability of authorship. A finite number of documents resulted (Table 3). Knowledge of the situation assists in setting the text in its context of production to identify richness and limitations.[19] The first author had extensive prior knowledge, understanding and experience with breastfeeding support issues and the BFHI in Australia, facilitating a deeper understanding of relevant interrelated events and documents. The first author was also mindful to acknowledge the existence of prior knowledge and engagement during analysis to ensure the situation did not arise where assumptions and presuppositions could interfere with the findings generated.

Documents are categorised as personal, private or public, depending on who wrote them rather than ownership or availability to the wider population.[20] Archival documents may be more personal, individual and private, thus more reflective of 'real life'.[19] Published material may also be polished to be strategic in nature, consequently unpublished material was included to ensure anything relevant to the BFHI implementation period and process was drawn upon. Private documents accessed from the archives of the Australian College of Midwives (ACM) revealed a unique insight into decision-making processes and outcomes. Public documents were accessed from the Internet or via the University's document delivery service. The date range of 1980–1996 was specifically chosen as it was considered to be highly influential in the development of the support of breastfeeding in Australia. Table 3 identifies the documents which exerted an influence on the BFHI's Australian implementation and uptake in the early 1990s, which is the period under examination.

3.2. Analysis framework

A context analysis framework and a 'documents as commentary' approach[18] informed the iterative analysis process. Analysis should seek to locate documents within their social as well as textual context.[21] Documents are not produced in isolation; they both refer and are connected to other documents, with meanings that are socially situated. How they are authored, produced, used

Table 3
Documents selected/type, reason for selection and data analysed.

Author/s; Year	Document title; publisher	Type	Reason for selection	Data analysed
Australian policy documents				
Commonwealth of Australia 1982.	*Dietary Guidelines for Australians.* AGPS. Canberra: Commonwealth of Australia.	Public	Initial national breastfeeding policy statement – for consumers and health professionals (HP)	Policy statements' content and language
National Health & Medical Research Council (NHMRC) Public Health Committee 1985.	*Report of the Working Party on Implementation of the WHO International Code of Marketing of Breast-Milk Substitutes March 1985.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of the will to adopt and implement the *International Code*	Recommendation's content and language
Better Health Commission 1986.	*Looking Forward to Better Health* (Final Report). AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of the recognition of need for evaluation and monitoring: setting national goals and targets for breastfeeding prevalence and duration	Recommendation's content and language
NHMRC 1992.	*Dietary Guidelines for Australian (n4).* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of changes in or maintenance of policy direction for the support of breastfeeding – for consumers and HP	Published breastfeeding data Policy statements' content and language
Nutbeam, D. et al. 1993.	*Goals and Targets for Australia's Health in the Year 2000 and Beyond.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of national monitoring process: national goals and targets set for breastfeeding prevalence and duration	Content, timeframe and language of targets set
Australian Institute of Health & Welfare (AIHW) 1994.	*Australia's Health 1994: the fourth biennial health report of the Australian Institute of Health and Welfare.* Canberra: AGPS.	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for HP	Published breastfeeding data Policy statements' content and language
NHMRC 1995.	*Dietary Guidelines for Children and Adolescents.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for consumers and HP	Published breastfeeding data Policy statements' content and language
NHMRC 1996.	*Infant feeding guidelines for health workers.* AGPS. Canberra: Commonwealth of Australia.	Public	Evidence of reporting mechanism and policy for the support of breastfeeding – for HP	Published breastfeeding data Policy statements' content and language
Commonwealth of Australia 2003.	*Marketing in Australia of Infant Formulas: Manufacturers and Importers Agreement – the MAIF Agreement* www.health.gov.au	Public	Evidence of the will to establish regulatory mechanism for the formula industry in accordance with international recommendations	Agreement's content and language Points of difference with international recommendations
Organisational archival documents				
United Nations International Children's Emergency Fund (UNICEF) 1991.	*Executive Directive Re: Baby-Friendly Hospital Initiative.* (30 December)	Private	Evidence of process of introduction and implementation of the BFHI at country-level	Rationale, background information and implementation schedule
United Nations International Children's Emergency Fund (UNICEF) 1991.	Personal communication (external): Letter from Executive Director to Regional Directors, Representatives, Directors and Section Chiefs. (26 September)	Private	Evidence of process of introduction and implementation of the BFHI at country-level	Rationale, background information and implementation schedule
UNICEF Australia 1992.	Personal communication (external): Letter to Minister for Health Housing & Community Services. (10 June)	Private	Evidence of UNICEF's attempts to engage the national government in dialogue about the BFHI	Content and language
UNICEF Australia 1992.	Personal communication (external): Letter to Public Health Association. (22 December)	Private	Evidence of UNICEF's intent to engage in discussion with national organisations regarding governance of the BFHI	Content and language
UNICEF Australia 1993.	Personal communication (external): Letter to Minister for Aged Family & Health Services. (11 January)	Private	Further evidence of UNICEF's attempts to engage the national government in dialogue about the BFHI	Content and language
Royal Australian College of Obstetricians and Gynaecologists (RACOG) 1992.	Personal communication (external): Letter to President UNICEF Re: BFHI. (19 November)	Private	Evidence of some key stakeholder's perception and attitude towards BFHI	Content and language

Table 3 (*Continued*)

Author/s; Year	Document title; publisher	Type	Reason for selection	Data analysed
RACOG 1993.	Personal communication (external): Letter to UNICEF Re: continued involvement with the BFHI. (28 January)		Evidence of some key stakeholder's perception and attitude towards BFHI	Content and language
UNICEF Australia 1994.	Personal communication (internal): *Baby Friendly Hospital Initiative Discussion Paper.* (20 April)	Private	Evidence of internal tensions within UNICEF regarding the operations of the BFHI	Content and language
UNICEF Australia 1995.	Personal communication (external): Letter to Immediate Past President UNICEF Australia. (01 March)	Private	Documentary evidence of the Decision of the UNICEF Board regarding the BFHI	Content and language
UNICEF Australia 1995.	BFHI National Steering Group Published Minutes 2 March 1995	Private	Evidence of the Resolution of the UNICEF Board regarding the future of the BFHI in Australia	Content and language
UNICEF Australia 1995.	Internal correspondence: Expressions of Interest re: BFHI successor body. (28 July)	Private	Evidence of the tender process and applicants	Content and language
Australian College of Midwives (ACM) 1995.	Personal communication (internal): Interoffice memo re: the BFHI. (13 November)	Private	Evidence of concerns about potential financial implications of governing the BFHI	Content and language

and consumed reflects social reality. The 'documents as commentary' approach provides insight into individual and collective social practices and structures that are not otherwise observable. The analytical approach for data analysis included careful attention to contrary or alternate examples or explanations and the use of multiple types of documents.[16] Documents were initially 'skimmed' and examined superficially. Meaningful and relevant data were identified and separated out. Close critical reading probed the precise language use and organisation of the whole text[19] facilitating deeper understanding of the context in which the document was produced. The text was reread and examined thoroughly. A number of interrelated themes emerged that demonstrated an influence on the BFHI's uptake in Australia during the early implementation phase.

4. Findings and discussion

Using a purposive sampling technique nine National policy reports and twelve organisational archival documents dated between 1982 and 1996 were chosen for analysis. These documents contained references to the support of breastfeeding and or the BFHI. They each contributed to each other and provided an understanding of the national policy and social context in which the support of breastfeeding was practiced during the 1980s and early 1990s. Table 3 identifies the documents accessed, rationale for their selection and data analysed.

Overall there were differing perceptions and valuing of breastfeeding. There were also different views of the BFHI's role in Australia, its desirability and capacity to create change plus debate about an appropriate governance structure. Four discrete themes were identified: "*a breastfeeding culture*," "*resource implications*," "*ambivalent support for breastfeeding and the BFHI*" and "*advocacy* versus *business*". Each of the four themes is explored and discussed in detail below. A key issue identified in the document analysis was the relationship between the two tiers of government that co-exist in Australia (national and state levels). It is therefore important to begin the presentation of the findings by providing further contextual information about the way national and state-based governments co-exist within Australia and set policy.

Australia operates as a federal system due to its colonial history. There is a two-tiered government structure with an overarching central (Commonwealth) and eight independent state/territory bodies. Each State/Territory has its own constitution, parliament, government and health system. The Commonwealth establishes national priorities and directions in public policy, for example in education and health. Competition for power exists. The States/Territories provide most of the services despite the Commonwealth having financial control due to its income taxing powers. The 1986 *Looking Forward to Better Health Report*[22] identified that new Commonwealth initiatives were potentially seen as a threat by the States/Territories; national policy-making was regarded as "an exercise in conflict management" (p. 50).

The Australian Commonwealth's representation on international meetings and ratification of Declarations described in Table 1 is an example of national policy-making. At a national level, health policy documents and reports record the progress of support of breastfeeding and the BFHI in Australia. While pursuing a national agenda Australia's policy documents were also a response to the requirement for action from the international Declarations. How the support of breastfeeding and a global strategy, the BFHI, were handled is further explored within each of the four themes.

4.1. A breastfeeding culture

A breastfeeding culture is one where breastfeeding is the norm. The total environment supports women to breastfeed: socially, politically and culturally. Policy documents traced the efforts made at a national level to promote the concept of an Australian culture of breastfeeding. In Australia the National Health and Medical Research Council (NHMRC) is a national organisation that uses expert panels and public consultation processes to develop health standards and disseminate advice for the community, health professionals and government public policy. Positive rhetoric underpinned the public policy stance for breastfeeding in 1996 as the following quote reveals:

> "*The Commonwealth Government is committed to protecting, promoting and supporting exclusive breastfeeding for at least the first four to six months of life. Australia is one of the few developed countries in the world to include a guideline on breastfeeding in its dietary guidelines for adults.*" Infant Feeding Guidelines for Health Workers 1996[23] (p. 2)

Closer scrutiny of the policy and context exposes significant gaps in the translation of evidence to practice. Four subthemes were identified: "*reporting breastfeeding prevalence and practice*", "*goals and targets*", "*limiting applicability*" and "*supporting the BFHI*" which will be discussed in greater detail.

4.2. Reporting breastfeeding prevalence and practice

Accurate data about trends in breastfeeding prevalence and practice, which are essential for informed policy formation were lacking. The seeming absence of concern for accuracy and an inflated sense of achievement were exhibited in the language of an early government report:

> "*The Working Party noted that the incidence of breastfeeding observed among Australian women now ranked among the highest in the Western world and exceeded those reported from several less developed countries.*" Report of the Working party on Implementation of the WHO International Code of Marketing of Breast-milk Substitutes 1985[24] (p. 14)

The incidence of breastfeeding referred to by the Working Party was drawn from a 1982 survey of 'national averages.[25] Data were collected from 83,987 live births from fifty-five representative hospitals; state and territory administrative figures, health department surveys and independent surveys. The survey estimated breastfeeding rates as: 72% at 6–8 weeks; 54–55% at 3 months; 40–42% at 6 months and 10–12% at 12 months. Critical examination has revealed significant methodological flaws, limiting applicability.[26] Bias included staff's estimation rather than a true quantitative survey of the number of women 'fully' breastfeeding at discharge. With regards to determining duration, the lack of homogeneity, namely inconsistent definitions and methodologies, different infant age groups and reporting periods reduced reliability and meaningfulness of the findings.

The results of a subsequent national survey in 1989 by the Australian Bureau of Statistics (ABS) revealed a different Picture.[27] The self-reported overall percentage of breastfeeding at hospital discharge of 77% was gathered from a participant-completed questionnaire returned by12,820 women aged 18–50 years. Similar to the 1982 survey significant flaws in methodology were revealed.[28] Small sample sizes, lack of clear definitions of breastfeeding and age specific rates meant only the percentage of women who had ever breastfed were able to be calculated, not breastfeeding intensity (degree of exclusivity). Exclusion of mothers aged less than 18 and respondent fatigue were further confounders not accounted for. Reporting errors such as respondents not understanding the questions, missing questions or following incorrect sequence guides also survived into the final data set. Secondary analysis of the same data by the ABS[29] revealed that despite overestimation there remained a decrease in rates from the 1982 figures at 3 months (originally 54–55% now 28%) and 6 months (originally 40–42% now 23%).

Unlike the 1992 *Dietary Guidelines*, that reproduced Palmer's (1985) survey results, *Australia's Health 1994*, reported the 1989 figures.[27] *Australia's Health* is a biennial report on health published by the Australian Institute of Health and Welfare (AIHW). An independent statistics and research agency within the Commonwealth government, the AIHW's mission is to support public policy-making on health and welfare issues by coordinating, developing, analysing and disseminating national statistics on the health of Australians. *Australia's Health 1994* acknowledged the limitations of current data collection processes while also concluding that the trend to increased breastfeeding prevalence had ceased. Despite long standing proposals to establish a coordinated national monitoring system[24,28] recommendations for future data collection to ensure the accuracy of the trend were absent. The differences in definitions and methodologies of successive surveys and studies and inconsistency of reporting data meant that the Commonwealth government's claims could not be substantiated. The data's lack comparability and usefulness also impacted on the development and assessment of any national goals and targets.

4.3. Goals and targets

Goal and target setting to increase the prevalence and duration of breastfeeding did not contain mechanisms to assess progress. Health goals and targets are used to indicate the direction and pace of change of health in populations. Goals represent a vision for the future; targets are specific and measurable. The Better Health Commission, chaired by a medical expert with assistance from a panel of professionals established taskforces to investigate morbidity and mortality in the community. *Looking Forward to Better Health* published in 1986[22] set the first goal for breastfeeding, namely increasing the duration of breastfeeding. The specific target was to increase rates at 3 months from 50% to 80% by the Year 2000. Using 50% as a baseline figure again suggests the use of the 1982 inflated figures rather than the 1989 survey findings. Using 50% would also mean that less improvement would be required to reach the target. However strategies to measure progress towards the targets were absent from the Report. A caveat was also included with language that clearly removed any governmental responsibility for implementation:

> "*The taskforce recommendations are not necessarily those of the Better Health Commission: they are the results of independent inquiries undertaken in the interest of improving the health of all Australians.*" Looking Forward to Better Health Volume 1 Final Report[22] (p. xii)

A subsequent expert panel developed and published revised goals and set new targets for Australian health standards in 1993. *Goals and targets for Australia's health in the year 2000 and beyond*[30] included breastfeeding under the nutrition umbrella. The targets were specific for hospital discharge plus full and partial breastfeeding up to 2, 3 and 6 months of age however they also did not include any measurable strategies. The expert panel clearly identified that there were insufficient current data on which to base the targets, which is incongruous with the process undertaken. Nevertheless, the goals and targets were referred to in a variety of public documents[23,28,31] suggesting the Australian government did not see any incongruence in endorsing the setting of non-measurable outcomes. Embedding the goals and targets in dietary guidelines also demonstrated the Australian government's view that breastfeeding was a nutritional issue.

4.4. Limiting applicability

Situating the support of breastfeeding and (later) the BFHI in nutrition policy and dietary guidelines negatively impacted its subsequent applicability to a wide range of potential stakeholders. Australia had previously decided breastfeeding 'belonged' in food and nutrition policy.[32] Dietary guidelines are designed to provide advice from health professionals to the general population about healthy food choices. The progression of the Australian government's conceptualisation of breastfeeding is discernible through the progression of published dietary guidelines.

The linkage of the health promotion strategies of breastfeeding and nutrition were observable in the earliest guideline:

> "*Breastfeeding provides the best nutritional start in life.*" Dietary Guidelines for Australians 1982[33] (p. 5)

The recommendations of the 1990 *Innocenti Declaration* (ratified by Australia) clearly situated the support of breastfeeding in a separate dedicated national multisectorial national breastfeeding committee. However the NHMRC continued to locate breastfeeding in a nutrition framework with the following justification:

> "*The inclusion of breastfeeding as a dietary guideline is a recognition of the nutritional, health, social and economic benefits of breastfeeding to the Australian community.*" Dietary Guidelines for Australians[34] (p. 87)

Not only did the Commonwealth government not demonstrate fulfilment of the international recommendations it had previously endorsed the following quote also suggests the beginning of a conceptual shift of onus to the community to support breastfeeding:

> "*The health of Australians begins with a good diet in infancy and community education should contribute to increasing breastfeeding rates and education in future generations of Australians.*" Dietary Guidelines for Australians 1992[34] (p. 87)

This theme was further developed in a subsequent guideline:

> "*Support and encouragement are necessary at all levels of the health system and in the wider community if the contribution of breastfeeding to the health of Australians is to be recognised and the prevalence and duration of breastfeeding are to be increased.*" Dietary Guidelines for Children and Adolescents[31] (p. 3)

The onus of responsibility and sense of obligation was clearly no longer a national government issue as demonstrated by the contrast between language and context. Policy statements are situated within a highly specific framework yet breastfeeding is more than the provision of nutrition and diet-related disease risk reduction.[35] Dietary guidelines encourage eating patterns to reduce the risk of diet-related disease and improve population wellbeing. The guidelines failed to adequately describe the complex interrelationships that exist between mother, baby, the family and society at large to facilitate breastfeeding 'success' and long-term health outcomes.

Policy language clearly recommended uptake by a range of stakeholders for a successful outcome. One might argue the panel recognised the limitation of the policy's placement and was attempting to demonstrate wider applicability. A guideline format for policy has limitations however. While the guidelines referred to goals and targets published elsewhere[30] the absence of actionable items meant progress evaluation was not possible and potentially not anticipated or desired. The lack of a consistent system for monitoring clearly impacted on the assessment of targets. The guideline's capacity for demonstrating relevance to a widespread audience was further diminished as it was not possible to establish an accurate picture from which to draw conclusions to inform future direction. The issues faced by policymakers also reached the BFHI.

4.5. Supporting the BFHI

The BFHI experienced an extension of the unique policy and implementation challenges already observed in the support of breastfeeding. The NHMRC expanded policy to create companion documents.[23,31] The two expert panels only shared three members, the rest were drawn from a wide range of key stakeholders. The *Dietary Guidelines for Children and Adolescent's* section on breastfeeding was informed by a background paper written by the peak breastfeeding support organisation, the (former) Nursing Mothers of Australia.[31] The "*Ten Steps to Successful Breastfeeding*" was included, but direction and/or encouragement for implementation were absent. The *Infant Feeding Guidelines for Health Workers* development process included the expert panel, submissions and a public consultation process.[23] The following statement was included:

> "*Australian hospitals are encouraged to actively adopt the Ten Steps to Successful Breastfeeding.*" Infant Feeding Guidelines for Health Workers 1995[31] (p. 1)

If a mandate represents official permission for something to happen the language of the above statement fulfils that criterion with the government seeming to give 'permission' for the BFHI's uptake. Contrasting issues are observable however. This policy may have represented the strongest stance possible at the time however 'encouraged to actively adopt' is not a robust statement of national intent. It does not support the impression of absolute endorsement of the BFHI. The language does not represent an indication by the Commonwealth government of a requirement for action by the States to commit to implementation/accreditation. 'Adoption' may also be subject to a different interpretation to 'implementation'.

At a local level responsibility for the BFHI was clearly placed on the individual hospital, further weakening the persuasive value of 'in principle' support. The BFHI programme includes accreditation as a natural end point to publicly demonstrate achievement of the standards. Any guidance for achieving the BFHI's goals or tangible support for implementation and accreditation was absent thus limiting the policy's (and the Commonwealth Government's) potential capacity to drive change. Given the known financial tensions that existed between Federal and State[22] the view of policymakers may have been that the BFHI was not seen either as an effective or an economically feasible strategy to be pursued at a national level.

4.6. Resource implications

The provision of resources to implement or evaluate the recommendations for the support of breastfeeding and the BFHI was a recurrent theme observed through a range of documents from key stakeholders.

The following quote clearly identifies the lack of financial assistance UNICEF could expect from Head Office to implement the BFHI:

> "*At country level, activities should be funded from existing country-level budgets.*" Executive Directive Re: Baby-Friendly Hospital Initiative[8] (p. 6)

The Executive Directive mandated the BFHI's implementation yet UNICEF did not equip its offices with resources to achieve its execution in an optimal manner. The implications for Australia were immediately apparent. UNICEF Australia did not enact the highly detailed and resource intensive 'suggested' implementation schedule described in Table 2. UNICEF's available financial and human resources determined their reaction to unforeseen internal and external challenges and out of necessity adaptation of the schedule occurred, also described in Table 2. The resource allocation required for the 'suggested' implementation may well have negatively impacted on usual UNICEF business activities, namely fund raising for low-income nations. A balance between the two priorities needed to be achieved. The language of the following quote in an internal Discussion Paper implies a warning, concern, perhaps a degree of resentment towards the resources required for programme sustainability:

> "*Considerable time and effort is involved in the BFHI.*" Baby Friendly Hospital Initiative Discussion Paper[36]

Governance was complex as the BFHI was a national programme operating out of the UNICEF Victoria branch office. Internal operational issues were identified, including a lack of clarity around budget, communication, responsibility and policy by the 'in house' Discussion Paper.[36] The tensions arising from the ongoing resourcing requirements may well have contributed to the de-prioritisation of the BFHI and reinforced the intent to find an alternate governing body in the 1995/1996 financial year. External challenges included key stakeholders' apparent lack of interest in governing the BFHI, presumably due to the financial implications. As the BFHI did not receive public policy attention till 1995[31] it can be assumed that in Australia in the early 1990s the commitment to breastfeeding support and the BFHI was confined to a fairly narrow sector of the health community. Reviewing UNICEF correspondence reveals multiple attempts to transfer governance of the BFHI. Repeated requests to the Commonwealth government, both by Head Office and Australia[11,37,38] to discuss taking up implementation responsibility were not actioned. UNICEF Australia also enquired whether other national associations had an interest in the BFHI.[39] The lack of uptake further supports the suggestion that the BFHI was not widely seen as a desirable or financially viable programme in the Australian context.

Actioning recommendations have resource implications. Where action was taken in the support of breastfeeding the Commonwealth government appeared to use a cost minimisation approach to policy implementation, namely the least expensive method was chosen. The Dietary Guidelines[31,33,34] represented one aspect of the policy response to the *WHO Code*. A 1993 Steering Committee reviewed the implementation of the *Who Code* and made specific recommendations to government[40] which contrasted with previous recommendations.[24] The resulting policy response, *The Marketing in Australia of Infant Formulas: Manufacturers and Importers Agreement – the MAIF Agreement* and Advisory Panel[41] was voluntary, narrow in scope and the Advisory Panel included industry representation, a potential conflict of interest. To enact all the targets of the *Innocenti* Declaration additional legislative and structural changes were required. The lack of tangible resourcing indicated attitudinal issues were also present.

4.7. Ambivalent support for breastfeeding and the BFHI

A sense of ambivalence with regards the importance of support for breastfeeding and the BFHI was also evident from various stakeholders.

The following quote from UNICEF's Executive Directive (1991) demonstrated an assumption of BFHI knowledge at country level prior to its development and launch yet did not suggest an extensive prior communication or consultative process had occurred:

> "*. . . a new global effort you have probably heard of by word of mouth or reports from Headquarters.*" Executive Directive Re: Baby-Friendly Hospital Initiative[8] (p. 1)

However Head Office also held the positive opinion that all country offices would enthusiastically embrace the BFHI as identified in the following quote:

> "*The BFHI should fit naturally with your current field program aims, since it will give strong lift towards several World summit goals.*" Letter to country office heads[42] (p. 2)

UNICEF Australia may well have felt they had few options initially considering the manner in which the programme was communicated and delivered, which is in contrast with the recommended social model of health framework and health promotion principles. Examination of UNICEF correspondence revealed a number of issues:

> "*In response to some community pressure and from New York, UNICEF Australia set up a national task force in mid-1992, with representation from a number of national organisations and with support from others.*" Correspondence to the President of UNICEF Australia[43]

The existence of ambivalence from several areas can be interpreted in the language used: from the identified 'pressure' to set up the task force from various groups and a clear distinction between representation and support from committee members. Some degree of ambivalence is understandable given that UNICEF Australia staff may have held opinions typical of high-income nations at the time. A positive perception existed of formula milk's comparability to breastmilk.[44] A limited awareness and understanding that the benefits of breastfeeding applied equally to all babies was also present. One influencing factor for this attitude could have been an unintended effect of the success of the international advocacy campaigns against formula companies in the 1970s. The campaigns highlighted the dangers associated in low-income nations rather than the risks incurred for any mother and baby regardless of demographic. A sense of complacency and naivety existed amongst many people living in conditions of relative prosperity, namely that their children were immune from risk.[45] The attitude that the BFHI was more applicable to low-income nations may also have been present in the Commonwealth government, with the perception influencing policymakers' prioritisation of the programme.

Further examples of ambivalence towards the BFHI from key stakeholders were observed, for example the peak body of Obstetricians in Australia was moved to record the following complaint in a letter to UNICEF Australia:

> "*Some of your strategies are too restrictive for Australian women and Australian hospitals.*" Correspondence to the President of UNICEF Australia[46]

Support for breastfeeding by the Royal Australian College of Obstetricians and Gynaecologists (RACOG) clearly did not extend to the BFHI; presumably "strategies" refers to the "*Ten Steps to Successful Breastfeeding.*" This assumption is supported by RACOG's exception to the term 'baby friendly hospital' in the same document stating it suggested discrimination. The RACOG subsequently opted out of physical representation on the NSG.[47] The RACOG's view represented a lack of understanding of the BFHI philosophy, where women are enabled to freely make informed infant feeding decisions.[1] The historical subordination of midwives to doctors in Australian maternity services described in the literature[48] may also have reinforced obstetricians' desire for and decision to maintain political distance.

A subtle ambivalence with regards to the Commonwealth government's unqualified support for breastfeeding and later the BFHI can also be seen in the language used for recommendations, particularly the inclusions and exclusions. The *Innocenti Declaration* set a goal for achieving optimal health for infants and mothers by clearly describing a recommended standard of breastfeeding practice as follows:

> "*. . .all women should be enabled to practise exclusive breastfeeding and all infants should be fed exclusively on breastmilk from birth to 4–6 months of age. Thereafter, children should continue to be breastfed, while receiving appropriate and adequate complementary foods, for up to two years of age or beyond.*" Innocenti Declaration 1990[49]

Observation of the use of language reveals a significant point of difference in policy. The Dietary Guidelines[23,31,34] concurred with the WHO on exclusivity however they carefully avoided the topic of duration as the following quote reveals:

"*Breastfeeding from a healthy well-nourished mother is adequate as the sole source of nutrients for full-term infants from birth until four to six months of life.*" Dietary Guidelines for Australians[34] (p. 87)

The lack of specificity regarding duration was potentially because some groups in the Australian community at that time may have reacted negatively to the suggestion of breastfeeding for two years.[26]

The lack of clear policy and direction to support the BFHI also suggests a sense of ambivalence. Potentially its inclusion in policy was meant to signify the BFHI's importance to the wider Australian community. The Commonwealth government could have considered their public position as a reasonable compromise, one that also demonstrated a positive response to their international and national obligations. The lack of national standardisation and clear endorsement of international policy with regards the support of breastfeeding and the BFHI can also be viewed as further examples of a prevailing ambivalent attitude that provided support for the stance of other national organisations. It can also be argued that public policy demonstrated little evidence of advocacy for the women and children of Australia.

4.8. Advocacy versus business

A final theme highlighted in the document analysis was the tension between advocacy and business priorities. The BFHI aims to influence decisions and practices within the health system. As previously identified such change has funding implications that may not be appealing to policymakers. The tension between advocacy and business was observed in documents at national and (international) local level.

It was optimistic and perhaps naïve of UNICEF to assume or even hope that all governments would decide to implement the actions of the *Innocenti Declaration* in full considering local resource and legislative implications. Australia for example was undergoing a period of economic rationalisation. Health care became an industry and a neoliberal market state evolved with deregulation, privatisation and deletion of government intervention occurring. The economic rationalist agenda impacted on healthcare policy. There was a shift to performance indicators with greater measuring of outputs and outcomes as well as drugs and dollars and minimising bureaucracy. Health care became centralised and privatised. The introduction of new initiatives that had recurrent resource implications and no proven outcomes had little likelihood of uptake in a climate experiencing wide ranging tax reforms and programme reviews to reduce current spending.

The following quote from the report of the UNICEF Australia's external review of the BFHI in 1995 is revealing:

"*While strongly supporting the philosophy and basis for establishing the BFHI in Australia and acknowledging the powerful and rapid impact that has been made to date, UNICEF Australia is unable to justify major financial and administrative support of this project when faced with the considerable demands of other vital international initiatives in support of needy women and children in the world's poorest countries.*" Report for UNICEF Australia Baby Friendly Hospital Project[50] (p. 4)

The direct outcome of having the contrasting priorities between advocacy and business resulted in tension experienced by an international aid agency prioritising business on the one hand to support advocacy activities elsewhere. UNICEF Australia was also unused to and inexperienced with governing an unfunded domestic programme. It is safe to assume that their actions would also have been influenced by the BFHI's business model at the time of early implementation. Support is also lent to the argument that UNICEF staff did not have a full appreciation of the importance of breastfeeding to the health of women and their families in Australia. The language suggests an attitude that the needs of women and children in low income nations outweighed the needs of Australian women and children, which is arguably a form of reverse discrimination.

The NSG's reaction to UNICEF's decision to withdraw from the BFHI was captured by the Minutes immediately following the announcement:

"*The National Steering Group members present expressed deep regret at the decision taken.*" BFHI National Steering Group Minutes[14] (p. 2)

UNICEF's resolve to withdraw from the BFHI and to find an alternate governing body was a business decision; however it was conceptually foreign to the NSG. National Steering Group members were volunteers who fitted BFHI work in around their substantive positions. They shared a belief in the long-term measurable difference to prevalence, duration and health outcomes for society as a whole that could be achieved through the active support of breastfeeding and the BFHI. Similar to UNICEF's view regarding country-level engagement the NSG may also have had an expectation that UNICEF Australia would naturally embrace the BFHI. The NSG were not privy to the inner workings of the UNICEF Australia Board however. Given more time the BFHI may have become self-sustaining however in the short term it was optimistic of the NSG to assume that UNICEF Australia would continue to fully support a programme that was in deficit.

Similarly the ACM identified a distinction between altruism and business as revealed in the following reflection recorded immediately after the transfer of governance:

"*I am really beginning to think we may have taken on the wrong thing business wise.*" ACM interoffice memo[15]

The College had committed significant resources in its bid to secure sole governance rights of the BFHI. The UNICEF Australia funding agreement did not eventuate, leaving the College in an unforeseen financial situation, which would have far-reaching consequences.

5. Strengths and limitations

The construction of a different and deeper understanding of the issues under examination has been achieved using the 'documents as commentary' approach.[18] The international imperative to develop the BFHI and influences on its uptake in Australia has been mapped and analysed. Breastfeeding support has been tracked through the examination of breastfeeding policy documents.

Strengths of this documentary research process included access to a wide range of public and private documents. Methods to enhance trustworthiness in data analysis were employed. A clearly identifiable process using quality criteria was utilised as a means to ensure rigour. The documents and evidence were verified as genuine due to access from official websites, the presence of official letterhead and verifying signatures (authenticity). The documents were free from obvious bias as they were produced for information dissemination rather than personal use (credibility). Public documents analysed reflected current government policy and reports contained recommendations for government action (representativeness). The access to private documents may not have been representative of the totality of the entire set of relevant documents though, impacting on the authors' subsequent capacity to reveal all aspects of the 'story'. However, the evidence contained within all the documents was clear and comprehensible (meaning). 'Source criticism' strategies

to ensure quality were also employed.[18] External critique reinforced quality control with the establishment and credibility of documents verified. Internal critique uncovered how a source can inform the analysis through a consideration of the intentions and abilities of the document's producers and access to events. All documents were clearly linked to events surrounding the early implementation of the BFHI and or the support of breastfeeding in Australia. Individuals, organisations or government departments that were either associated with or had some responsibility for the events produced the documents. The sampling strategy was chosen to minimise any potential for bias. Data analysis was undertaken by the first author, a doctoral candidate. Close collaboration with the supervisory panel ensured potential bias did not influence the analysis.

Reflexivity was a further method used to encourage rigour. Knowledge production is neither an external process nor is it objective; interpreting data is influenced by the intrinsic qualities and interests of the researcher.[51] It was an advantage to have knowledge of the situation to better contextualise the texts under analysis.[19] Deep previous engagement with the BFHI, occupying an 'insider' position[51] was seen as an advantage as the actual policy environment was known. There was a degree of familiarity with a number of the public documents and key stakeholders displayed trust by providing access to private documents. Care was taken not to make assumptions, as they would threaten validity. Any presuppositions on the part of the investigators, due to their prior knowledge were also suspended in order to minimise bias in reporting.

The capacity for influence from interview participants for example was not applicable, as a document exists before the researcher[18] although the issue of power remained.[52] Reflexivity of the power relationship resulted in care being taken to avoid any exertion of authority by authoring a particular version of the text; the use of triangulation lessened this potential bias.

6. Conclusion

The challenges to implementation identified through the document analysis were many and varied, yet interrelated. The Australian two tier government system added to the complexities of attempting to translate evidence, namely changing the prevailing infant feeding culture through policy and practice. There was little persuasive effort by the Commonwealth government to the States and Territories. Ambivalence towards the importance of support for breastfeeding and the BFHI from several key stakeholders was also observed, with the underpinning thread of resource limitations evident. Consequently the BFHI was unable to gain good early traction. The support of breastfeeding and the BFHI in Australia was conceptualised as part of and subsumed within a food and nutrition policy rather than a standalone programme and primary health care initiative as per international recommendations. While providing policy responses the Commonwealth still essentially distanced itself from fulfilling its obligations as a signatory of the *Innocenti Declaration*. Recommendations included the creation of a multisectorial national committee to take carriage of breastfeeding in Australia, which included the BFHI. By not actioning these recommendations the Commonwealth government demonstrated a lack of specific direction in the active support for breastfeeding. Furthermore the provision of a clear mandate for nation-wide full implementation the BFHI and accreditation of maternity facilities was absent. However, the missed opportunity to gain an early understanding and appreciation of breastfeeding as a contextual activity, with interrelationships between social, economic and environmental factors and translate this into policy has had long term impact on the capacity for Australia to develop a comprehensive supportive breastfeeding environment for women, babies and their families.

This analysis has highlighted lessons that could be useful to the implementation of other national health promotion activities. There are a number of recommendations. To effect the translation of evidence into practice carriage of the programme by a dedicated multisectorial national committee to oversee all aspects of implementation, evaluate progress and ensure accountability is essential. An initial mapping exercise will determine the current situation as a baseline and identify enablers and barriers. In conjunction with the mapping exercise an economic model of the proposed programme with short and long term projections is required. Clearly worded policy that is applicable to a wide range of stakeholders with specific and tangible incentives will be persuasive to the programme's uptake. The establishment of goals and targets informed by current data will indicate the desired direction, pace of change and measure outcomes. Finally a communication policy and process across all government departments with an ongoing funded national campaign will demonstrate the translation of evidence into practice, unqualified nature of support offered throughout the health system and wider population to facilitate the desired culture change.

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Original Research - Qualitative

An instrumental case study examining the introduction and dissemination of the Baby Friendly Health Initiative in Australia: Participants' perspectives

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ABSTRACT

Background: Australia experiences high breastfeeding initiation but low duration rates. UNICEF introduced the global breastfeeding strategy, the Baby-Friendly Hospital Initiative, to Australia in 1992, transferring governance to the Australian College of Midwives (ACM) in 1995. In 2017 23% of facilities were registered as 'baby-friendly' accredited.
Aim: To examine the introduction and dissemination of the Baby-friendly Hospital Initiative into the Australian national setting.
Methods: An instrumental case study was conducted containing two components: analysis of historical documents pertaining to the Initiative and participant's interviews, reported here. A purposive sampling strategy identified 14 participants from UNICEF, ACM, maternity and community health services, the Australian government and volunteer organisations who took part in in-depth interviews. Thematic analysis explored participants' perceptions of factors influencing the uptake and future of the since renamed Baby Friendly Health Initiative (BFHI) and accreditation programme, *BFHI Australia.* Two broad categories, enablers and barriers, guided the interviews and analysis.
Findings: Participants revealed a positive perception of the BFHI whilst identifying that its interpretation and expansion in Australia had been negatively influenced by intangible government support and suboptimal capacity building. BFHI's advocacy agenda competed with *BFHI Australia's* need for financial viability. Widespread stakeholder collaboration and tangible political endorsement was seen as a way to move the strategy forward.
Conclusion: Dissemination of *BFHI Australia* is hampered by multi-level systems issues. Prioritisation, stakeholder collaboration and adequate resourcing of the BFHI is required to create a supportive and enabling environment for Australian women to determine and practice their preferred infant feeding method.

Statement of significance

Problem or issue

Neither international nor national breastfeeding practice recommendations are being met in Australia. A 90.4% initiation rate has been reported together with a rapid early decline, only 61.4% of babies are being exclusively breastfed for their first month of life.

In 2017 23% (69/296) of Australian maternity units were registered as 'baby-friendly'. There is a need to understand factors influencing the introduction and dissemination of the Baby Friendly Health Initiative (BFHI) in Australia. Determining historical and current enablers and barriers will reveal if a sense of 'fatigue' exists and if indeed the BFHI has a future in Australia.

What is already known

The BFHI has a positive association with breastfeeding prevalence. A recent meta-analysis demonstrated that BFHI interventions increased exclusive breastfeeding by 49%. Women's early feeding practices are known to be influenced by the policies and practices of maternity facilities.

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What this paper adds

BFHI Australia's dissemination has encountered a number of barriers both historically and to the present. It is hampered by multi-level systems issues such as prioritisation, stakeholder collaboration and adequate resourcing.
Despite the acknowledged barriers there is a willingness to progress the BFHI in Australia and strategies to increase its dissemination are identified.

1. Introduction

Breastmilk is the optimal food for human babies and young children. The importance of breastmilk for long-term health benefits and adverse risks of not breastfeeding and premature weaning in low and high income nations has recently been reaffirmed.[1] However in many nations breastfeeding initiation rates are static and the duration of exclusive breastfeeding declines steadily.[2] Breastfeeding and breastmilk is not widely valued despite attempts to implement measures to protect the entitlements of women and babies[3] such as the global Baby-friendly Hospital Initiative.[4] The Baby Friendly Health Initiative (BFHI) in Australia has had a limited uptake if measured by the rate of accredited facilities. How widely BFHI practices have been disseminated in Australian maternity facilities is unknown as there is no formal measurement process by any health governing body.

This study aims to explore the introduction and dissemination of a globally designed and initiated breastfeeding programme, the Baby-friendly Hospital Initiative, into the Australian national setting using an instrumental case study approach. There are two components to this case study. This paper presents one component, namely an exploration of 14 participants' recollections of the initiative's introduction into Australia, their experiences with the current BFHI and *BFHI Australia* and projections about its future. A previous publication reported on findings from the analysis of key documents published prior to and around early implementation.[5] The document analysis found that limited human and fiscal resource allocation at all levels of the healthcare system and government negatively impacted on the initiative's capacity to gain early traction.

1.1. Background to the BFHI

The Baby-friendly Hospital Initiative is a global public health programme developed by the United Nations International Children's Emergency Fund (UNICEF). Its philosophy and principles support women's rights to practice informed infant feeding in a supportive environment.[6] The initiative is embedded within the *Innocenti Declaration on the protection, promotion and support of breastfeeding.*[7] Australia was an early signatory to this landmark document, reflecting support at national government level. UNICEF introduced the programme to Australia in 1992.

The underpinning framework, the *Ten Steps to Successful Breastfeeding*[6] presents a set of recommended minimum quality assurance standards for the support of breastfeeding in all maternity facilities. Fig. 1 sets out the "*Ten Steps to Successful Breastfeeding in Australia*"[8] with Step 4 amended as per World Health Organization (WHO) recommendations made in the 2009 global revision of the standards[9] (p. 34). Compliance with the 'ten steps' usually requires some degree of clinical service redesign at a local maternity facility level. Redesign involves the development and implementation of new policies and practices aiming to improve service delivery and facilitate the emergence of a 'breastfeeding culture'.

The initiative as a whole is a complex innovation with multiple interventions. While the 'ten steps' are interrelated they may be implemented individually to facilitate the pace of change management in individual facilities. An accreditation process was embedded into the initiative. It was envisaged that a public acknowledgment of a hospital's successful designation as 'baby-friendly' would become a source of pride and a marketing strategy to incentivise prospective participating hospitals/health services to implement the full package of interventions.[10] Nationally an accreditation body is responsible for disseminating the programme and undertaking assessments. In Australia a volunteer National Steering Group (NSG) adapted the global documents to suit the local context while trying to keep as close to the original as possible.[11] To create a national identity the accreditation programme is known as *BFHI Australia*. Assessment fees for accreditation are determined by each facility's annual number of births.[8] If successful, a certificate designates the hospital as 'baby-friendly' and part of a global network that provides a standardised high level of care in the support of infant feeding choices.

The BFHI accreditation programme has been administered by the Australian College of Midwives (ACM) since 1995 following a competitive tender process to transfer governance from UNICEF. In 2006 ACM changed 'Hospital' to 'Health' to more accurately reflect the expansion of the initiative into community health settings, followed by the release of the Seven Point Plan for Community Services[12] in 2008.

"The Ten Steps to Successful Breastfeeding in Australia"

1. Have a written breastfeeding policy that is routinely communicated to all health care staff
2. Train all health care staff in the skills necessary to implement this policy
3. Inform all pregnant women about the benefits and management of breastfeeding
4. "Place babies in skin-to-skin contact with their mothers immediately following birth for at least an hour and encourage mothers to recognise when their babies are ready to breastfeed, offering help if needed."
5. Show mothers how to breastfeed and how to initiate lactation if they are separated from their infants
6. Give newborn infants no food or drink unless medically indicated
7. Practice rooming-in and allow mothers and infants to stay together 24 hours a day
8. Encourage breastfeeding on demand
9. Give no artificial teats or pacifiers (also called dummies or soothers) to breastfeeding infants
10. Foster the establishment of breastfeeding support groups and refer mothers on to them on discharge from the hospital or clinic

Fig. 1. The ten steps to successful breastfeeding in Australia.[8]

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Table 1
Australia's currently accredited maternity facilities by State/Territory.[14–16]

State/Territory	Maternity facilities (total)	Accredited maternity facilities	Percentage (rounded up or down)
Tasmania (TAS)	6	6	100
Northern Territory (NT)	5	4	80
Australian Capital Territory (ACT)	3	2	66
South Australia (SA)	30	14	46
Queensland (QLD)	57	20	35
Victoria (VIC)	70	9	13
New South Wales (NSW)	88	10	11
Western Australia (WA)	36	4	11
Total	296	70	24

Introducing and managing complex interventions such as the BFHI is a complicated process with no guarantee of success.[13] If the national percentage of 'baby-friendly' accredited Australian facilities is used as a measurable outcome of the initiative's uptake[14] then *BFHI Australia* has not been successful. There is wide variation in uptake of *BFHI Australia* across Australian States and Territories with 70/296 'currently' accredited facilities in 2017.[14] Table 1 details the variance in accredited maternity facilities between States and Territories. For example, Tasmania has 100% of facilities accredited (6/6) compared with Western Australia which has 11% (4/36) of facilities accredited.[14–16]

2. Background and justification for the study

Neither international[17] nor national[18] breastfeeding practice recommendations are being met in Australia. In the *2010 Australian National Infant Feeding Survey*,[19] the primary caregivers of 28,759 Australian-born children aged 0–2 years revealed that only 39% of babies were exclusively breastfed to three months of age and 15% to five months despite an 'ever breastfed' rate of 96%. The findings support previous Australian health surveys[20] that identified a consistent discrepancy in duration rates according to socio-economic circumstances. Women in socially disadvantaged circumstances are introducing non-human milks and foods earlier than women with higher incomes.

Evidence suggests that women's early feeding experiences are influenced by the policies and practices of maternity facilities.[21] Australian researchers propose that the rise in institutionalised and medicalised childbirth has negatively affected traditional midwifery practices[22] with particularly detrimental consequences for breastfeeding support. A systematic review of the literature[23] concluded that the majority of midwives provide breastfeeding support as a 'technical expert' rather than a 'skilled companion'. Midwifery language is also revealed as a barrier to appropriate support when it reinforces a perception of breastfeeding's complexity.[24] These findings are further reflected in a meta synthesis that revealed women describe either 'authentic' or 'disconnected' breastfeeding experiences from health professionals.[25] In a recent study of 4310 Queensland women[26] 26% expressed concern about their experiences of inadequate or inconsistent breastfeeding support whilst in hospital. In addition a review of the organisation and structure of Victorian postnatal wards[27] revealed that understaffing and lack of time were common features that acted as barriers to providing appropriate support. The distress that women experience when their support needs have not been met impacts on their subsequent infant feeding decisions.[28] This is the context in which the BFHI and *BFHI Australia* operate.

Another aspect of the context that needs to be considered is that Australia's complex political systems may also act as barriers to the success of the BFHI in this country. Politically Australia consists of a Commonwealth (national) government with eight States and Territories that have their own constitutions, parliament, government and health system. The Commonwealth sets *policy direction* in health and education, while maintaining overarching financial control. However, the States/Territories *provide most of the services* from within their own budgets. This two-tiered governance and fiscal reality creates a tension in designing and implementing health policy.[5] The result is the BFHI in Australia is supported 'in principle' by both national and State/Territory health policy however there is no clear imperative at either level for implementation or accreditation. There is little funding support and no standard set for health facilities to be accredited.

Australian BFHI implementation data are non-existent at national and sparse at state-level. Between 2002 and 2011 one state, Victoria, published manually collected, self-assessed data provided by public hospitals on their compliance with the *Ten Steps to Successful Breastfeeding*. The average number of steps achieved was reported as 8 out of 10 in 2002[29] rising to 9.5 out of 10 in 2011.[30] Publication of manually collected data ceased from the 2011–12 reporting period and the indicator was 'retired' either because it was regarded as no longer necessary owing to the high number of steps achieved, or because the self-reported nature of the data may have been found wanting. During this same time period, a retrospective cohort study of 6752 Queensland women birthing in 2009 examined the impact of four BFHI practices: rooming-in, time of first breastfeed, supplementation in hospital and skin-to-skin contact. Fifty percent of women identified they experienced the four BFHI supportive hospital practices, irrespective of the hospital's BFHI accreditation status[31] suggesting some diffusion of the innovation has occurred in Australia. However as the full extent of implementation has never been measured it is not possible to clearly identify the standard of breastfeeding support and degree of impact the BFHI has achieved Australia-wide.

In a previous publication presenting results of a document analysis we identified a number of barriers impacting on the introduction and dissemination of the BFHI into Australia.[5] The document analysis revealed a sense of ambivalence toward the importance of breastfeeding and the BFHI by key stakeholder organisations, a lack of adequate resourcing to implement and disseminate the initiative and contrasting priorities between advocacy and business. The relationship between the States/Territories and Commonwealth government in Australia was also a key issue as responsibility for BFHI implementation appeared to be 'lost' between the two. Australian research has revealed further barriers including: a lack of commitment by experienced midwives in some 'baby-friendly' facilities who only comply with the BFHI if workload and time allow[32] and a lack of understanding by hospital administrators and policy makers that part of their remit includes support and funding for promoting breastfeeding in the community.[33] Differing perceptions of the BFHI have been displayed by health professionals who are focused on tick box management rather than sitting with women and talking about breastfeeding.[34] Understanding factors that may have exerted an influence on the initial uptake, consequent growth, development, dissemination

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and potential future of the BFHI in Australia is therefore warranted and was the impetus for this study.

3. Study design and methods

This study used an instrumental case study design[35,36] by examining a 'case' to provide insight into a particular issue of interest and facilitating the understanding of 'something else'.[37] In this study the 'case' is the BFHI in Australia and the issue of interest is the dissemination of a global health strategy in a national setting. The 'something else' is the ongoing and future support of breastfeeding in Australia. Complementary data collection methods such as interviews and document analysis strengthen confidence in a study's findings while privileging participants' 'voices'. Diverse sources of data have been examined in this case study including relevant archival documents and interviews with participants involved in the BFHI at national and international levels, currently and historically. While instrumental case studies offer thick description of the particular phenomenon being examined the volume of data included in this study has required separate publications for document analysis[5] and interview findings. By examining the views of diverse participants this paper aims to increase understanding of the factors impacting on the introduction and uptake of *BFHI Australia* in order to inform its future path.

3.1. Recruitment of participants

Purposive sampling was used to recruit participants with diverse experience of the BFHI in Australia . Participants were identified either through the review of archival documents or as known members of government, non-government (NGO) and volunteer organisations that include the support of breastfeeding. Consequently all participants had particular knowledge of or an association with the BFHI at one or more time points since its global introduction and Australian implementation in 1992.

A list of potential participants with an historical as well as current association with *BFHI Australia* was compiled by the first author. ACM demonstrated support for the project by emailing those potential participants who had an historical BFHI association (and had never met the first author) and providing a study information sheet with contact details to follow up if they were interested in further information or participation. Where a prior professional collegial relationship existed with the first author, prospective participants were directly approached by email and were provided with an information sheet. If they were interested in the study they were invited to contact the first author to arrange to participate in an interview.

The study's purpose was clearly explained, namely to obtain participants' perspectives about the dissemination of the BFHI in Australia. All participants signed consent before their interview.

3.2. Method

Interviews were conducted between January 2014 and February 2016. All interviews but one were conducted face to face to promote participants' relaxation and facilitate comprehensive responses. Interviews were conducted at the participant's convenience: offices, cafes and homes. Questions were open-ended and modified to suit the particular context of the participant, with prompting as required. Participants were asked to describe their experiences of the introduction, dissemination and current state of the BFHI and *BFHI Australia*. Factors that acted as enablers and barriers were explored. Finally an opinion of the future of both the BFHI and the accreditation programme was elicited with discussion around viability. Interviews were digitally recorded and transcribed verbatim. Transcripts were checked for accuracy with the recording. Field notes were made during the interview and afterwards when listening to the sound file. Interviews ranged from 45 to 90 min duration. Participants were assigned a pseudonym for anonymity. Data saturation was not expected to occur as each participant presented a different overall perspective and experience.

3.3. Data analysis

A thematic analysis[38] of the data was undertaken. The transcripts were read multiple times by the first author to aid familiarisation. Notes were written on the text and highlighters used to identify segments of interest. Using Braun and Clarke's[38] framework, which draws on the work of Boyatzis,[39] initial codes were generated. NVivo software was used to manage the data. As the data were approached with the research questions in mind, namely enablers and barriers to the BFHI's dissemination and the support of breastfeeding in Australia, only particular features ofthe dataset were identified. The data were then tagged, named and reviewed manually by the first author. The four themes identified from the historical document analysis: a breastfeeding culture; resource implications; ambivalent support for breastfeeding and, the BFHI and business versus advocacy; were used to guide the interview analysis and promote triangulation. The document analysis was completed before the analysis of the transcripts therefore the themes emerging from the document analysis were prescient as we approached the data set. Emergent themes arising from the data analysis were discussed with the primary author and supervisory panel and modifications made until consensus was reached.

3.4. Ethical issues

The study received low/negligible project ethics approval from the University of Technology Sydney (2013000053) and written support from the Australian College of Midwives. The main ethical issues were ensuring informed consent to participate and the anonymity of participants.

3.5. Trustworthiness and rigour

Strategies that ensure credibility (triangulation), dependability (reflexivity), confirmability (audit trail) and transferability (thick descriptions) to determine rigour in case study research[40] were used. The first author had experience with *BFHI Australia* as a member of state and national BFHI committees and employment as a midwife/lactation consultant in the public health system. It was through participation in the wider 'lactation community' that previous collegial relationships were formed with some participants in this study. Any level of relationship and potential for bias was acknowledged prior to commencing the interview.

Prior experience provided an 'insider' perspective[41] and greater insight into the case of interest, the BFHI in Australia . It was important to maintain an analytical degree of distance[42] to ensure the absence of assumptions or presuppositions arising from the participants' 'voices'. The first author was mindful that assumptions and presuppositions resulting from her knowledge and prior relationships could interfere with the findings generated. Ongoing discussion with the supervisory panel also minimised this potential bias.

4. Findings

Twenty-one potential participants were approached. Six declined to participate. Reasons for declining included both concerns about anonymity and unwillingness to discuss the events

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Table 2
Overview — participants' profiles.

Pseudonym	Health professional	Primary affiliation with the BFHI due to Committee involvement between 1992 and 2016	Primary affiliation with the BFHI due to substantive employment position	Affiliation with a Non-Government or volunteer organisation	International Board Certified Lactation Consultant	Region
"Bailey"	✓	✓				VIC
"Casey"	✓	✓			✓	VIC
"Charlie"		✓		✓	✓	VIC
"Dale"	✓		✓	✓		NSW
"Daryl"	✓		✓			VIC
"Drew"	✓	✓		✓	✓	TAS
"Jordan"	✓	✓			✓	SA
"Jules"			✓	✓		NSW
"Kelly"	✓		✓	✓	✓	TAS
"Morgan"	✓		✓	✓		NSW
"Reese"	✓		✓	✓	✓	NSW
"Sam"		✓		✓	✓	QLD
"Stevie"			✓			ACT
"Tatum"	✓		✓			ACT

of the time. Fifteen participants were interviewed. One of the 15 withdrew consent for the use of their data after the interview was completed due to apprehension about sharing their perspective. The data of 14 participants in total were analysed.

Table 2presents an overview of the participants' profiles with care taken to maintain anonymity. Ten (71%) held qualifications in a health profession although it may not have been their substantive position at the time of interview. Seven (50%) held qualifications in lactation consultancy. Participants' association with the BFHI in Australia was varied: eight (57%) were associated as a result of their substantive position of employment and six (43%) were members of BFHI associated Committees. Some participants held multiple roles, with eight (57%) being affiliated with an NGO or volunteer organisation as well as *BFHI Australia*. Geographically participants lived in one of six States and Territories in Australia with no representation from the Northern Territory or Western Australia.

Data analysis revealed three main themes influencing the BFHI and dissemination of *BFHI Australia*: "Rhetoric versus Reality"; "Human and Fiscal Resourcing" and, "Governance within Competing Agendas". Participants identified different perceptions of the issues relevant to the support of breastfeeding, due in part due to their diversity of backgrounds and association with the dissemination of *BFHI Australia*.

4.1. Rhetoric versus reality

A lack of congruence between public rhetoric and the reality of breastfeeding support as it is experienced at a variety of levels in Australia was revealed.

Statements supportive of breastfeeding have been included in national policy documents since the 1980s with the publication of a national strategy in 2010. The presence of these statements and policy were proposed as strong evidence of attention and support at the highest government level:

> *" . . . for a start there is one [a national breastfeeding policy document], which is actually really important because you can look at other areas and there's no statement . . . ." ("Tatum")*

The Commonwealth devolves national health policy to the States to be operationalised which limits its influence over service delivery. This situation was identified as a paradox of the Australian Constitution. The resulting funding tension between the Commonwealth and States has resulted in barriers to effective dissemination of *BFHI Australia* as revealed by one participant who reflected on what was perceived as an inability to actually 'make' state governments implement national policy:

> *"We would say, [the BFHI is] a state issue because they [the States] deal with the services on the ground. At a Commonwealth level, what teeth do we actually have to tell State governments what to do?" ("Tatum")*

Another participant proposed that the presence of national government rhetoric and accompanying lack of targeted government action signified tokenism for this particular public health message and a degree of ambivalence towards breastfeeding:

> *"They [the government] keep saying it's a good thing but they don't do anything about it. They don't actively promote it. I suppose they do on their website but it's like the usual lip service to things like, don't smoke, eat well, breastfeed but there's nothing put in there, Commonwealth government-wise to support it." ("Reese")*

Some participants considered that the lack of impetus for accreditation has directly resulted in the current inability to accurately determine the extent of BFHI implementation at an organisational level. This was reflected in mixed opinions expressed about *BFHI Australia's* influence and dissemination. Some participants revealed an optimistic view that government rhetoric had been a positive influence with a translation of evidence into practice occurring to better support women and their families:

> *"It's not as good as we'd like, but I think it has filtered through . . . even though we don't have that many hospitals overall which are Baby Friendly, the other hospitals mostly will be following the same sort of practices." ("Casey")*

Others expressed an opposite reality suggesting that only the BFHI elements that fitted with a facility's overall philosophy and those that were easier to put in place, were implemented. Participants revealed that the prevailing culture of the facility influences the intention to pursue accreditation:

> *"'Oh, we do this' [the BFHI]. But they don't do it properly. They might say, 'Oh well, we do this but . . . ' There's one Step that doesn't quite fit with everything that they want to do so they don't go down the track of being accredited." ("Jordan")*

While the *Ten Steps to Successful Breastfeeding* have been designed to allow for a paced implementation the BFHI identifies that a whole systems approach is required for ultimate adherence. At a local level several participants used the realities of the postnatal environment experienced by women in many organisations as an example of challenges in trying to implement BFHI practices within a fragmented system:

> *"A postnatal ward in a hospital is not the place to learn to breastfeed. We're trying to create it with BFHI and create this environment, but at the end of the day, it's a mad field. It's a cattle*

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yard. And it's no way to learn to get to know and [learn to] feed your new baby." ("Morgan")

Participants asserted that the lack of tangible commitment at government and organisational levels reinforces the perception of an unsupportive environment for women in both the hospital and community setting. They regarded the failure of the health system to fully endorse breastfeeding as contributing to the low duration rates and the emotional distress many women experience when their needs remain unmet:

"I think we let women down so much they finish up blaming themselves. They really should be angry with the system that's let them down, that hasn't given them the support." ("Drew")

"What's the point of telling women they should breastfeed if the institutions and the health professionals ensure that they can't succeed? All you do is add to the burden of misery they're going to feel." ("Charlie")

A critical perspective of the Commonwealth government's level of support was strongly evident with participants describing the government as allowing a 'watering down' of the BFHI at an organisational level, which has affected *BFHI Australia's* dissemination and resulted in women potentially experiencing significant disadvantage by being 'let down' by the system.

4.2. Fiscal and human resourcing

Adequate resourcing at all levels was repeatedly identified by participants as crucial to the support of breastfeeding, the BFHI and dissemination of *BFHI Australia*. Resourcing was classified into one of two categories: fiscal and human.

Diverging views were expressed regarding the adequacy or inadequacy of the financial support currently provided by the Commonwealth government. The provision of funding for select services was proposed by one participant as proof of a positive contribution:

"The government would argue that their investments in services around it [supporting breastfeeding] are substantial, such as the breastfeeding association, the helpline and all those sorts of things." ("Tatum")

In contrast to this view other participants identified a higher level of political will and funding was required to decrease the current burden on facilities and volunteers and bring Australia in line with other high achieving countries:

For smaller hospitals cost is a big inhibiting factor . . . there just isn't enough internal funding to pay for the project manager and staff education . . . . in countries where there's a high number of hospitals that are actually accredited, it's because the government has come in and said, you have to do this process, whether you like it or not." ("Stevie")

This suggests that implementation or adoption of the initiative would be strengthened by government backing. Participants also revealed that competition for Commonwealth backing and resourcing is fierce, highly political and most of the government's 'work' is about managing the cost to the system:

"So at the moment it's [the budget] actually about protecting the deficit and reducing the expenditure. So you're coming along with an idea that you're going to want to spend more money, well where is the government going to get money from or who do they take the money off to actually do that?" ("Tatum")

Identifying and providing adequate human resources was also revealed as beneficial to many aspects of the BFHI strategy in Australia. The volunteer cadre was identified as a human resource that value-adds to *BFHI Australia.* The contribution made by volunteers was described as crucial to its sustainability although undervalued. Participants highlighted the depth of commitment of breastfeeding advocates:

"There is a total dependence on volunteers and volunteer hours." ("Kelly")

"Assessing, it's a minimal amount of money, you don't do it for the money, you do it for the love of it really and because you believe in it." ("Drew")

Participants suggested that the external perception of *BFHI Australia* was an NGO that has a low profile and an inability to capitalise on available resource potentials. Fostering political alliances and developing relationships with the influential Australian National Safety and Quality Health Service Standards (NSQHS) organisation were revealed as valuable opportunities to explore in the future which may raise the profile of the BFHI and increase dissemination of *BFHI Australia*:

"I think the general public doesn't really know the difference between going to a Baby Friendly Hospital and not." ("Casey")

"If we could get the BFHI standards into the Hospital accreditation standards that would go a long way to being a stick rather than a carrot." ("Dale")

The Australian government acknowledges the importance of breastfeeding and the BFHI through policy documents. Intention contrasts with reality however. The government's willingness to incentivise the BFHI to increase dissemination appears to be negatively influenced by finite resources and competing priorities. Increasing advocacy activities may raise the profile of *BFHI Australia* and foster a political imperative for change.

4.3. Governance within competing agendas

The role of government is critical to the ongoing success of the BFHI in Australia according to all participants. Effective governance of *BFHI Australia* has been and continues to be central to its capacity for successful dissemination. Participants revealed the significant impact of competing agendas on the BFHI and *BFHI Australia*. At a national and state level Australian parliamentary processes create substantial barriers to the development of tangible supports for breastfeeding. The challenge of creating enough political empathy for breastfeeding strategies amongst short-term policymakers who do not appear to share the passion or endorse the potential health benefits of breastfeeding was highlighted by participants:

"It is a problem for Australia the frequency by which governments change and the lack of continuity around policy. It's quite hard for people to do it and people don't necessarily see the benefit around it . . . governments are about short term – governments are about re-election." ("Tatum")

"When the Health Ministry is seen as a poison[ed] chalice, a poor career move, where they see it as a step to something else, they're not going to do something that isn't on their particular list of what can get done in a limited time.)("Sam")

Participants identified that the presence of governance structures to ensure safety and quality in health care delivery could influence the way the BFHI has been interpreted in some Australian facilities. The dichotomy of disseminating a product that suits the needs of the health care system rather than women was highlighted. A participant expressed a concern that midwives might interact with women in less meaningful ways due to the competitive demands of the 'system':

"What we've done with BFHI, it appears, is interpret it in a fairly rigid way that means we don't offer women anything . . . We give the impression that there are rules that one must stick to. You can't blame the individual midwives. I mean some [rules] are really a bit over the top in different ways but it's the governance of the system." ("Morgan")

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Historically there was the perception of a fundamental difference in opinion amongst stakeholders regarding *BFHI Australia's* primary agenda: financial viability or advocacy activities. Participants revealed their perceptions of the challenges faced by all stakeholders to achieve consensus and its effect on the BFHI in Australia as a whole.

In 1995 UNICEF Australia was reluctant to continue its level of engagement with the BFHI due to competition for its scarce resources plus its own advocacy agenda which focussed on international aid programs. The rationale for decisions made and actions taken to try and secure its future at that time were discussed by several participants:

"It was seen as wise to find a player who would look after and govern Baby-Friendly. It would have folded because there was no doubt the incoming [UNICEF] Board were supportive of it but they didn't want to carry it on. It wasn't because they discounted the work; they [UNICEF] just didn't see it as part of their role. UNICEF didn't want to offend anyone so everybody was told that this [the tender process] was happening. But, in house, the preferred operator was midwives because they [UNICEF] saw a natural relationship and probably a better potential for getting it [the BFHI] to happen." ("Bailey")

A participant who had worked to implement the BFHI in Australia stated considerable time had been given to preparing a tender application for a consortium to become the governing body. That tender was ultimately unsuccessful as ACM was awarded BFHI governance. Another participant identified the ensuing 'collateral damage' had a detrimental effect on the BFHI's momentum and profile within the health system. Collateral damage described included tensions within *BFHI Australia's* volunteer committee (the National Steering Group — NSG) arising from UNICEF's apparent lack of trust in their ability to govern BFHI. A perception of competing ACM business and advocacy agendas was also disclosed. A number of participants further revealed a perception that the ACM was focussed on a cost recovery model management structure at the expense of being a strong advocate for the dissemination of *BFHI Australia*. For example participants perceived that by not appointing a full time manager the advocacy agenda of the Committee was undermined and ACM under resourced *BFHI Australia.* ACM's financial situation after it assumed governance of *BFHI Australia* in 1995 exacerbated the situation. However the positive breastfeeding advocacy role of ACM by not dismantling *BFHI Australia* despite financial pressure to do so was also acknowledged:

"When the ACM were given the tender they immediately said, 'Well, we're stopping all assessments and everything else' and then everything just died for two years. The amount of anger that was generated by all these people that were working towards becoming accredited, all the volunteer hours that people had been putting in, was just huge." ("Drew")

"There was this push for the [National Steering] Committee [NSG] to understand the College's position which was, it's [BFHI] costing us a lot of money and we need to change that situation . . . . the College was broke." ("Dale")

"The erratic-ness of the whole business seems to me to be about different personalities and different individuals leading, pushing or resisting. And until we can get past that then it's just different individuals and we go nowhere really, we keep batting our head against a brick wall." ("Kelly")

"Despite everything and despite it not being their core business they [the ACM] have kept it going. And I don't know whether anyone else would have managed to." ("Drew")

Participants revealed their perceptions of an apparent mismatch of agendas that appears to persist is an ongoing influence on governance and dissemination of *BFHI Australia.* All participants viewed the priorities for *BFHI Australia* through their own particular lens:

"Each of those stakeholders has very different agendas. The way that BFHI is being implemented in Australia is not about advocacy and a lot of the stakeholder groups are advocacy organisations." ("Stevie")

Stakeholders' agendas and governance structures have all exerted an influence at some time point on the actions of individuals and organisations. As a result barriers to *BFHI Australia's* dissemination have occurred through decreased political will and the presence of internal tensions within the organisation itself.

4.4. Moving forward

Participants were asked their opinion of the future in Australia for the BFHI and *BFHI Australia*. Three interrelated themes emerged: "The Environment"; "Leadership" and "Collaboration."

4.4.1. The environment

A politically sympathetic environment with active government involvement and tangible support was revealed as crucial to providing the impetus required for future expansion. A review of the programme was also identified as an opportunity to create a fresh image and strengthen the product:

"I want to see a directive from above, that all hospitals will become 'baby-friendly.'" ("Drew")

"BFHI needs a new image." ("Morgan")

4.4.2. Leadership

Participants were divided about whether *BFHI Australia* should stay under the current governance structure. Irrespective of where *BFHI Australia* sat, strong and effective leadership was identified as an essential requirement to drive a committee and secure agreement about desired outcomes:

"You're going to have to get people around the table and say, 'We can agree on this. There's a whole lot of things we can't necessarily agree on. But we can agree on this specific strategy and plan'." ("Jules")

4.4.3. Collaboration

Consensus and collaboration between key stakeholders was recognised as an effective strategy to increase capacity for BFHI uptake and to assist *BFHI Australia* to meet its aims. Proposed outcomes demonstrated the nature of participants' agendas, incorporating both increased political advocacy opportunities and sustained practice change:

"Stakeholders do have to be involved so that change can actually come to fruition. So, that over the next 10 years it [the BFHI] will actually look quite different to what it looks like now, and those organisations will all be intricately linked. Their resources will all refer to each other and we'll be referring to each other. For the mothers it's a done deal. The hospitals are helping them do this. The community organisations are helping do that. Those private advocacy organisations are helping them do that. It all fits together like a big jigsaw puzzle, and all they [mothers] have to do is – do it." ("Stevie")

Overall participants were of the opinion that the capacity of the BFHI to have a measurable positive effect in Australia will be increased with the synergistic influences of a strong political will, effective leadership and collaboration between key stakeholders.

5. Discussion

Australian researchers have previously investigated various aspects of the BFHI, for example measuring women's experiences

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of supportive practices, staff attitudes and systems barriers. This is the first study to gather a diverse range of participants from the health system, volunteer organisations and government to examine factors influencing the dissemination of the BFHI and *BFHI Australia*, its accreditation programme. All participants were supportive of the BFHI in principle but also critical of some aspects of its dissemination. The perceptions of *BFHI Australia* were also influenced by participants' organisation or association's lens: government, business or advocacy-based. The complexity of harnessing different agendas and creating synchronicity to achieve a common goal was seen as a limiting factor. This discussion of the findings of participants' interviews makes recommendations for future activities to support breastfeeding and a potential pathway for *BFHI Australia.*

The previously published document analysis that is an integral part of this case study[5] mapped the BFHI's early implementation period in Australia. The analysis of National policy reports and organisational archival documents provided an understanding of the Australian socio-political context for breastfeeding support around the time of the BFHI's introduction. Resourcing, culture, level and type of support and the dichotomy of business and advocacy activities played a significant role in *BFHI Australia's* formative period. The issues were shown to be interrelated with fewer enabling factors than barriers. The lack of Commonwealth persuasive effort also hampered early traction. Analysis of the findings from participant interviews in this study supports and builds on the document analysis. Issues identified in both analyses include: dissonance between political rhetoric and actual support; the positive influence of breastfeeding advocates in pursuing a breastfeeding culture in Australia; the barriers to momentum from inadequate resourcing and concerns about governance at all levels. The lack of congruence between stated and actual government support has been further highlighted as impacting on an individual level with women being 'let down' by the system.

The findings from the analysis of both the participants and documents reflect the experience of many other countries trying to disseminate the global programme into their national settings. The WHO *2nd Global Nutrition Policy Review 2017*[43] published the results of a survey sent to all 194 WHO Member States in 2016 that included questions on their implementation of the Baby-Friendly Hospital Initiative. The overall response rate was 60.3% (117 countries) with 66.6% of responders (78 countries) identifying they have an active programme. Some limitations may exist as data collection was by self-report. Nevertheless this document provides the most recent and comprehensive report on the global BFHI's current status.

"*Baby-friendly fatigue*" (p. 20) was a term used to describe the waning interest in and attention to BFHI in many countries, particularly around funding. Our findings support this concept, revealing that the long-term lack of fiscal resourcing for accreditation and re-accreditation has had a wide-ranging effect on many other barriers, particularly capacity building. According to the report approximately 18% of countries (including Australia) have hospitals pay for accreditation, although the cost varies widely. Significantly more countries receive government or aid agency funding. Whilst self-funding hospital accreditation could have a positive impact on sustainability, our findings reveal an increased disincentive for Australian hospitals exists, irrespective of size. The document analysis and key informant interviews also indicated that *BFHI Australia* is perceived as a vertical programme and having the standards integrated into national policy was identified as a way to decrease the bureaucratic burden and increase dissemination. The same idea was proposed by numerous other countries to help move BFHI from being a "*programme basically managed by passionate people*" (p. 25) to a requirement. Similar to our participants the report also recommends a revitalising of the initiative, with changes that ensure sustainability over time.

Our findings about the responsibility of governments to actively promote the BFHI rather than relying on rhetoric are also supported by robust international literature. A 2012 integrative review assessed 45 English-language articles to identify enabling factors or barriers to the implementation of the BFHI.[44] Similar to Australia the political will, resource commitment, leadership and collaboration exhibited at all levels of government and the health system served to influence adoption or act as a barrier. A 2015 systematic review and meta-analysis of 195 relevant articles[45] also stated a strong political will was required to scale up implementation strategies in combination with a multidimensional approach to breastfeeding interventions. The 2016 Lancet Series on Breastfeeding 2[4] performed multiple meta-analyses on the determinants of breastfeeding examining interventions to improve breastfeeding practices. The recommended action points included showing political will to: demonstrate that promoting breastfeeding has equal value to commodity-based interventions such as vaccines; regulate the breast-milk substitute industry; monitor breastfeeding trends and interventions and legislate that all maternity services adhere to BFHI.

The capacity to adopt BFHI practices is negatively affected by current maternity care service delivery. Participants revealed busy postnatal wards and fractured models of care are not conducive to supportive breastfeeding practices. Women are further disadvantaged when 'cherry picking' of 'baby-friendly' practices occurs to create a fit with an organisation's philosophy and or for its convenience. International and Australian literature confirms our findings. International literature cites money, time and a fractured model of service as barriers to providing high quality postnatal care.[46] Australian midwives have stated they have no time for BFHI practices,[33] with supportive interventions taking a back seat to time pressures and increased workload.[32]

The Australian Commonwealth government has recognised the importance of breastfeeding and the BFHI as an enabling factor through published policy statements.[18,47,48] Document analysis demonstrated that national breastfeeding statements are an example of 'soft' policy due to the absence of tangible incentives or measurable, time-based outcomes. The findings from the participant's interviews reinforce the view that this level of support is a significant barrier to achieving a 'breastfeeding culture' in Australia.

Analysis of participant's interviews also builds on the document analysis by examining further the complexities revealed when trying to combine divergent priorities within a single governance structure. A lack of synergy has been revealed at Commonwealth government, health system and organisational levels. Commonwealth and state funding for the BFHI is subject to the transitory, 3–4 yearly cycle of appointment of government and health ministers, with health system priorities driven by the need to comply with health and safety governance requirements. At an organisational level, multiple priorities may develop within a volunteer committee if the views of stakeholders' representative organisations are naturally divergent. The history of *BFHI Australia* contains an example of the tension that arises when competing priorities are unable to align. ACM has historically governed *BFHI Australia* using a cost recovery model. Any revenue generated by *BFHI Australia* accreditation assessments covers the outgoings associated with management, creating a cost neutral programme. Stakeholders representing aid agencies prioritise advocacy activities which aim to increase *BFHI Australia's* profile and dissemination across the country but may have financial implications. Communication between ACM and state/national BFHI Committee members has not always been optimal. The push–pull between the two agendas has previously created a distancing between

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committee members, affected governance and presented a fractured image of the programme. There is a need to develop a strong communication and strategic business plan that will expect *BFHI Australia* to make a small profit, allowing an increase in advocacy activities and creating a synergy between the two agendas.

This study reveals a potential future for the BFHI and its accreditation programme in Australia. Participants identified that wide ranging support and collaboration with key government and non-government stakeholders would help move the BFHI and accreditation programme forward and increase its potential. A supportive environment for women, national leadership and inter-professional collaboration are the foundations of the *Innocenti Declaration*,[7] which Australia is a signatory to but has not fully enacted. The Australian Commonwealth government missed an early opportunity to support the BFHI by not adopting the *Innocenti Declaration* into a measurable health policy and incentivising the States to implement practice change. Inter-professional and intersectorial collaboration is also recognised by international[4] and Australian[33] researchers as an enabling factor for BFHI uptake. Our final recommendation, a review of the current BFHI programme to ensure a robust process and determine relevance to the Australian setting is also supported by a previous Australian study.[34]

A strategy needs to be adopted to clearly determine the current state of support for breastfeeding in Australia that will also inform *BFHI Australia* activities. The World Breastfeeding Trends Initiative (WBTi)[49] can provide stakeholders and policy-makers with useful data to determine future policy and initiatives. The WBTi assists the main breastfeeding support agencies and organisations within a country to collaborate on assessing the strengths and weaknesses of the policies and programmes that currently exist to protect, promote and support optimal infant and young child feeding practices, including the BFHI. There are 15 indicators provided in the web-based tool with data quantified and a colour coded report produced. The process is repeated three to five yearly to track trends. To date 83 countries have completed the assessment (http://worldbreastfeedingtrends.org). For example, the United Kingdom has recently released their inaugural 'report card' with a lack of leadership and skilled consistent breastfeeding support identified as issues requiring urgent attention.

6. Strengths and limitations

The inclusion of a variety of participants who had in common an association with *BFHI Australia* provides a unique lens to investigate the implementation and subsequent development of a complex global programme into a national setting. Deeper understanding of the issues uncovered through the interviews was achieved with thematic analysis.[38] While the Australian context is distinctive the similarities shared with other high income nations have been identified and examined. The perceptions, experiences and opinions of participants apply primarily to Australia however other researchers may find the results resonate with their own findings. The findings from this study add to the general body of midwifery knowledge and increase the understanding of challenges to disseminating global programmes in national settings. The understanding of multilevel factors that influence the translation of knowledge into practice is enhanced. The findings may also offer other midwifery research opportunities.

Limitations occur in all studies. In this doctoral study the data were coded and themes identified by the first author. The supervisory panel were given samples of coding and explanations of the coding process for discussion. This approach provided consistency in method but did not allow for multiple perspectives from a variety of people with differing expertise. The first author has worked extensively in the area and has a broad base of professional colleagues. Potential bias towards data selection and decreased objectivity due to any collegial relationships is acknowledged. Every effort was made to include the greatest diversity of participants possible however to ensure a balance of viewpoints was obtained. As a number of potential participants chose not to participate some statements could not be verified and potential bias may also be present here.

7. Conclusion and recommendations

A diverse group of participants have revealed that *BFHI Australia's* dissemination has been hampered by multi-level systems, philosophical and governance issues however a way forward is possible given key needs can be met. The lack of tangible commitment and capacity building for the BFHI lends weight to the perception that the Australian health system does not provide support for childbearing women to its fullest extent possible. *BFHI Australia's* dissemination was also hampered by historical internal tension and long-term challenges to effective governance which resulted from the emergence of competitive forces between the pursuit of advocacy activities and financial viability. Stakeholders naturally view priorities using their own 'lens': government, business or advocacy-based. The capacity to align mismatched agendas and achieve a common goal therefore remains an ongoing challenge and influence on the strategy as a whole and *BFHI Australia's* dissemination in particular.

Despite being critical of some aspects an overall positive perception of the BFHI's potential exists. A supportive environment for women will be demonstrated through increased political will, inter-professional collaboration and adequate resourcing for the BFHI. These factors are crucial to any future expansion of *BFHI Australia*. A comprehensive review of the programme to determine currency is also an opportunity to revitalise the initiative.

Drawing on the findings of this study and those of previous research further areas of research could include mapping the extent of BFHI implementation at the hospital level to reveal a clear picture of its uptake in Australia and inform future research opportunities. In line with participant's recommendations a review of *BFHI Australia's* processes and dissemination is also timely.

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