Conceptualising Online Literacies

An investigation into Thai EFL students' Web-based research practices

Sirinut Sawatdeenarunat

A thesis submitted in fulfilment
of the requirements for the degree of
Doctor of Philosophy

Faculty of Arts and Social Sciences
University of Technology, Sydney
April 2014

ABSTRACT

The use of Web as a source of information has commonly been integrated into Thai English classrooms to enhance students' learning and expose them to "real world" language. Unfortunately, this important issue has never been systematically addressed through detailed and sustained research. This means that teachers of English as a Foreign Language do not have an effective research base from which the tools essential to support the development of the necessary literacies in the digital age can be developed.

The purpose of this study is to gain an in-depth understanding of the literacy practices that need to be developed in order to make effective use of the Web as a source of information. Drawing on a Multiliteracies framework, this study examines the kind of practices that were employed by Thai EFL students in the completion of language tasks that required them to use Web-based resources. The rich data gathered on the common practices and challenges that students faced in using Web-based resources provides insights into the skills and knowledge essential to the development of online literacies.

The research that forms the basis of this thesis is set in a Thai university and the participants are undergraduate students majoring in TESOL in their first year of study. The data was collected using two types of verbal protocols. A Think-aloud protocol was used to collect the practices that the students engaged in while completing Web-based research tasks, while stimulated recall was used to collect retrospective recalls of the reasoning behind the practices. These tools allowed the researcher to gather rich data on the spot without having to rely on participants' memories.

Five phases of online literacy practices were identified. Consistent with online literacy studies in different contexts, three main skills were found necessary for the task of online research include the ability to search and locate information,

the ability to evaluate online information and the ability to effectively use retrieved information for the intended purposes. Significant findings from the study relate to the direct relationship between the practices employed in different phases. These results showed that the lack of skills hindering the completion of one phase was found to have an impact on the outcomes of other phases and the timing and quality of the overall task completion. Thus, attending to the development of discrete skills is insufficient to the development of online literacies. Other important findings highlight that the students relied heavily on various compensatory strategies in order to make up for skills and knowledge gaps that were hindering their progress. The limited English proficiency, the sheer amount of information on the WWW and the lack of ease experienced by many when reading from a computer screen are some of the reasons given for the use of compensatory strategies. Nevertheless, all of strategies deployed by students in this way were transferred from the printed environment. It is not surprising that many of these strategies were found insufficient to the job of assisting the students in sifting through a huge amounts of information that awaits them in the online spaces they enter when the commence their searches.

Such results are interpreted as highlighting the need for the conscious and explicit development of online literacy practices specific for EFL contexts. The data collected from students working on online tasks provided the foundation for the conceptualisation of effective practices that is taken up in the latter part of the thesis. It is necessary for EFL teachers to acquire a comprehensive understanding of effective literacy practices within online environment in order to support the students' development of those required literacies. This study has the potential to inform pedagogies specific to the context of ELT in Thailand and EFL teaching in similar contexts. These implications will help EFL teachers to develop a clear understanding of the online practices that occur outside classrooms in order to support students' learning needs in the online environment.

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 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.

Sirinut Sawatdeenarunat
April 2014

PUBLICATION

Sawatdeenarunat, S. (2014). Values of verbal protocols in an investigation of EFL students researching the Web. *The International Journal of Technologies in Learning*. *20*(2), 51-61.

ACKNOWLEDGEMENTS

This thesis would not have been possible without the continuous support and encouragement of many people. First and foremost, I would like to express my deepest gratitude to my supervisor, Associate Professor Liam Morgan for his encouragement, patience, intellectual and emotional support throughout my PhD journey. Thank you for your guidance, constructive feedback and invaluable advice; your kind words carried me through many difficult times. Your support throughout my years at UTS has made my experience as a doctoral student pleasant and memorable. I could not ask for a better supervisor.

I am deeply grateful to the lecturer of the 'English Reading Strategies' course for allowing me to observe her class. I am also thankful to all the participants of the study for giving their time, outside of class, to participate in my study. Without their kindness, this study would have been far from possible.

My gratitude also goes to the Australian Government for providing me with the Endeavour Postgraduate Award. The four-year fully funded scholarship has helped me achieve my dream.

I am also grateful to friends and colleagues in the Language Studies department at UTS for valuable discussions, encouragement, moral and intellectual support throughout the four years. Thank you Maria, Suphinya, Margarita, Shaila, Lucy, Julie, Kelly, and Daniel for your companionship and for making lunchtimes in the office full of meaningful conversations. My thanks also go to Ajarn Ross Forman for helpful discussions around the issue of EFL in Thailand.

The thesis would not have been completed without the help of many good friends. Thank you Dr. Kenny Cheong for your patience in formatting my entire thesis and P'Ball, Woranon Sitajalabhorn for sharing the literature and meaningful discussions around the issue of second language writing. My special thanks also go to the Thai community at UTS for supporting me when my spirits were low. Khob khun ka P'Ping (Dr. Sutinee Sinutok), P'Pew (Supitcha Supansomboon) and P'Ball (Ponlachart Chotikarn) for your immense support, I could not have done it without your endless encouragement. I am also grateful to Ajarn Tony Moon for going out of his way to support me academically and for mentoring me in matters relating to everyday life.

I would also like to thank Andrew Liew for believing in me and pushing me forward especially when I did not think I could. Thank you for your moral and intellectual support throughout this journey; your passion in Science always amazes me and inspires me to become a better researcher. Thank you for proofreading the many drafts of my paper and helping me win the Three Minute Thesis competition ;-)

Last but not least, I am most indebted to my family: my parents, sister and brother for their endless support in whichever path I took and thank you for always encouraging me to follow my dreams. Special thanks to my little sister, Sirikul, not only for her encouraging messages but also for many meaningful discussions around the issue of EFL teaching in Thailand. Finally, I also wish to thank my extended family and my friends in Thailand for being my number one supporter; I hope I make you guys proud. Thank you again for supporting me through this journey, it would not have been possible without you all.

TABLE OF CONTENTS

ABSTRACT I

CERTIFICATE OF ORIGINAL AUTHORSHIP III

PUBLICATION IV

ACKNOWLEDGEMENTS V

TABLE OF CONTENTS VII

LIST OF FIGURES AND TABLES X

Chapter 1. INTRODUCTION 1

1.1 Background to the study 1
1.2 Research rationale 3
1.3 Purpose of the study 5
1.4 Significance of the study 6
1.5 Structure of this thesis 8

Chapter 2. REVIEW OF THE LITERATURE 11

2.1 Introduction 11
2.2 English Language Teaching in Thailand 14
2.2.1 The role of English in Thailand 14
2.2.2 Integration of Internet in Thai Education 18
2.3 Literacy in the digital age 22
2.3.1 New literacies as the theoretical framework 23
2.3.2 Literacy learning in the 21st century classroom 27
2.4 Web as a source of information in ELT classrooms 29
2.4.1 Affordances and hindrances 32
2.5 A review of recent empirical studies related to the use of the Web as an information source 40
2.5.1 Search 43
2.5.2 Evaluate 57
2.5.3 Communicate 60
2.5.4 Teaching pedagogies addressing the 21st century skills 66
2.6 Conclusion 67

Chapter 3. METHODOLOGY 71

3.1 Introduction 71
3.2 Research approach 72
3.3 Participants and setting 76
3.4 Research design 78
3.4.1 Nature of the data 78
3.4.2 Data collection procedures 79
3.5 Data analysis 95
3.5.1 Data Analysis Part I: Class observations and students' diaries 98
3.5.2 Data Analysis Part II: Think-aloud protocols and stimulated recalls 103
3.6 Conclusion 119
Chapter 4. FINDINGS 121
4.1 Introduction 121
4.2 Five phases of online literacy practices 124
4.2.1 Phase 1 of the Online Literacy Practices Cycle: Setting the search goal 133
4.2.2 Phase 2 of the Online Literacy Practices Cycle: Generating search terms 149
4.2.3 Phase 3 of the Online Literacy Practices Cycle: Locating relevant information 167
4.2.4 Phase 4 of the Online Literacy Practices Cycle : Evaluating the reliability and accuracy of information retrieved online 197
4.2.5 Phase 5 of the Online Literacy Practices Cycle: Using online information to respond to the tasks 211
4.3 Conclusion 232
Chapter 5. DISCUSSION 234
5.1 Introduction 234
5.2 Searching for relevant information 239
5.2.1 The ability to navigate the Web to locate relevant information 240
5.2.2 The ability to read information on the Web 251
5.2.3 The ability to employ compensatory strategies to search for information in a Web-based environment 259
5.3 Evaluating information retrieved online 267
5.3.1 Contradictions between knowledge and practices 267
5.3.2 Strategies used to evaluate Internet sources 269
5.3.3 The skills and knowledge essential for evaluating information retrieved online 270
5.4 Using online information for intended purposes 273
5.4.1 Ability to identify useful relevant information 274
5.4.2 Ability to produce responses suitable for the task 276
5.5 Conclusion 278

Chapter 6. CONCLUSION 280

6.1 Introduction 280
6.2 Significance of the research 283
6.2.1 Implication of the study for current policy and teaching practice 283
6.2.2 Implications for research methodology 288
6.3 Limitations of the study 289
6.4 Recommendations for future research 289
6.5 Concluding statements 291

REFERENCES 292

APPENDICES 303

Appendix 1 Consent forms 303
Appendix 2 Internet Usage Survey 308
Appendix 3 Demonstration video of think-aloud protocol 313
Appendix 4 Sample video of think-aloud protocol 314
Appendix 5 Verbal protocol data (AM Task 2) 315
Appendix 6 Verbal protocol data (MW Task 2) 316
Appendix 7 Verbal protocol data (TY Task 2) 317
Unable to find relevant information with existing terms 317
Appendix 8 Verbal protocol data (MY Task 2) 318
Appendix 9 Data from classroom observation 319
Appendix 10 Sample of students' diary entries 322
Appendix 11 Texts from the third paragraph of 'Why Chocolate for Valentine's Day' Webpage 325
Appendix 12 Texts from the fifth paragraph of 'Why Chocolate for Valentine's Day' Webpage 326
Appendix 13 NT's written response to Task 1 327

LIST OF FIGURES AND TABLES

Figures

Figure 4.1 The five recursive phases of Online Literacy Practices Cycle 128
Figure 4.2 Instruction for Task 1 130
Figure 4.3 Instruction for Task 2 131
Figure 4.4 Phase 1 of the Online Literacy Practices Cycle 133
Figure 4.5 Screenshot: Usage of Images function to set initial search goal ... 142
Figure 4.6 Screenshot: Usage of Translate function to set initial search goal 143
Figure 4.7 Phase 2 of the Online Literacy Practices Cycle 149
Figure 4.8 Screenshot: Google search result page generated by search term 'valentine's day' 160
Figure 4.9 Screenshot: Searches related to facial toner 163
Figure 4.10 Phase 3 of the Online Literacy Practices Cycle 167
Figure 4.11 Screenshot: A common search results page 170
Figure 4.12 Screenshot: Wikipedia-History of chocolate 192
Figure 4.13 Screenshot: Wikipedia-History of chocolate (cont.) 193
Figure 4.14 Screenshot: In-text ads on 'What is Skin Toner?' Webpage 195
Figure 4.15 Phase 4 of the Online Literacy Practices Cycle 197
Figure 4.16 Screenshot: Advertisements on informational Website 208
Figure 4.17 Phase 5 of the Online Literacy Practices Cycle 211
Figure 4.18 MY's response to Task 1 220
Figure 4.19 Screenshot: Webpage window and task document window opened at the same time 229

Tables

Table 3.1 Data collection sources 80
Table 3.2 Students' Internet experience 89
Table 3.3 Summary of data subjected to analysis 98
Table 3.4 Sample of data from class observation on 27 January 2011 101

Table 3.5 Sample of data from students' responses in diary entry 102
Table 3.6 Sample of coding scheme from Open Coding 106
Table 3.7 Coding scheme from open coding 107
Table 3.8 A Sample of common pattern of practices 108
Table 3.9 Sample of main and sub-themes 110
Table 3.10 A comparison between Coiro's Phase 1 and the themes from this study 111
Table 3.11 A comparison between Coiro's Phase 2 and the themes from this study 112
Table 3.12 A comparison between Coiro's Phase 3 and the themes from this study 114
Table 3.13 A comparison between Coiro's Phase 4 and the themes from this study 114
Table 3.14 A comparison between Coiro's Phase 5 and Phase 6 and the themes from this study 115
Table 3.15 Revised coding scheme 119
Table 4.1 The data sets that inform the findings of this study 124
Table 4.2 Initial search goal from Task 1 and Task 2 136
Table 4.3 Verbal protocol: key questions to set initial search goal 139
Table 4.4 Verbal protocol: Interpretation of task to set initial search goal 140
Table 4.5 Verbal protocol: key questions to modify search goal 146
Table 4.6 Verbal protocol: differences between search goal and search terms 151
Table 4.7 Examples of discrete search terms (Task 1) 153
Table 4.8 Examples of discrete search terms (Task 2) 153
Table 4.9 Examples of natural language search terms 154
Table 4.10 Differences between initial search goals and initial search terms 155
Table 4.11 Initial search terms and verbal protocol data (Task 1) 156
Table 4.12 Various approaches in generating initial search terms (Task 2) ... 157
Table 4.13 A comparison between initial and modified search terms (Task 1) 162
Table 4.14 Verbal protocol: challenges in generating search terms 165

Table 4.15 Verbal protocol: select hyperlinks with identical wording to search terms 171
Table 4.16 Different levels of copy and paste approach 216
Table 4.17 Comparison between original texts and KM's response to 218
Table 4.18 Texts created using patchwriting approach 220
Table 4.19 A comparison between original texts and KW's response using patchwriting approach 222
Table 4.20 A comparison between original texts and NT's response to Task 1 223