The Effects of Informal Mentoring on Adolescent Development

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Certificate of Authorship/Originality

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.

Signature of Candidate

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Abstract

Teens growing up through the stormy adolescent years have found refuge in adults who have been available to give guidance and practical help to them. Previous research has demonstrated the positive effects of formal mentoring on various areas of adolescent growth. Informal or natural mentoring relationships which have been in operation for centuries have received less attention.

The present study investigates the impact of informal mentoring on adolescent development at an international school in Hong Kong by using both a quantitative and qualitative approach. The research questions included whether or not growth in adolescents correlates with having experienced informal mentoring relationships, and if so, which areas of adolescent growth are affected. Additionally, the processes, qualities, and contents of informal mentoring that makes it work are explored. Participants (n = 163, aged around 18) self-selected into groups ranging from 'much mentored' to 'not mentored'. The variables representing positive growth were peer relations and parent relations, measured by the Inventory of Parent and Peer Attachment (IPPA), perception of scholastic competence measured by the Self-Perception Profile for Adolescents (SPPA), actual academic achievement, and global self worth also measured by the SPPA. Descriptive data on the development and nurturing of mentoring relationships were collected through a questionnaire completed by students and extensive interviews conducted with seven participants.

Correlations were found between having experienced informal mentoring and positive relationships with parents, while no significant differences were found for the other variables. Teenagers who were mentored had better relationships with their parents as they demonstrated higher attachments to mother and father, less alienation from mother and better communication with both parents. This study confirmed that informal mentoring makes a positive difference in the development of young people. Most of the participants were able to access one or more informal mentors through their natural network, and both the adult and youth were responsible for starting and developing the relationship. Informal mentors, including parents, aunts and teachers, helped teens in various areas of growth. Findings of the study support some of the existing theories on key mentoring processes including empathy, authenticity, instrumental mentoring, cognitive development and other interrelated processes proposed by researchers such as Rhodes, Karcher and Spencer.

Implications for youth, adults, and program policies were explored. This study also began to discuss the relationship between Chinese (Asian) culture and the processes of informal mentoring, introducing further opportunities for research on culture and mentoring.

Chapter 1

Introduction

Introduction

This study investigates the impact of informal mentoring on adolescent development at an international school in Hong Kong by using both a quantitative and qualitative approach. Teens growing up through the stormy adolescent years may find refuge in adults who are available to give guidance and practical help to them. Mentoring programs to develop formal and structured mentoring relationships between an adult and a child/student have been of great interest to both scholars and policy-makers in recent years in the United States, Great Britain, and Australia (Dawes & Dawes, 2005; Gibson & Jefferson, 2006; Hansen, 2007; Lawson, 1997; Philip, 2003; Rhodes & Lowe, 2009). Previous research has demonstrated the positive effects of formal mentoring on various areas of adolescent growth. In contrast, the development and effects of informal mentoring relationships which have existed for centuries have received less attention. The present research studied the correlations of mentoring relationships developed informally in natural settings and adolescent development, among high school students of an international school in Hong Kong.

Background

Interest in this topic was initially based on a personal impression developed from repeated observations in the natural settings of school and community environments. As a counsellor to people ranging from middle school (secondary school) students (aged 11 to 19) to postgraduate adults for many years in Canada, the United States, and Hong Kong, I have noted that young people who achieve their potentials and their goals did not appear to reach their success by individual factors (such as effort and intelligence) and peer support alone. Numerous young people had friends and tried hard to achieve, but many of them did not reach their goals or ended up working under their potential. Frustrated, they became at risk of negative behavior and unconstructive living.

Students with severe or multiple difficulties, including academic failure, behavior/conduct issues, emotional instability, in my experience, often share a common characteristic. From my observations, it is the lack of a supportive out-of-school or home environment. Connection with, care and guidance of a significant adult is missing. By contrast, I have noted that students and young adults who achieve or are stable in their growth often have an older friend, a teacher, a youth pastor, an aunt, or an uncle who cares about them. Even more significantly, students having difficulties in various areas of development become more 'stable' after becoming connected with one or more adults who are willing to lend relevant help to them. Therefore, the personal impression developed from personal observation and informal knowledge of best practice and research findings was that young people's achievements and growth are correlated to having received support and guidance from one or more significant adults. This impression formed the impetus for the research reported in this thesis.

A Global Concern

With urban migration of population, shifting marital patterns, overcrowded schools, and loss of community cohesiveness, limited adult guidance and support is available to the developing adolescent (Rhodes, 2002). Myriad community programs have been developed in the past 20 years intentionally pairing young people with adults in structured mentoring relationships (Casey, 2000; Karcher, 2008; Karcher & Lindwall, 2003; Lawson, 1997; Lerner et al., 2001).

The effects of mentoring seem apparent for at risk youth. For example, Keating, Tomishima, Foster and Alessandri (2002) examined an intensive mentoring program for youth deemed at risk of juvenile delinquency or mental illness. Pre-intervention and post-intervention tests were given to assess changes from being involved in a structured mentoring program. Significant reduction in problematic behaviors for the intervention group was found.

Moreover, in recent years, a number of community programs in the United States were thoroughly evaluated and meta-analyses were implemented, examining all the data collected, to determine the effects of mentoring on adolescents (Dubois, Holloway, Valentine, Cooper, 2002; Grossman and Rhodes, 2002; Herrera, Grossman, Kauh, Feldman & McMaken, 2007; Jekielek, Moore, Hair, 2002). These included Big

Brothers/Big Sisters, The Buddy System, Building Essential Life Options Through New Goals (BELONG), Career Beginnings, Campus Partners in Learning (CPIL), and Hospital Youth Mentoring (HYM). It was found that youth participating in programmed mentoring relationships improved on some education measures such as less likely to fail Math and higher perceived scholastic competence than students not participating in a mentoring program. Improvement in GPA (grade point average) with one study indicating modest gains in GPA overtime and others not finding and significant difference between mentored and non mentored groups. Mentoring participants also developed healthier and safer behaviors such as being less likely to initiate drug use and reduced commitment of misdemeanors or felonies. Mentoring programs on socio-emotional well-being had mixed outcomes. Some participants had a better sense of well-being and greater sense of self control while improvements in self-perception and self-confidence were not significantly apparent among mentored young people. In studying the linkages between mentoring and academic success, Rhodes, Grossman and Resch (2000) determined that mentoring was directly correlated to improvements in parental relationships, reductions in unexcused absences and improvement in perceived scholastic competence.

The Hong Kong Context

Not unlike many cosmopolitan cities in the world in recent years, Hong Kong has suffered from a fluctuating economy related to world events as well as local political changes and commercial crises. The already exceptionally long hours that Hong Kong people work have become longer, in attempts to make up for a shortfall in income one job usually brings. Shops stay open longer, office people extend their work hours in hope of getting more work done that may enhance business (Au, Li, & Ng, 2005). As parents work more, even less of their time and energy are available to children. The role of the parent as a major influence in the growth of the often tumultuous years of adolescents is further weakened. Yet one of the key characteristics of positive youth development is connection with adults. The need for one or more significant adults to help adolescents make the connections through modeling, teaching skills, or simply supporting and guiding has become increasingly apparent and urgent (Bennetts, 2003; Lerner & Steinberg, 2004, 2009).

At the Hong Kong International School

Students in the Hong Kong International School (HKIS) are typically 'global citizens' living in Hong Kong, temporarily. Over 70% of the students are of Asian heritage with Chinese (being in majority), followed by Koreans and Japanese. The remaining 30% Caucasians are North Americans or Europeans. All students are English-speaking. At HKIS, the practice of engaging in informal mentoring is commonplace. Students are encouraged to connect with their grade level deans/counselors, teachers, coaches, and other adults in the school community. Informal opportunities are available including self-referred counseling, seeking out teachers for help.

Another nurturing ground for the formation of mentoring relationships is the homeroom system which places students in a group that meets every day for a short period of time. Homeroom time is a time away from academic work. Students can play games in the homeroom, join activities or discussions led by their teacher or fellow students, read, or talk with their teacher or peers during this period. Thus, students have a variety of opportunities to connect and form mentor-mentee relationships with various adults in the school community. It is now timely to investigate such informal mentoring relationships as a means of improving positive development in adolescents.

The Research Questions

In this study, the effects of naturally formed mentoring relationships (informal mentoring) on adolescent development (high school students) were examined. Research questions were as follows.

Research Question 1:

Is positive growth in adolescents correlated with having experienced informal mentoring relationships?

a. If so, which areas of adolescent growth are affected?

Research Question 2:

How are informal mentoring relationships formed, developed, and maintained?

a. who are the informal mentors?

b. what makes the mentoring relationship work well?

Definitions

For the reported study, the key terms are defined as follows. The informal mentor is the significant adult in the life of the adolescent --- the uncle, aunt, tutor, teacher, counselor, youth group leader, or parent --- the person who achieves a one-to-one developmental relationship with a learner, and one whom the learner identifies as having enabled personal growth to take place (Bennetts, 2003). Aunts and uncles are common for young people in Hong Kong, as opposed to mainland China because there is no one-child policy in Hong Kong. Even with the one-child policy, aunts and uncles are common as the aunts and uncles in their 40s and 50s were not affected by the one-child policy. The mentees in the present study were grade 12 students in their late adolescence, about to embark on the next stage of life, college studies and/or independent living. Adolescent development and growth in this study are represented in four areas: academic competence (perceived and actual), peer relationship, parental relationship, and self worth.

Informal mentoring refers to mentoring relationships that develop in the natural setting without intervention from an organized third party. Other terms used for these relationships are ‘traditional mentoring’ or ‘natural mentoring’, similar to relationships that have been in place throughout various cultures and ages. For example, in Homer’s Odyssey, Ulysses entrusted the education and care of his son to his wise friend, Mentor, before he went on his ten-year journey (Comer, 1989). As early as 2300 B.C., Eastern traditions have had the concept of ‘master’ or ‘teacher’ passing on martial art skills or the royal throne through apprenticeship or mentorship (Huang & Lynch, 1995). Further

discussion of these terms is reported in the literature review in Chapter 2. In this study, the term 'informal mentoring' is used.

Method

The present study adopted a Case Study method, focusing on the graduating class of 2005 at the Hong Kong International School. Both quantitative and qualitative approaches were employed in data collection and data analyses. To answer the first research question on the correlation between informal mentoring and adolescent growth, a quantitative approach was used. Correlations were investigated through statistical tests (*t*-tests, ANOVAs) for significant differences from numerical data.

The second set of research questions focuses on the processes and experiences of informal mentoring. To bring insights to these questions, a qualitative approach in which descriptive data were collected regarding the mentoring relationships was employed. The combination of the two approaches in this study permitted a more comprehensive exploration and understanding of the results and related issues. While the empirical data provided for the discovery of any correlations, the descriptive data informed the ‘why’ and ‘how’ of the results.

The Participants

In all, 163 grade 12 students (aged 16 to 18) about to graduate from the Hong Kong International School completed one questionnaire that contained two instruments and open ended questions on mentoring (see appendices C, D, and E). Participants were asked to reflect on a statement/question similar to that used in Christine Bennetts’ (2003) study: “There have been one or more adults most responsible for helping my potential to develop most fully.” Thus, students selected the number that best reflected their mentoring status. Numbers ranged from 1 to 5 (5 being ‘very much mentored’ and 1

being ‘not at all mentored’). How much students were mentored was therefore the independent variable.

Data Collection

The dependent variables were four selected variables already studied in previous research (Jekielek et al., 2002; Rhodes et al., 2002) to reflect various areas of adolescent growth. Positive relationships with peers and parents had been considered as indicators of social and emotional development and well being (Jekielek et al., 2002). The first and second chosen variables were therefore peer relationship and parent relationship measured by the Parent and Peer Attachment (IPPA, Armsden & Greenberg, 1987).

The third variable was academic achievement measured by a scholastic competence (confidence in school work) scale by the Self-Perception Profile for Adolescents by Harter (1988) along with the actual grade point average (GPA), representing actual academic achievement of the student.

The last variable, self worth was the youth’s belief in his/her own competence, sense of belonging, and value. Self worth represented growth beyond social and academics, but development in one’s own sufficiency and worth. Global self worth was also measured by Harter’s Self-Perception Profile (1988). Description of these instruments and rationale for usage in this study are detailed in Chapter Three.

Qualitative Data

In addition to quantitative data, qualitative data were collected through the same questionnaire regarding ways in which the mentoring relationships were formed and nurtured and in what ways the mentors had helped the student. As students were already completing two instruments, the number of qualitative questions was kept to a minimum and students provided their individual responses in writing. Examples of qualitative questions were ‘how did the mentoring relationship begin?’, ‘how has your mentor helped you?’ ‘what makes the mentoring relationship continue?’ (see Appendix E for the full questionnaire).

The second part of the qualitative data involved interviews with seven students individually. As in the Bennetts study (2003), students were asked to reflect on and describe in detail how the relationships were developed and nurtured. The interview questions allowed the interviewee to explore in depth and to talk freely about the mentoring relationship(s) he/she experienced. There were nine probing questions. Some examples of the questions are "how frequently did you and your mentor meet?" and "about what things were you mentored?" (see Appendix F for the full interview guide).

Data Analyses

Tests for significant differences and comparisons were performed on the quantitative data. Students were grouped according to the choices they made on the Likert scale from '1' being 'not a all mentored' to '5' being 'very much mentored.' Students choosing '1' were placed into Group 1, and so on.

The descriptive data from the questionnaire were recorded and organized on a spreadsheet. Two readers, the researcher and one other researcher unassociated with the present research, studied the descriptive data noting emerging themes, trends, and repeated statements or ideas. The second part of the qualitative data collected through interviews contained rich data and anecdotal comments that serve as cases to illustrate main themes and trends.

Assumptions and Limitation

The study's questionnaire and instruments were given to all members of the graduating class present on the day of research. The total number of completed questionnaires was 163, yielding a sample size of over 87% of the graduating class. While the results from the study should be limited to the sample only, they were nevertheless consistent with findings from other research that drew from large samples (Dubois & Silverthorn, 2005; Rhodes et al., 2000). The similar results lend support to the potential generalizability of the effects of informal mentoring. The international nature of the sample (to be

discussed in detail in later chapters) allowed considerations for findings to be applicable across ethnic groups, thus widening the impact of this study. Data gathering methods were appropriate to collect reliable data as instruments tested for reliability were used for quantitative data collection and questions specifically developed for the research questions were created and tested to collect the descriptive data. In the data collection process, steps were taken to ensure privacy of participants, confidentiality of answers and freedom to respond truthfully. The nature of the questions implied no one correct answer. It was assumed that the teenagers answered honestly.

The present study did not attempt to investigate a large sample that would have included perhaps many more international schools or local schools. The small sample based on one international school was assumed to be a representative group. However, while results could be somewhat generalizable to teens outside of the Hong Kong International School, teens from schools in stark contrast with HKIS in terms of economic status and social background could yield different results because of effects from these differences. Another limitation of the study was that in-depth interviews were conducted with seven students only, rather than with every one of the participants. Selection of interviewees was by student response to the invitation to participate in the interview, and student availability. Detailed one-on-one interviews of all respondents were not possible in research of this size. The in-depth interviews conducted in the present study served as case studies on their experiences on the development and nurturing of the mentoring relationships.

Significance of the Study

The present study is among a small number to research connections between informal mentoring and adolescent growth. Much previous research has demonstrated the positive effects of *formal* mentoring on various areas of adolescent growth. The development and effects of *informal* mentoring relationships have begun to receive attention by researchers in more recent years. In the US, UK, and Australia, while

government efforts and funding are supporting structured mentoring as a solution for struggling adolescents (Bennetts, 2003; Jekielek et al., 2002; Lemmon, 2005), informal mentorships have yet to be well understood, researched, and enhanced (Bennetts, 2003; Rhodes et al., 2002; Spencer, 2006). Additionally, what is the process of mentoring, and what makes it work? As Bennetts has asserted, very little is known about the age old helping strategy of informal mentoring.

A study by Dubois and Silverthorn (2005), using quantitative data alone, did find evidence for positive effects from informal mentoring. The present study adds to such research by combining quantitative and qualitative studies in which the qualitative findings can enrich and explain the quantitative findings on the topic of informal mentoring.

The present study is one of the first to be conducted in Hong Kong, China, with a sample from a population of different background from the US or western nations. This study opens up the discussion on the relationship between Chinese (Asian) culture and the processes of mentoring, introducing further opportunities for research on culture and mentoring. Data and findings from this study add new dimensions and applications to knowledge and studies of informal mentoring and mentoring in general.

Furthermore, a significance and strength of the present study is its international school context. Little research has been done with students in such schools before. While a limitation is that international school students may not be typical of all adolescents in Hong Kong, these students may in some ways represent the increasingly global and multicultural generation of youth across wealthy nations. In addition to the scholarly significance outlined above, the present study also hopes to be of practical significance, by pointing toward recommendations for both young people and adults about how to establish a successful informal mentoring relationship.

Overview of the Thesis

This chapter has provided an introduction to the research reported in this thesis. The next chapter will review the research literature on adolescent growth and mentoring, outlining the recent research on informal mentoring and theoretical frameworks on the processes of mentoring researchers developed to date. Chapter 3 provides details on the methods and the rationale for their usage in the present study. The selection of instruments, the development of the questionnaire and questions for the case studies, the processes of data collection, and the analyses of the data are described and discussed. Chapter 4 outlines the results obtained from both the quantitative and qualitative sections of this study. Outcomes from statistical analyses and thematic analyses are presented and discussed. Results from this study are discussed in relation to existing theoretical frameworks on mentoring. Chapter 5 concludes the thesis by highlighting the relevance of the present study, outlining its contribution to the knowledge base on informal mentoring, the unique elements of the study, its limitations, recommendation on programs and policies, and the opportunities for further research. The final chapter also emphasizes the practical implications of the study, outlining how informal mentoring can become more effective, how adolescents can gain from such a relationship, and how adults can provide the much needed guidance and support to teens, one at a time.

Chapter 2

Literature Review

Introduction

The research for this thesis was influenced by literature in two fields: adolescent growth and mentoring. The first part of this chapter reviews relevant research and theories in relation to adolescent growth, with a particular focus on the western and non western perspectives of adolescent development, the definition of positive growth, and how research attempts to measure positive growth. The second part of this chapter reviews relevant research and theories in relation to mentoring, with a particular focus on formal mentoring and informal mentoring, their effects on adolescent growth, and theoretical models on the mentoring process. The chapter concludes by specifying the implications of this review for the present study.

Adolescent Growth

Perspectives on Adolescent Development

Defined by the World Health Organization (Goodburn & Ross, 1995) as the period of life between 10 to 19 years, "adolescence" has been recognized as a critical life stage from which a successful or meaningful life is launched, or not. In the twentieth century, numerous theories have provided guiding lights to the study of this formative period of life. From Piaget's (Piaget & Inhelder, 1969) four stages theory on cognitive development, Kohlberg's (Daeg de Mott, 2008; Kohlberg, 1973) theory on moral development, to Erikson's (1975) eight stages theory on social-emotional development in children and teenagers, and many more, these theories not only increase knowledge on adolescence, but provide bases to develop strategies to enhance adolescent development. The following is an overview on some of the major theories on adolescent development.

Piaget's Cognitive Development Theory

Piaget describes development mainly in terms of how children think, which determines how they see the world and themselves in the world (Piaget & Inhelder, 1969). The four periods are Sensorimotor (from birth to 2 years), Concrete Preoperational (from 2 to 7 years), Concrete Operational (from 7 to 11), and Formal Operational (from 12 years to adulthood). The last stage contains a transition from concrete to abstract reasoning. The adolescent develops the ability to think in abstract terms or possibilities and probabilities of a situation, without actually taking part in the circumstance. Related to the growth in thinking, and as the adolescent develops, there is also a movement from egocentric thinking alone.

Kohlberg's Theory on Moral Development

Piaget's theory based mainly on cognitive development has been foundational for research and theories on stage development. Expanding on Piaget's work in the 1930s, Kohlberg proposed six stages of moral development, based also on cognitive reasoning (Daeg de Mott, 2008). In brief, his theory presents three levels of moral reasoning: preconventional, conventional, and postconventional. Each contains two stages. In the preconventional level, the person makes choices based on the fear of punishment and the desire for rewards. In the conventional level, choices are made with consideration for the good of others, to maintain relationships, and to follow the rules of the society or community. In the third, the postconventional level, the person reasons from her/his own abstract ideals and values, beyond societal laws and group rules. According to Kohlberg, every person begins at level of one moral reasoning and moves progressively to levels two and three unvaryingly and irreversibly. Few people reach levels five and six. While Kohlberg had claimed that his stages of moral development are universal, applying to people of all cultures, research has had difficulty proving this. Nonetheless, Kohlberg's theory has launched much research and further theoretical framework on developmental stages (Gilligan, 1982; Turiel, 1983).

Erikson's Eight Social Emotional Stages

Psychiatrist Erikson (Erikson, 1975) went beyond cognitive development to propose eight phases of the socialization process, "the eight stages of man". Similar to Piaget's

and Kohlberg's perspectives, each stage has its own challenge and learning, which upon attainment, will adequately prepare for the next stage of development. In short, the stages include

1. Learning Basic Trust versus Basic Mistrust (from birth to two years)
2. Learning Autonomy versus Shame (from 2 to 4 years)
3. Learning Initiative versus Guilt (from 3.5 to entry to formal schooling)
4. Industry versus Inferiority (from K or grade 1 to middle school or junior high)
5. Learning Identity versus Identity Diffusion (from around 13 years to 20)
6. Learning Intimacy versus Isolation (young adulthood)
7. Learning Generativity versus Self-Absorption (adulthood)
8. Integrity versus Despair (late adulthood)

One of the main tasks of Stage Five is for the adolescent to find his/her self-identity, to be able to answer satisfactorily the question "Who am I?" In defining himself, finding her own place, and meaning to one's life, the adolescent goes through turmoil, questions everything, and sometimes exhibits experimental and risk-taking behavior.

Erikson's theory or description of the stages of the human life has inspired much research focusing on strategies to successfully progress through these life stages, helping the child through the various stages and gaining positive learning from each (Eagle, 1997; Myers, 2008).

Havighurst's Developmental Tasks

In further defining a particular stage of development, researchers have described specific goals to be achieved within a stage. Havighurst (1971) referred to these as "developmental tasks". The tasks for adolescence, ages 12-18, have been well expanded and further described by subsequent researchers (Manning, 2002; Scharf, 2004). In brief there are eight tasks for adolescents, as follows:

1. Achieving new and more mature relations with age-mates of both sexes
2. Achieving a masculine or feminine social role
3. Accepting one's physique and using the body effectively
4. Achieving emotional independence of parents and other adults
5. Preparing for marriage and family life

6. Preparing for an economic career
7. Acquiring a set of values and an ethical system as a guide to behavior; developing an ideology
8. Desiring and achieving socially responsible behavior

Havighurst's developmental tasks have been influential in theory development and practice (Perkins, 2007). These tasks have been further described, applied and used as guidelines for researchers, adolescents and service providers. They help the adolescent to focus on the major task of creating a stable identity and becoming well-adjusted and productive adults.

Non Western Perspectives on Adolescent Development

The above represent major theories developed with a Western philosophy of the self, that the goal of the self is to become independent, self reliant, able to live meaningfully as a person. What is commonly referred to as western individualism is well reflected in the developmental tasks for adolescents as well as achievements expected of this stage. As research becomes more globalized in the recent decades, there is a notable lack of theory and empirical support for understanding the outcome of non Western adolescent development, for example, Chinese adolescent development. Lam Ching-man of the Chinese University of Hong Kong (2005, 2007) has noted, studied and theorized on adolescent development in the context of Chinese culture. He identified four major themes that reflect deep-rooted cultural influences. These themes include: be a good person (self-cultivation), be a good child (filial piety), be a self-reliant person to honor family (Chinese familism), and be a mature person (the quest for harmony and other-related attributes). Lam proposes a concept of "self in relational network" for understanding the unique outcome of Chinese adolescent development. A notable difference between this and western theories is that Chinese culture seems to 'demand' these qualities of the growing adolescent who is expected to strive to achieve these qualities. On the other hand, the western views seem to examine what 'happens to' the adolescent which is beyond his/her control.

Consistent with the concept of 'guanxi' （關系）, meaning 'relations' in Chinese, which has its base from Confucianism, the 'self in relational network' refers to the development of a web of good fitting, harmonious, and socially acceptable interpersonal

relationships in the adult world. The goal of the adolescent is to understand, develop, and learn to exercise these relations appropriately and effectively. While the Confucian concept of relations is deeply influential in Chinese and various Asian cultures, the self in relational network concept has yet to be firmly supported by studies. Researchers such as Li, Bhatt, Gira and Zhang (2006), have found unexpected outcomes when studying across cultures including Indian, Canadian, and Chinese. For example, Canadians (of mainly a Western individualistic culture) were found to be more interdependent than Chinese (usually considered to be of a collectivistic ideology). Li et al. (2006) offered a reminder that culture is ever changing, with factors such as age and locations that affect mutual impact.

In sum, perspectives of adolescent development attempt to describe and examine adolescence through various lenses. Western perspectives that have yielded much research and discussions include Piaget's cognitive lens (Piaget & Inhelder, 1969), Kohlberg's moral reasoning (Daeg de Mott, 2008), Erikson's socio-emotional view (Eagle, 1997; Erikson, 1975), Havighurst's detailed tasks (1971) to be achieved by the growing child, and many more. Views on adolescent development differ with culture and background. While the study of adolescent development in cultures outside of Western ideology is still in its infant stage, it is important to keep one eye open to aspects of culture that dynamically influence adolescent development. Acknowledging differences in approaches and cultures to describe the richness of human development, the theories share the common assumption of adolescence being a stage, a transition, and a period with a certain age range, during which critical developments take place. Beyond the mere description of the stage or developments, the practical and challenging task is exploration on how to enhance the developments, how to help adolescents develop positively, toward becoming well adjusted and successful adults.

Positive Growth in Adolescents

Adolescent development has been described, defined, and theorized as outlined above. Positive growth simply refers to the achievement of the required developments, the completion of the developmental tasks, or the reaching of the described goals at the end of period or stage of growth. In examining the extent of reaching these goals, tasks, and requirements, researchers have defined them in smaller components that can be at times measured by devised instruments.

Dealing with peer pressure, learning new social and sex roles, gaining independence and developing a sense of responsibility were identified by Johnson and Kottman (1992) as important developments for adolescents. They asserted that these are tasks critical for youth to develop during their adolescent years for further growth into the next and subsequent stages in life. In a program developed by Lawson (1997) named Focused Adolescent Mentoring to Improve Linkages in Educational Settings (FAMILIES), middle schoolers were assisted in specific growth areas including academic performance, decision making, self-esteem and social skills. The 'growth' of the child was therefore determined by developments in these skills, achievements, and aspects of the adolescent.

In studying the effects of strategies to enhance adolescent development, several more specific areas have been examined. They included scholastic competence (Craik, 1997; Teachman, Paasch, & Carver, 1996), prosocial behavior (Resnick, Bearman, Blum, et al., 1997), academic outcomes (Eccles, Early, Fraser, Belansky & McCarthy, 1997), and self worth (Garber, Robinson, & Valentiner, 1998). Jekielek, Moore and Hair (2002) in a meta analytical study on adolescent development, outlined growth domains on education and social behavioral outcomes. To enhance academic performance of Academically At-Risk Students (AARS), various studies used a number of cognitive and emotional outcome variables. Larose and Tarabulsy (2005) for example, further broke down the elements of academic performance to include attitudes toward school, as well as academic confidence. Together with these, the researchers also identified self-concept and parental and teacher relationships, to determine positive growth in students.

More recently, Araque (2007) related early adolescent development to the concept of Developmental Assets which entail concepts from both resilience and developmental tasks in adolescence. Araque compared students in two schools, examining eight developmental asset categories: Support, Empowerment, Boundaries and Expectations, Constructive Use of Time, Commitment to Learning, Positive Values, and Social Competencies, and Positive Identity. Developmental asset scores were compared between the two schools. The study was one of the first studies to examine adolescent development in terms of scored developmental asset levels.

Positive growth in adolescent development therefore in the empirical research framework has been represented by measurable indicators such as domains, developmental asset levels, cognitive and emotional outcome variables. These indicators entail areas that range from academic competence, social competence, positive identity, to relationships with peers and parents. These domains are relevant to both Western and non Western (such as Chinese) analyses of adolescent development.

Measuring Positive Growth

In studying adolescent growth, numerous instruments have been designed and developed by researchers to measure social and other aspects of growth in children and adolescents. For example, Harter developed instruments that have been widely recognized and well used by researchers (Aasland & Diseth, 1999; Arganbright, 2008; Hagborg, 1993; Rhodes, Grossman & Resch, 2000). The Self Perception Profile of Children (SPPC) of 1986, and the Self Perception Profile of Adolescents (SPPA) of 1988 have questions completed by the participants, self reporting on areas defined by domains which include scholastic competence, social acceptance, athletic competence, physical appearance, job competence, romantic appeal, behavioral conduct, close friendship, and global self-worth. The SPPA for adolescence was a further development from the SPPC for children. While the content of the original six domains was kept parallel across the child and adolescent versions, three addition domains, Job Competence, Close Friendship, and Romantic Appeal were added to the adolescent version, reflecting areas relevant and important in the teenage years (Harter, 1988). With the overlap in content across the two versions, the SPPC and SPPA have been effective instruments for research on development issues employing either cross-sectional (that is, comparisons between children and adolescents) or longitudinal designs. Researchers can switch versions at the appropriate age level and still be able to compare the subscale scores across the two versions. Harter's instruments have been extensively used by studies (including the present one) on strategies to enhance positive adolescent growth.

Another area of 'measurable' positive growth in adolescence has been the consideration of psychological security, based on the theoretical framework of Attachment Theory. Bowlby (1978) originally formulated the theory that has been expanded by others.

Armsden and Greenberg (1987) developed three broad dimensions for assessment through the Inventory of Parent and Peer Attachment (IPPA). The dimensions include the degree of mutual trust, quality of communication, and extent of anger and alienation. The instrument is a self-report questionnaire with a five point likert-scale response format. Parent and peer attachments have been found to correlate with positiveness and stability of self-esteem, life satisfaction, and affective status (Armsden & Greenberg, 1987), problem-solving, coping strategies and emotion-managing efforts in stressful situations (Armsden, 1986). With results correlating with and validated by other scales such as the Family and Social Self scores from the Tennessee Self Concept Scale, and the Family Environmental Scale (Armsden & Greenberg, 1987), the IPPA has been considered a reliable instrument to measure important areas of positive growth in adolescents and children. Research on strategies to enhance adolescent growth has employed the IPPA and other instruments. For example, Aseltine, Dupre and Lamlein (2000) found that the mentored group had significantly lower levels of problem behavior and alcohol use and significantly higher levels of self-control, cooperation, attachment to school and family, and school attendance compared with the control group.

The measuring of adolescents' relationships with parents and peers addresses the Western concept of the self in achieving social-emotional development of the self in identity and behavior, as well as the Asian framework of successfully relating to relationships in the adolescent and adult world. The IPPA is therefore an important instrument that measures growth areas relevant to adolescents in various cultural contexts. For this reason, the IPPA is one of the instruments used in the present study.

Christine Bennetts of the Department of Lifelong Learning in the University of Exeter conducted qualitative research on strategies to enhance adolescent development (2001). She asserted that the fundamental questions should not be about what the material successes are such as academic achievements or how they are measured, but about how these successes relate to adult development and adult learning. She observed that some helping strategies encouraged the young person to perceive and utilize learning opportunities throughout life. Bennetts found among her interviewees that they were helped to learn how to think, work and live. They then learned to follow dreams, define

goals, and find direction. In a subsequent study, Bennetts (2003) noted that many young people described searching for some kind of 'certainty' in the form of values or belief systems during the teenage years. Perhaps this was related to the development of self-esteem and self-image during this stage of development.

Growth according to Bennetts' framework therefore described learning to think, work, live, dream, define goals, and reach them as a young person moving toward adulthood. The strategy that Bennetts found to be of significant importance according to her interviewees was a one-on-one relationship with an adult, in a mentoring relationship. The adult mentor provided encouragement, certainty, directions and role modeling toward these tasks that the young person was moving toward. Bennetts asserted that the study of positive growth must expand to studying the 'process' by which the positive growth is achieved. How are positive developments achieved? Her research describes the process of 'mentoring' that leads to positive adolescent development. The following section discusses mentoring.

Mentoring

Brief History of Mentoring

In Homer's Odyssey, Ulssyes entrusted the education and care of his son, Telemachus, to his wise friend, Mentor (Comer 1989), before he embarked on a lengthy voyage. Mentor, as a surrogate parent, gave support, love, guidance, and protection to the young child until the return of his father. Thereafter, Mentor represented a highly respected and wise teacher who provided intellectual and emotional counsel to younger individuals (Casey, 2000).

In the East, the concept of mentoring was recorded as early as 2300 BCE (Huang & Lynch, 1995). An early model of mentoring was demonstrated in the succession procedures of the three Chinese sage kings Yao, Shun, and Yu, between 2333 and 2177 BCE. The passing of the throne by the sovereign to a virtuous and competent successor was known in early Chinese history as Shan Rang (禪讓), literally meaning "the

enlightened stepping aside to create room in the center for the next deserving person to step in and take charge." Yao stepped out of the way for Shun, who in turn moved out for Yu's entrance. The concept of learning from, following the footsteps, and taking on the role of an older adult is common in relationships in Chinese history and culture. Chinese martial arts, commonly known as Kung Fu, were learned in early days through personal relationships, similar to apprenticeships. Stories of a young man leaving his village and going into the hills to seek out a famous 'master' to learn Kung Fu abound in Chinese history books, and novels based on historical figures and incidents. Such topics and relationships have assumed a broad popularity and have become common participants and themes for movies and the entertainment industry. Some examples include the Kung Fu series, *Enter the Dragon* (Weintraub, 1973), and more recently, *The Forbidden Kingdom* (Laurentis, 2008) and *Kung Fu Panda* (Cobb, 2008). In *Kung Fu Panda,* the teacher is called 'Shifu', which is a transliteration of the Chinese words for master, teacher, or mentor (師傅). Indeed, in a master-student relationship, the teaching and learning topics extend well beyond the subject of kung fu. The student spends a long period of time with the teacher, and learns the art of kung fu as well as the art of living, life skills, and life philosophies. In this lasting, mutually committed, and impactful relationship, the teacher (or master) is a 'mentor' of life for the student.

In various cultures and across the ages, the concept of mentoring has been found to be prominent in providing teaching and guidance to the young. Bennetts (2001) outlined such prominence in the Spanish education system, and the influence by others on the natural development of personality among Romanians. She also highlighted the one-on-one guidance in the Arab culture, and India's idea of the 'guru' which originally meant 'one who can lead from darkness to light'. In African American communities, intergenerational relationships have long been recognized as an important resource to youth (Collins, 1987). Older women providing guidance to younger African Americans, acting as surrogate parents, are often referred to as "other mothers" (McAdoo, 1987).

Mentoring has apparently been a commonality across cultures, speaking perhaps to its effectiveness, value, and significance in the passing on and gaining of knowledge, the learning process. The common phenomena seem to have been that connection with a significant adult is noted to have a positive effect on the growth of the child or the adolescent. The significant adult has been further defined as the 'mentor' when the

relationship involves some kind of connection, learning and mutual influence between the two persons.

Formal Mentoring

Overview

The positive influence of a mentoring relationship in the life of a young person has not gone unnoticed by social workers, helping agencies, and governments, and has inspired the application of this helping strategy to enhance the growth of young people. For decades, mentoring programs have been developed to provide mentors for young people in need of help. These programs involve the matching of an adult and a child previously unknown to each other, by a third party. The programs, whether in a school or a community, are often structured with timeframe, activities, and specific goals to be reached by the mentoring relationship (Zeldin, Larson, & Camino, 2005). Big Brothers /Big Sisters and similar programs in the US, UK, Canada, and Australia (Baker & McGuire, 2005; Bryant & Zimmerman, 2003; Greenberger et al., 1998, Rhodes et al., 1992, 1994, 2000) have proven beneficial to the child and have attracted private and government funding as an investment to directly help the youth of those nations.

Promotion and development of mentoring relationships among young people has become immensely popular and as can be seen below, myriad programs have been developed in the community and schools to help youth 'grow', reduce risks, and become better adjusted. Such programs now number well over 4,500 agencies in the USA alone, benefiting from governmental, corporate and private support (Dubois & Karcher, 2005b). They include around 500 Big Brothers/Big Sisters of American agencies. US initiatives includes America's Promise, and federal legislation promoting mentoring such as the No Child Left Behind Act of 2001 and Title IV-B of the Social Security Act, which provides funding for the Mentoring Children of Prisoners Program (Karcher, Kuperminc, Portwood, Sipe, & Taylor, 2006). Over 2.5 million adults are estimated to be serving as volunteer mentors to youth in the United States (Manza, 2003).

A recent and new development in mentoring is the rapid emergence of new models of practice and their application to an increasingly wide range of youth populations. Peer

mentoring, for example, extends beyond the usual parameter of mentoring between an older person and a young apprentice. ‘Buddy systems’ used often in school involve peers, friends of same or similar age, helping friends. Peers are expected to be a ‘friend’, for a short amount of time at least, and to provide care and guidance with one teacher or adult mentoring a group of ’buddies’. Reflecting a similar trend in structure and design of programs, there have been numerous initiatives to tailor mentoring programs to better serve the needs of particular populations of youth. These populations include youth in foster care, academically at-risk students, youth who have a parent who is incarcerated, youth involved in the juvenile justice system, youth who have disabilities, those who are pregnant or adolescent parents (Fullerton, 1998; O’Beirne, 1998; Tierney, 1995).

In addition to applying mentoring strategies to special populations, yet another alternative approach to youth mentoring has been one that utilizes the internet, sometimes referred to as e-mentoring (Dubois & Karcher, 2005a). Mentors and youth are matched and communicate through the Internet. The e-mentor and e-mentee could be anonymous to each other and mentoring could be instrumental (on a specific group of skills) or supportive for socio-emotional well-being. Such a kind of mentoring could be convenient and readily available, but could have risks higher than those of mentoring programs which require the physical presence of the mentor and mentee. Some of the key questions on e-mentoring would be how well will the e-mentor be screened and selected, what measures can be taken to keep both the mentor and the mentee safe from inappropriate intentions from either member of the relationship, and how can the relationships be monitored for effectiveness and honesty (Dubois & Rhodes, 2006). With the fast and widespread influence of the internet through e-messaging, e-learning, e-mailing, etc., the benefits of e-mentoring could be influential. Unfortunately, to date, there has been little research on e-mentoring and other new modalities or applications of mentoring.

While applying the concept of mentoring as a strategy of intervention or prevention is considered a ‘good idea’, based on some of the apparent positive outcomes mentoring brings, the lack of research to inform these newer approaches to youth mentoring or to evaluate their effectiveness leaves these innovations in the creative and experimental stage only. In producing their *Handbook of Youth Mentoring* (Dubois & Karcher, 2005a), a significant publication on mentoring in the US, the editors who are prominent

researchers on informal and formal mentoring, found insufficient scholarship to merit the inclusion of even a chapter on some of these new modalities of mentoring or the mentoring of various specialized populations.

In 2003, the National Research Summit on Mentoring was convened in Kansas City, Missouri by MENTOR/National Mentoring Partnership, a leading policy and advocacy organization in the field in the United States. In the Summit, leading researchers on mentoring, David Dubois and Jean Rhodes (2006), called for focused attention on the increasingly critical gaps between new applications of mentoring and a knowledge base that was created primarily from a traditional and non specific structured mentoring. As mentoring modalities evolve at a rapid pace, so must research evidence be generated to inform the true effectiveness and value of these various programs.

Effects on Adolescent Growth

The exponential growth and enthusiasm for mentoring programs are fueled in part by the increasing knowledge of the central role of strong relationships with adults during the adolescent years (Rhodes et al., 2002). Researchers, in an attempt to 'catch up' with the large number of structured mentoring programs coming into existence in all forms and shapes, have worked tirelessly to study the mentoring phenomenon. Research findings have indeed highlighted the positive contributions nonparental adults can make in the lives of youth. For example, a 1995 study by Tierney, Grossman and Resch became a landmark evaluation of the USA's Big Brothers/Big Sisters program. Its findings were widely praised as convincing evidence of the benefits of structured mentoring on youth development (Walker, 2005). A recent review of the same program also concluded that studies are consistently finding a broad range of positive outcomes from community-based and school-based mentoring (Hansen, 2007).

Rhodes, Grossman and Resch (2000), using the SPPA and IPPA discussed earlier, established that mentoring had apparently led to improvement in parental relationships, reductions in unexcused absences and improvement in perceived scholastic competence among young people engaged in a mentoring program. In 2002, Dubois, Holloway, Valentine and Cooper conducted a meta-analysis of 55 evaluations of youth mentoring programs. They found evidence of some benefit, on average, for participating youth on measures of emotional, behavioral, and educational functioning.

As the positive effects of mentoring were recognized, attempts have been made to 'produce' the benefits of mentoring on a mass-scale. However, researchers have found that such endeavors run high risks of poor matches, failing commitment, lack of training, and even mentor-mentee conflicts (Rhodes et al., 2002). These have been reported to bring harm to the mentor, the mentee, and the program director when structured programs did not run smoothly (Karcher & Lindwall, 2003). A survey of current studies on mentoring program led some of the researchers to conclude that mentoring programs may fail to deliver on their promises (Roberts, Liabo, Lucas, Dubois, & Sheldon, 2004). Bennetts (2003), from a United Kingdom perspective, discussed the risks in greater depth. Despite the well-intentioned intervention, the mentoring program, according to Bennetts, ran the risk of setting up already disadvantaged teens for failure again. For example, programs that aim to help teens find a job through mentoring relationships may not always be meant their goals. Some teens who fail to find employment upon completion of the program could be discouraged from engaging in other mentoring relationships in the future. In other cases, mentoring relationships could be constrained by the government's aims while the basic needs of the mentee are ignored. Bennetts therefore argued that formal or structured mentoring interventions must be learner-centered, rather than driven by a program goal or an external goal that might be beyond the mentee's control (such as finding a job).

In one of the studies by Grossman and Rhodes (2002), the data from the national Big Brothers and Big Sisters in the US were analyzed. It emerged that the effects of mentoring relationships varied with their duration. Youth involved in the matches that terminated within the first 3 months experienced a drop in self-worth and perceived scholastic competence while youth engaged with a mentor for over 12 months reported a significantly higher level of self worth and scholastic competence. Grossman and Rhodes (2002) speculated that mentoring relationships could actually be harmful to the youth when the relationship ends earlier than the expected term.

In addition to the timing and duration of the mentoring relationship, another factor contributing to the quality of mentoring has been found to be the presence of a strong emotional connection. Studies have found that perceived closeness of the relationship and authenticity of care in the relationship are linked to perceived benefits of the relationship including scholastic competence, feelings of self-worth, etc. (Grossman &

Rhodes, 2002; Liang, Tracy, Taylor, & Williams, 2002; Para, Dubois, Neville, & Pugh-Lilly, 2002). Close emotional relationships are central to what mentors and mentees value, according to results from surveys and interviews conducted by Dubois and Neville (1997).

Formal mentoring has enjoyed much popularity due to some research evidencing its positive effects on adolescent development. However, factors such as duration of the mentoring relationship, quality (depth of care) of the mentoring relationship, goals of the mentoring program, etc., evidently contribute toward the positive or negative effects of formal mentoring (Herrera, Grossman, Kauh, Feldman & McMaken, 2007). A fair conclusion for formal mentoring was stated by Adele Horin of the Sydney Morning Herald (2004) that mentoring programs have prevented troubled children from going off the rails, but not all have been successful. Indeed, many researchers assessing mentoring programs in recent years (Allen, Eby, O'Brien & Lentz, 2008; Bennetts, 2003; Karcher & Lindwall, 2003; Rhodes, 2002) have concluded similarly. Empirical studies continue to be needed, to delineate the conditions under which mentoring programs can more fully realize their promise of having a positive and transformative impact on young people's lives (Dubois & Silverthorn, 2005b).

Informal Mentoring

Overview

Without the mediation of a third party to intentionally match an adult with a child to develop a mentoring relationship, as in formal mentoring, mentoring relationships have existed for centuries, across cultures. They are present in the natural setting, and formed in a natural manner, through natural relationships. Bennetts refers to these as 'traditional mentoring'. The traditional mentor, according to Bennett, is 'that person who achieves a one-to-one developmental relationship with a younger person, and one whom the younger person identifies as having enabled personal growth to take place' (Bennetts, 2001, p. 276). Bennetts' traditional mentor refers to Mentor in Homer's Odyssey, Shifu in the world of Chinese martial arts, "other mothers" among some African Americans, surrogate parents in other communities, and myriad other names fitting of significant relationships helping young people grow.

In more recent research, traditional mentors have been named as ‘informal mentors’ and ‘natural mentors’. McDonald, Erickson, Johnson and Elder (2007) for example, defined informal mentoring relationships as ones occurring naturally among youth and the adults with whom they come in contact. These adults have been labeled ‘very important people’ (VIPs), ‘role models’, and ‘significant others’ (Bryant & Zimmerman, 2003; Chen, Greenberger, Farruggia, Bush and Dong, 2003; Greenberger et al., 1998). In short, they are adults that adolescents perceive to be influential in their lives. Other researchers based their definition on Bronfenbrenner (1979) and Levinson (1978): “a mentor is not someone around your age or a boyfriend. He or she is an adult who is older than you, who has had more experience than you, and who has taken a special interest in you. This person may be a teacher, a relative, a neighbor, or someone else whom you look up to for support and guidance” (Klaw, Rhodes, & Fitzgerald, 2003, p. 226). Some have restricted the mentor to be a non parent, excluding the young person’s father, mother, or whoever raised him/her. Klaw et al. (2003) listed four characteristics of the natural mentoring relationship as criteria for persons to be nominated as mentors:

1) you can count on this person to be there for you
2) he or she believes in and cares deeply about you
3) he or she inspires you to do your best, and
4) knowing him or her has really affected what you do and the choices you make.

These criteria were outlined to help subject identify and name their mentors. A shorter version that captured the essence of the mentor can be found in Bennetts’ research which asked participants if there had been “one or more person(s) in your life who was (were) most responsible for helping your potential to develop most fully; the person is not a peer of similar age to yours.” (Bennetts, 2003, p. 64). The names ‘traditional’, ‘natural’, and ‘informal’ mentors have been used interchangeably in research. They all refer to adults naturally occurring in the life of the young person, having a positive influence on or helping the young person grow. Contrasting with the concept of ‘formal’ mentoring, the use of ‘informal’ mentoring is appropriate for the present research and discussion. Independent of any structured program, the informal mentor therefore can be one’s uncle, auntie, teacher, counselor, coach, tutor, older sibling, and in some context, the butler or a helper in the family.

Effects of Informal Mentoring

Several earlier studies on informal mentoring already pointed toward the positive impact of mentors in the natural setting. Rhodes, Contreras and Mangelsdorf (1994), found that Latina women with informal mentors reported significantly lower levels of depression and anxiety than those without mentors despite similar levels of stress exposure and overall support resources. Mentoring relationships appear to enhance the young women's capacity to benefit from their support resources and offset the effects of relationship problems. A study exploring the role of 'VIPs' (very important persons) in the lives of adolescents of diverse ethnic backgrounds in the US (mean age = 16.7 years) by Greenberger, Chen and Beam (1998) found linkages between adolescent depressive symptoms with perceived VIP (adult) warmth and acceptance related to a lower incidence of depressed mood. Further study on the VIP 'effects' was strongly recommended.

In more recent years, a number of significant studies on the intriguing phenomenon of natural or informal mentoring have been conducted. Grossman and Bulle (2006) in their commentary on youth resilience and mentoring (2006) asserted that common sense and psychological research tell us that connections to adults (parents and others) are integral to the process of normal human development. While a substantial body of research on parent-child relationship exists, a small but growing amount of research points toward the significance of the non-parent adult in the development of adolescents. The most common non-parental relationship is one involving the teacher and the student. Potential issues do arise from the teacher-student relationship, such as professional distance, number of students in a class, and high workload of teachers.

The influence of other adults involved in the life of the child outside of school requires further detailed examination. A study on urban youth in which 770 adolescents from a large Midwestern city in the United States were interviewed indicated that fifty-two percent reported having an informal mentor. Those with informal mentors were less likely to smoke marijuana or be involved in non-violent delinquency, and had more positive attitudes toward school (Zimmerman, Bingenheimer & Notaro, 2002). In a national survey of American youth, researchers created a list of forty assets that are conducive to adolescents' healthy development and found that the greater the number of

such developmental assets present in a youth's life, the lower the rate of risk-taking behavior. One such asset was 'support from three or more other adults' and 'adult role models.' Theokas and Lerner (2006) found that the presence of mentors (both informal and formal) was the most important asset for positive youth development in communities.

In addition to the emotional impact or social psychological support natural mentors give to young people, instrumental benefits of informal mentoring remain to be explored in detail. Researchers such as Hamilton and Hamilton (2004), and Darling, Bogat, Cavell, Murphy and Sanchez (2006) have found evidence that informal mentoring enhances the development of essential skills such as organizational skills, communication skills, and other self improvement skills, and provides a variety of opportunities such as connections for jobs, and serve as the youth's sponsors.

A major study that has become a landmark research on informal mentoring was conducted in 2005 by Dubois and Silverthorn. The study was distinctive due to its large, nationally (US) representative sample (n = 2,053), and the examination of relationship characteristics and multiple mentors, and the links to a variety of outcomes. Dubois and Silverthorn affirmed that characteristics described in an informal mentoring relationship were factors found to be effective in mentoring. They included frequency of contact, closeness of the relationship, and its duration. The researchers further investigated correlations between mentor role, frequency of contact, closeness and duration and the dependent variables in terms of domains of education/work, problem behavior, psychological well-being, and physical health, among older adolescents and young adults. They found that mentoring relationships with persons in roles outside of the family predicted greater likelihood of favorable outcomes in all domains except psychological well-being, relative to mentoring relationships with family members. This study affirmed the powerful effects of informal mentoring, the factors affecting mentoring, and the strong encouragement toward the development of natural mentoring relationships in school, the workplace, and the community.

A further analysis of the national (US) data that Dubois and Silverthorn's study was based on found that natural mentors have a significant positive effect on employment (McDonald et al., 2007). In the often tumultuous transition from being a student to full

time employment among young adults, McDonald, Erickson, Johnson and Elder (2007) found that mentoring relationships that developed during adolescence have a positive impact on the likelihood of full time employment. The receipt of guidance, support and advice from mentors contributed toward the employment in young adulthood. In turn, entrance into the work world facilitates the development of mentoring relationships which could promote attachment to the labor force. Thus, informal mentoring relationships effect positive influence beyond adolescence and into critical transitions to adulthood as well.

Bennetts (2003) who asserted that little attention had been given to traditional mentoring that had been with humanity for centuries and perhaps millennia was one of the first to call for focus on informal mentoring relationships that occur in the natural setting with people already present in the life of the young person (Bennetts, 2003). The wisdom of formal mentoring can be presumed to have been based at least in part on pre-existing informal mentoring. A study by Beam et al. (2002) reveals that four out of five adolescents in the United States report having an informal mentor in their lives. Therefore, informal mentoring can be seen as a normative process that occurs in the lives of most young people (McDonald et al., 2007). Research in the area of informal mentoring is not yet as common or comprehensive as research on formal mentoring. A number of studies in recent years, as summarized above, have begun to investigate informal mentoring, its processes, what makes it work, and relating it to theoretical frameworks. These studies have been helpful for the research reported in this thesis.

Theoretical Models on the Mentoring Process

Research on mentoring has evidenced positive effects. A logical question that follows is, "What makes mentoring work?" In more research-oriented terminology, "What is the process of mentoring?" A qualitative study that interviewed mentors and mentees about the mentoring relationship, by Welkowitz, Broer, Topper, Thomas, Backus and Hamilton (2000) found that the relationships gave mentees a chance to be accepted, and a sense of belonging. Similarly, in Lawson's study (1997), the theme of a caring adult providing positive attention, acceptance, affirmation, and guidance/advice to students was repeatedly present. The processes that make mentoring effective, therefore, seem to include at least nurturing, caring, guiding, role-modeling and teaching. In more recent

years and with a substantial volume of data and research findings, researchers have begun to link theories to and propose frameworks for conceptualizing the processes of mentoring, the elements that make it work, and the conditions in which mentoring is effective. These theoretical frameworks are based on existing as well as newly developed theories, endeavoring to understand the 'wonders' of mentoring. The following section outlines some of the theoretical developments and orientations relevant to the present topic.

Parental Acceptance-Rejection (PAR) Theory

Rohner's Parental Acceptance-Rejection (PAR) theory (1986) suggests that parental acceptance is associated with positive outcomes, such as the development of prosocial behavior in children, positive peer relationships in adolescence, and overall psychological well-being in adulthood (Rohner & Britner, 2002). The PAR theory has been expanded to include non-parents, and other adults who are significant in the growth of the child, i.e. mentors. As young people experience or perceive rejection or acceptance from a mentor, similar effects may be found as in the case of parental rejection or acceptance. Young people may gain positive peer relationships and positive feelings about self and life values, and develop prosocial behavior when they perceive acceptance from a mentor. Conversely, negative effects could occur when young people feel rejected by the mentor. Based on this theory, there are strong implications for the success or failure of the mentoring relationship. The effects on the young person could be significant and detrimental.

Attachment Theory

Psychologist John Bowlby's Attachment Theory (1969) has been an influential basis for understanding close relationships. Attachment is an emotional bond to another person. Bowlby described it as a "lasting psychological connectedness between human beings" (1969, p. 194). Infants become attached to adults who are sensitive and responsive in social interactions with them. As the caregiver remains consistently present and caring, a bond is formed between the child and the caregiver. Children use attachment figures (familiar people) as a 'secure base' to explore from and return to. With parents being the usual and likely attachment figures, parental responses lead to the development of 'internal working models', which guide the individual's feelings, thoughts, expectations,

behaviors, and morals. Mentors in giving care and guidance to a developing youth may become a form of attachment figure to the young person, taking on the role and influence of the same. Attachment theory and measures on attachment have often been used in research on close relationships such as parent-child relationships and mentoring relationships. Several studies have found evidence that mentoring relationships improved the socio-emotional quality of child-parent relationships (Rhodes, 2002). Soucy and Larose (2000) found that academically at-risk college students who perceived having a secure relationship with a mentor were better adjusted to college. Thus, attachment to a mentor was found to make a powerful difference in young people's ability to improve their relationship with another attachment figure, the parent, and in the youth's adaptive capacity and behavior. In this context therefore, meeting the mentee's needs is the primary goal of mentoring. This will be further discussed in a subsequent section. In the process, the mentor makes her/herself redundant and eventually no longer needed.

Current research continues to use attachment measure instruments and attachment theory to understand the effects and elements of mentoring relationships. The IPPA (Inventory of Parent and Peer Attachment) developed by Armsden and Greenberg (1987), for example, has been an instrument well used in studying the effects of mentoring on young people's level of attachment to parents and others. Rhodes and her research team used the IPPA in some of their major research on mentoring. The present study also employs the same instrument to study the quality of attachment as a dependent variable on mentoring. The IPPA will be described in detail in the Method section. Attachment theory continues to be a significant area of study on mentoring relationships and youth development.

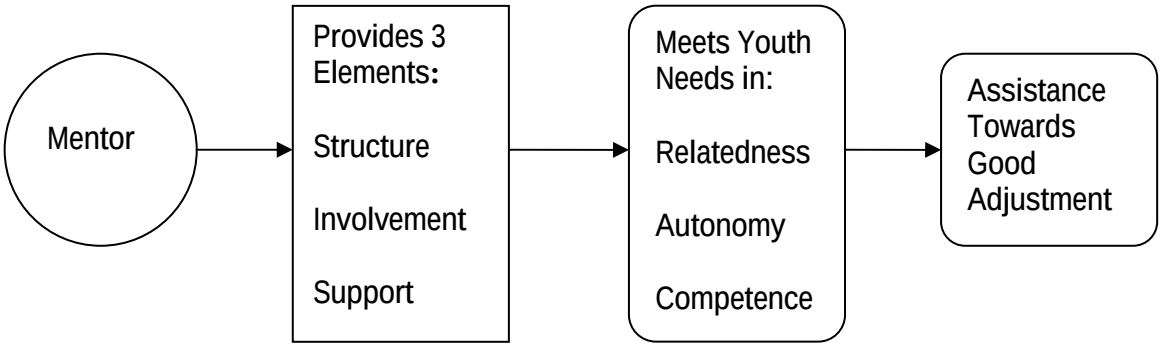
Socio-motivational Theory

Drawing heavily from the mentoring model of Larose and Tarabulsy (2005), Britner, Balcazar, Blechman, Blinn-Pike and Larose (2006) presented a theoretical model based on socio-motivational theory (Connell & Wellborn, 1991). The model links characteristics of the mentoring relationship, motivational goals, and outcomes. In short, the positive influence on youth adjustment and achievement depends on the youth's satisfaction of relatedness, autonomy, and competence needs connected with the setting.

The mentor in this case through established relatedness with the mentee, is an agent toward increased autonomy and competence for the youth. According to this theory, as the latter gains more autonomy, he or she will seek further help from the existing social network or beyond, thereby becoming more autonomous and competent in decision making and taking responsibility for life choices.

Based on the socio-motivational perspective, these three categories of needs (relatedness, autonomy, and competence) can influence adjustment and achievement in attitude and behavior. And what is the role of the mentor? According to Britner et al. (2006), mentors can help create an environment that will meet these needs, by providing three elements: structure, involvement, and support for the mentee. Structure means guidance and information that specifically help the mentee to develop autonomy. For example, clear expectations and consequences can be set out for the mentee to understand and follow. Involvement would be related to the provision of emotional resources delivered through time spent with the mentee, being interested in and attentive to the mentee, and helping the mentee manage negative emotions, challenges, and life stresses. Finally, support for autonomy entails empathizing with the mentee's perspective, encouraging independent thinking and problem solving, and giving opportunities to make choices and take up responsibilities. To better illustrate the various concepts and steps involved in this model, the diagram below summarizes the process suggested by the theory:

Diagram 1 Socio-motivational Model of Mentoring



Source: based on Britner et al. (2006).

The Socio-motivational Model outlines specifically the needs of the mentee and suggests how the mentor can fulfill those needs which is a goal of primary importance in a mentoring relationship. That mentoring is about meeting the needs of the mentee, not the mentor or any other entity in informal mentoring is reflected in the present study as well. This theory brings strong implications for the requirements of the mentor in structured mentoring and in informal mentoring.

Developmental Mentoring and Instrumental Mentoring

While approaches and theories on mentoring differ, varying in perspectives and emphases, the concept of 'support' is a prominent theme. In addition to the Socio-motivational Model just described above, support is also a prominent component in the framework of Developmental Mentoring, developed by Karcher, Kuperminc, Portword, Sipe and Taylor (2006). These researchers note that the beginning of the mentoring process is often due to the support that mentee receives from the mentor. Morrow and Styles (1995) referred to this as psychosocial mentoring. A mentor may play games, engage in recreational sports, or talk about common interests with the mentee. They asserted that increased social support generates increased self-esteem and connectedness, which may then lead to gains in academic achievement and other areas of growth. Emotional support and care in mentoring therefore may positively influence the youth's social, cognitive, and emotional development.

In contrast to Developmental Mentoring, Karcher et al. (2006) propose also the concept of Instrumental Mentoring which has the primary goal of skills learning or achievement of specific goals. Therefore, improvement in specific skills, such as academic performance, may lead to increased social support which in turn brings increased self-esteem and connectedness. Engaging in a relationship with the aim of teaching a specific skill or achieve a measurable goal such as a certain academic level, had been found to lead to negative feelings experienced by youth (Morrow & Styles, 1995). However, Hamilton and Hamilton (2005) maintain that instrumental mentoring can be effective in certain contexts, such as in an apprenticeship situation in which the relationship is for the purpose of learning a specific skill. When the mentor is not 'adult-driven' and heavy-handed in his or her guidance, mentees can have a positive experience in the relationship.

In the process of the informal or formal mentoring relationship, both instrumental and developmental mentoring may be concurrently at work, effecting skills, socio-emotional and general growth in the youth. Karcher et al. (2006) asserted that in mentoring programs in particular, it is important to be clear about which theoretical approach is taking precedence so that expectations can be clear to both the mentor and the mentee, avoiding possible disappointments and frustration. These frameworks are logical and apparently observable, however research to explore and provide evidence to instrumental and developmental mentorings and their possible outcome is currently not yet sufficient and need additional attention. Studies that research in detail the content of the mentoring relationship would provide evidence to support developmental and/or instrumental mentoring. The present study is one such study.

Relational Theory

In studying what makes mentoring work, that is, the process of mentoring, researchers have found that the 'mark' of higher quality mentoring relationships has been related to the presence of a strong emotional connection between the mentor and the mentee. The closeness of the relationship actually supercedes the effects of variables such as frequency of contact and types of shared activities (Parra, Dubois, Nevill, & Pugh-Lilly, 2002). As mentoring is a relationship, some researchers began to study it in a relational context, away from individualistic concepts regarding variables and outcomes for the mentee alone (Nestmann & Hurrelmann, 1994; Miller & Stiver, 1997; Tronick, 2001). Liang, Tracy, Taylor, and Williams (2002) suggested that the presence of relational qualities (e.g., empathy, engagement, authenticity, and empowerment) in the mentoring relationship strongly influences the success of mentoring in the lives of young women. Using a new measure of mentoring, the Relational Health Index – Mentor, they found that mentoring relationships high in relational qualities were associated with higher self-esteem and less loneliness among college-aged women. Relational processes apparently promote healthy psychological development in relationships. In the context of relational theories, Renee Spencer from her in-depth interviews with pairs of participants in a mentoring relationship (2006) suggests four essential relational processes: authenticity, empathy, collaboration, and companionship.

1. Authenticity is a familiar process in helping, mentoring, and other relationships. According to extensive research (Jordan, 1999; Miller, Jordan, Stive, Walker, Surrey, & Eldridge, 1999), it means engaging with a relational partner in a genuine (sincere and honest) way. As the participants in the mentoring relationship reveal more of themselves to each other and engage more fully in trusting behavior, the relationship is deepened and becomes more meaningful over time (Spencer, 2006).

2. Empathy, a known and well studied process in clinical research, has been understood to be a key ingredient of close relationships. In simple terms, it involves understanding another person's frame of reference and affective experience (Bohart, Elliott, Greenberg, & Watson, 2002). As in all close relationships, empathy is a 'joining agent' for both people who strive to and are able to understand and experience each other's feelings and thoughts. These two processes, authenticity and empathy, are found to be most prominently present in the beginning and development of the mentoring relationship, attesting to their crucial importance in the drawing together and bonding of the relationship.

3. Collaboration is named by Spencer as the third process that facilitates emotional development in mentoring relationships. Tronick (2001) asserts that ongoing interactions (collaborations) between two individuals are essential in possibly leading to emotional development in relationships. Spencer found that mentoring pairs described how they worked together to bolster the youth's school and social competencies, and sometimes the pairs worked together to improve other skills or simply play together.

4. Companionship, related to collaboration is considered by Spencer as the fourth process affecting mentoring relationships. Spending time with each other regularly demonstrates a desire to be there to support each other and to share in each other's everyday life. Such companionship is psychologically nurturing and sustaining for both involved.

These four essential relationship processes, authenticity, empathy, collaboration, and companionship, may be familiar terms in the study of human relationships beyond mentoring. Indeed, similar processes have been identified in other positive relationships

such as friendships, peer helping, counseling, etc. (Egan, 2006; Jordan, 1999). As Spencer identified and applied these relational processes to mentoring relationships, she was able to document observations from her research that supported her theory.

Spencer's theory is particularly significant in proposing the aspects of the mentoring relationship that contribute to its success in positively affecting youth. The development of the Relational Health Index (Liang et al, 2002) enabled measurement of the quality of the mentoring relationship with direct correlation to specific areas of growth in youth. The question of whether or not the proposed relational processes can be found in mentoring relationships in other studies remains. Further research and evidence are much needed to explore, affirm, and further develop this significant theory and its implications on the process of mentoring. Data from the present study lend supportive evidence to this model.

Interrelated Processes

All theories and frameworks regarding the mentoring process reiterate the theme of care and support between the youth and the adult. Rhodes and colleagues (2002, 2005) attempted to delineate *how* care and support from the mentoring relationship work to bring about change. They proposed three interrelated processes:

1. by enhancing young people's social relationships and emotional well-being
2. by improving their cognitive skills through instruction and conversation, and
3. by promoting positive identity development through serving as role models and advocates.

These processes are interactive, each influencing the others' effects, and are dependent on as well as determining the quality and longevity of the relationship. Rhodes et al. (2002, 2005) detailed that social and emotional well-being can be promoted by

a) having fun, a diversion from daily stresses
b) corrective emotional experiences that may generalize to and improve the young person's other social relationships
c) helping with emotional regulation

The effects of having fun are easily understandable and experienced by most people. Rhodes explains it as a diversion from daily stresses. That mentoring relationships

provide opportunities for such positive experiences is similar to Spencer's relational process of 'companionship', as discussed in the previous section. Sarason and Sarason (2001) also referred to companionship as the involvement in mutually pleasurable social activities and is a distinct aspect of supportive relationships. Positive experiences have been found to lead to improvements in other important relationships for some youth (Keller, 2005a).

Rhodes also drew on recent findings and research theories that a positive experience has further benefit than the provision of fun only, that it can have a corrective effect to help the youth either generalize to other relationships and /or gain sufficient confidence to engage or re-engage with other adults. Learning to relate by relating well describes the complexity of relationship development. In a sense, every relationship is practice in relating. Rhodes and colleagues' research (2000) indicated that positive mentoring is associated with improvement in parent-child relationships.

Another way that adults help youth in socio-emotional aspects is emotion regulation. As youth become overwhelmed with daily stresses, they turn to their mentor sometimes for help. The adult helps them sort out their feelings, see the bigger picture, recognize and develop strategies to manage their emotional responses. Gottman (2001) referred to this as 'emotional-coaching'.

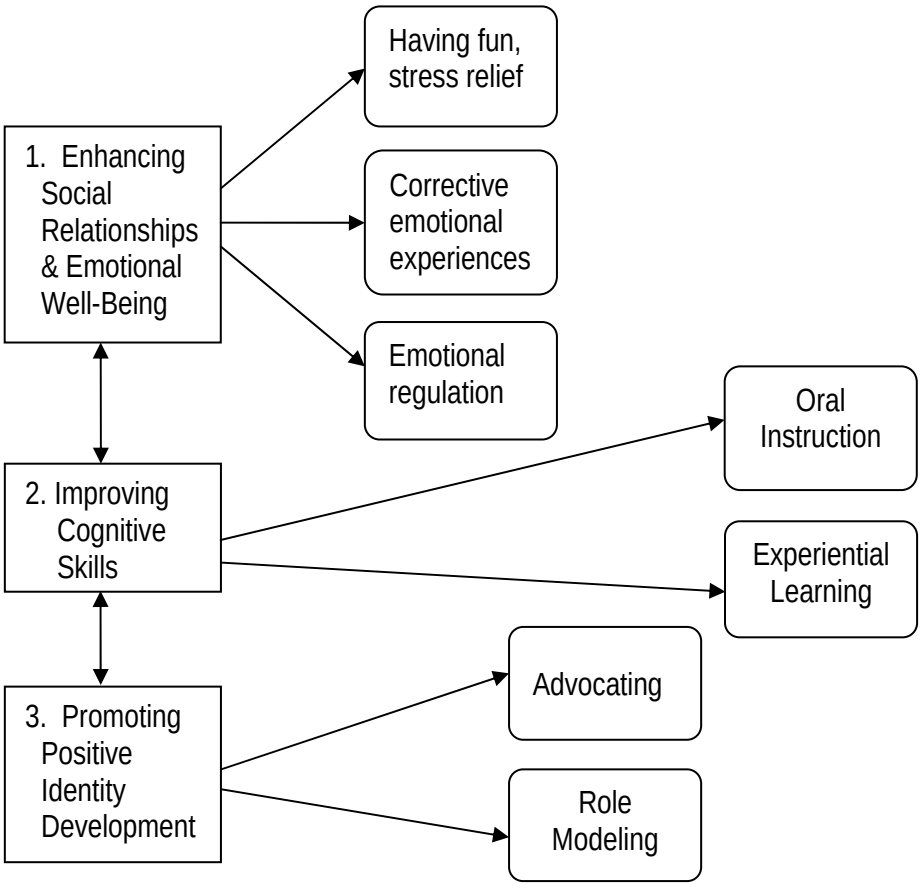
The second of the interrelated processes is the improvement of the mentee's cognitive skills through instructions and conversations (Rhodes et al., 2002, 2006). Cognitive development involves challenging the youth's thinking, motivating her/him to explore intellectual interests, and develop high level thinking. A good mentor strives to achieve these and harness opportunities to teach through oral instruction and experiential learning.

One of the major developmental tasks of adolescence is defining self or finding self-identity (Dobson, 1989). Serving as role models and advocates, mentors contribute to young people's positive identity development. This work of the mentor is the third and final of the interrelated processes described by Rhodes. As role models, mentors may inspire, demonstrate, and provide opportunities to understand and experience of the mentor's own or other identities accessible to them. Advocating would include finding

experiences, challenges as well as comfort zones and sources of calm, to help the young person draw, construct, discover, and develop their sense of self.

Rhodes' proposed theory of Interactive Processes in mentoring relationships is relatively complex and elaborate. To clarify the essence of the steps affecting care and changes in the adolescent, the Diagram below has been developed by the present researcher based on Rhodes' description of the processes.

Diagram 2 Three Interactive Processes in Mentoring Relationships



The 'interrelated processes' theory proposed by Rhodes is currently one of the most detailed and comprehensive frameworks that describes, explains, and delineates the processes of mentoring. Consolidating the current but limited research findings on the mentoring process, Rhodes' theory is both useful and inspiring, and will hopefully prompt more research in exploring the area of the mentoring process. In the Results and

Discussion Section of the present study, findings are explored in relations to Rhodes' theory on how mentoring works to bring about change in adolescents.

Implications for Informal Mentoring

In sum, since the 'discovery' of mentoring as a prevention and intervention to assist at-risk youth, special populations, and young people in general toward positive development, research on mentoring has increased dramatically. The volume of research on mentoring has expanded to explore what is mentoring, how mentoring works, and what makes it work, especially in the last decade. Interest in informal mentoring has particularly increased and research has begun to study this intriguing 'natural phenomenon' that has been with human kind for centuries, perhaps millennia. Several studies have evidenced the positive influence of informal mentoring, demonstrating outcomes similar to those from formal mentoring.

It has been established that given the appropriate conditions, mentoring relationships are associated with positive adolescent development in areas such as but not limited to socio-emotional adjustments, academic performance, at-risk behavior, and self value. Good informal mentoring in sum entails a caring, close, nurturing relationship with an adult. Superseding factors such as frequency of contact and types of shared activities, the sense of closeness in the relationship perceived by the mentor and mentee has been identified as a critical factor affecting the success of the relationship. (Dubois et al., 2002).

Drawing from existing understandings of human relationships, parenting, socio-emotional psychology, motivational theories, and educational psychology, researchers have developed theories and frameworks to clarify, define and understand the concept, the elements therein, and the processes of mentoring. While researchers approach the topic from a broad range of perspectives and strategies, it is widely agreed that research on mentoring, especially informal mentoring, is still in its infant stage. Data and evidence are needed to affirm and further develop theories and frameworks explaining mentoring and its processes. While the knowledge base has been established, its expansion and development await much research, exploration, and investigation.

The Present Study

The present study set out to add to the knowledge base of the effects of informal mentoring on adolescent development. It focused on mentoring relationships developed informally in the natural settings of the home, school, family, church, the community, etc. Mentors could therefore be coaches, uncles, aunties, school counselors, teachers, youth group leaders, pastors, parents, and other adults named as mentors by the youth in the study. Correlations were examined between informal mentoring and adolescent development. There are two parts to the study: a quantitative section with data collected from a primary source, and a qualitative section to collect descriptive information from the primary source to help inform the mentoring process. The combination of quantitative and qualitative studies in the present study is useful in that qualitative findings could enrich and help explain some of the empirical findings, as well as some of the research questions. This model of study was found by the present author to be particularly rewarding in terms of 'making sense' of the findings. Results were compared with other studies and correlated with current frameworks and theories on youth mentoring. The present study provided evidence to confirm some of the existing theories as well as presenting questions for deeper enquiry into others.

It is significant to note also that while the majority of research on (informal) mentoring has taken place in western countries, the present study was conducted in Hong Kong, with adolescents from Asian as well as western backgrounds. This study initiates a discussion on the relationships between Chinese (Asian) culture and the processes of mentoring, introducing intriguing questions that invite research on the rich topic of culture and mentoring. Data and findings from this study added new dimensions and applications to the knowledge and studies of informal mentoring and mentoring in general. On the practical level, the questions of what implications there are for young people wanting to engage in a mentoring relationship, and an adult wanting to help an adolescent grow were posed. The questions were responded to with information and suggestions that hopefully will stimulate action for both youth and adults.

The following chapter presents the research design, approaches and methods employed in the present study. Elements of both the quantitative and qualitative examinations including the instruments, questionnaires, data collection processes, and data analyses are discussed in detail.

Chapter 3

Method

The Research Design

This study engaged a Case Study method, focusing on the graduating class of 2005 of the Hong Kong International School. According to Cohen, Manion and Morrison (2000), a case study is a specific instance to illustrate a more general principle. The single instance is a bounded system such as a child, a class, a school, a community, etc. It is an example of real people in real situations. Yin defines the case study research method as "an empirical inquiry that investigates a contemporary phenomenon within its real-life context, in which, multiple sources of evidence are used" (Yin, 1984, p. 23). Case studies therefore can entail "quantitative data collection and analyses as well as descriptive data gathering, discovery of patterns, and drawing of interpretations" (Babbie, 2004, p. 370). In the present study, the case entailed the senior (grade 12) class of the Hong Kong International School. The students were real people in the context of the school within Hong Kong. Their engagement in mentoring relationships was studied and may have correlations with existing theories and more general principles on mentoring and youth development. Both quantitative and qualitative approaches were employed to collect primary data on correlations of mentoring and positive adolescent development as well as descriptive data to yield details on the processes and quality of mentoring. While correlations were determined through quantitative analyses of the data, the qualitative information provided evidence toward explaining some of the phenomena discovered by the quantitative results. The combination method afforded a more complete picture/study of the case in question. How each of the research questions was addressed by each of the approaches is outlined below.

The first research question is as follows:

> **Research Question 1**:
>
> Is positive growth in adolescents correlated with having experienced informal mentoring relationships?
>
> a. If so, which areas of adolescent growth are affected?

To answer these questions, a quantitative approach was employed to determine any correlation between informal mentoring and various aspects of adolescent development. Statistical analyses were performed to determine significant differences for correlations.

The second set of research questions of the present study consists of:

Research Question 2:

How are informal mentoring relationships formed, developed, and maintained?

a. who are the informal mentors?

b. what makes the mentoring relationship work well?

A qualitative approach was employed to collect descriptive data through a questionnaire administered to all participants. Additionally, extensive interviews were conducted with 7 participants. Questions on the questionnaire and ones in the interviews were open ended questions that invited free responses, yielding rich descriptive data. The design of the present research was therefore a case study employing both empirical and qualitative methods.

Ethical Considerations

In social scientific research, ethics refers to the "general agreements shared by researchers about what is proper and improper in the conduct of scientific inquiry", according to Babbie (2004, p. 62). Some of the most important ethical agreements that prevail in social research relevant to the present study include voluntary participation, confidentiality, and pre-existing relationship. These items have been carefully noted and addressed in this study and was approved by the Human Research Ethics Committee of the University of Technology, Sydney with clearance number: UTS HREC REF NO. 2005-020A. The following section discusses how each of the noted important ethical agreements have been addressed in accordance with the guidelines established by The *National Statement on Ethical Conduct in Human Research* (2007) of the Australian government.

Voluntary Participation

Respect is one of the requirements on the Australian government's guidelines for ethical research (2007). In the research context, respect means that participation in a research is the result of a choice made by participants. The consent should be a voluntary choice, and should be based on sufficient information and adequate understanding of both the proposed research and the implications of participation in it. Participation in the present study was voluntary. A letter (see Appendix A: Invitation and Letter of Consent) inviting the students to participate in the study was distributed to them while the researcher read aloud the letter and explained the purpose, topic, research methods and other details of the study. It was emphasized that the research was entirely separate from assessment exercises in any of the students' classes, and that the decision to participate or not, and results from the research will not affect the students' grades in any way. Students were assured that the data collected would be kept confidential. The only link between the data and student name will be a number code accessible to the researcher only. Students deciding not to participate could do their own work in the same classroom. Students who decided to participate in the study were to sign and return the letter of consent to the researcher, acknowledging understanding of and consent to participate in the research. Upon completion of the questionnaire, the research participants were given another letter addressed to them and their parents as a record of participation for their own keeping. The letter (see Appendix B) detailed the same information given on the Invitation/Letter of Consent about the research. The option to contact the researcher regarding the study was given, detailing the researchers' telephone number and email address. Thus, while parental consent to participate in the study was not sought, parents were informed and had the option to contact the researcher for additional information or to withdraw their child's information from the data.

Students approached for participation in the present study were considered able to consent for themselves as described by level D of the Different Levels of Maturity set out by the *National Statement on Ethical Conduct in Human Research* (2007): young people who are mature enough to understand and consent, and are not vulnerable through immaturity in ways that warrant additional consent from a parent or guardian. The participants, aged 16 to 18, were in the last term of their final year in high school, and about to embark on independent and college living in a few months. Being a

member of the graduating class in an international school in Hong Kong, such young people have been in a culture that has encouraged and often demanded their independent decision making. Participation in studies such as the present one in school was not an anomaly to their high school experience. Decisions to participate or not were deemed appropriate for their maturity level. Additionally, as advised by Cohen, Manion and Morrison (2000), seeking informed consent with regard to minors (children under 18 year old) begins with seeking the permission from those adults responsible for the prospective participants, including parents, teachers, school personnel, tutors, depending on the context. The school had given a written consent to confirm approval of access to students in the school for the purpose of the present research. The school's statement of support for the researcher to conduct her research in the school reflected a 'standing parental consent' that allowed the school to give permission for the researcher to access the students. Finally, as stated above parents were notified in writing of the research and could withdraw their child's data from the research. Based on the maturity level and usual expectation of the participants, the school's informed consent for the research, and the informing of parents in writing, the voluntary choice of the student alone was deemed appropriate and adequate for the present study.

Confidentiality

Confidentiality is a further important consideration for social science research (Babbie, 2004; Cohen, Manion & Morrison, 2000). Students were not required to write their name on any of the written instruments. A number was assigned to each questionnaire packet. As the students' actual academic achievement in terms of grade point average (GPA) was part of the dependent variable on the students' academic status, placing the corresponding student GPA with the rest of the collected data was necessary. The coding sheet was created solely for the purpose of linking the name of the student to the number assigned to the packet. The GPA of each participant is then recorded on the data sheet according to the assigned number. No student name appears on the data sheet. Recording of all other quantitative data and qualitative data (except the in-depth interviews) by the researcher were completed without any reference to student name or identity. Student names did not appear on the data record so that neither the researcher nor anyone would know which piece of data belonged to which student. The coding sheet was kept separate from the completed packets and the researcher was the only one having access to the coding sheet. Codes, data, and related documents have been kept in

a private and locked place accessible only to the researcher. Similarly, written records of the in-depth interviews were kept confidential. Codes in form of assigned numbers for interview schedules were used. No interviewee name appeared on the completed interview schedule or on the data record. Any information that would identify an individual interviewee was deleted.

While anonymity was not possible, the confidentiality of the student data was strictly kept to not only assure that students responded openly and honestly, but also to help avoid subjectivity in data recording and analyses by the researcher. Verbal and written explanation of the study, its purpose, procedures, requirements of students, and confidentiality, were given to the students throughout the data collection process. All these procedures were employed to ensure confidentiality for the individual students who participated in the research. Confidentiality for the institution was not required. As an employee of the Hong Kong International School, the present researcher was approved and encouraged by the principal to conduct this research.

Pre-existing Relationship

For research where the researcher and the participants are known to each other outside the research project, additional caution is needed, as outlined in Chapter 4 of the *National Statement on Ethical Conduct in Human Research* (2007). In particular, point 4.3.1 of the guidelines on Research Merit and Integrity states: being in a dependent or unequal relationship may influence a person's decision to participate in research. While this influence does not necessarily invalidate the decision, it always constitutes a reason to pay particular attention to the process through which consent is negotiated.

In the present study, the researcher's pre-existing relationship with the student varied from a mere acquaintance level to a student-teacher relationship. Many students in that class would have known at least by name or face who the researcher was as she was a member of the counselling department which was an integral part of the supportive services of the school. However, most students in this class did not have a counsellor-counsellee relationship with the researcher as the researcher was not assigned to oversee or counsel this particular class. Some of the students in the graduating class may have been a student of the researcher in a semester of Bible course two years prior to the research. A small group (18) of the graduating class was currently in a university

preparatory course taught by the researcher. While students may have looked upon the researcher as a counsellor or a teacher, the researcher was very careful to present herself in the role of a doctoral student doing research on adolescent development. On the two pieces of writing (Invitation and Letter of Consent and the letter to participant and parents) students received regarding the research, the researcher was described or titled as a doctoral student of the University of Technology, Sydney.

As mentioned above, the purpose and details of the research were explained to the students when they were invited to consider participating in the research. During the explanation of the individual instruments and questions, it was emphasized also that there were no correct or incorrect answers. The questions were to form a description or picture of aspects of their development. Students were asked to respond honestly and openly without fear of judgment by the researcher. The letter to participants and parents given to students upon completion of the questionnaire packet was again a reinforcing statement and promise, emphasizing how their responses would be kept confidential and their participation had no bearing or effect on their grade in any subject.

As outlined, precautions and steps have been taken to strictly follow ethical requirements in social research, maximizing freedom of choice to participate, confidentiality and safety to give honest responses, while minimizing any effects of pre-existing relationships.

The Sample

The Participants

The sample of the study entailed graduating seniors in the Hong Kong International School, in Hong Kong, China. Participants were therefore in their late teen years, about to embark on independent living in college or in the workplace. Convenience sampling (Babbie, 2004) was used as all graduating class members present on the day of the research were given the invitation to consider participating in the research. After the

purpose of the study was explained to the students in detail by the researcher, students had a choice to become the participants, that is, participate or not, in the study. The completed questionnaires returned became the sample for the study.

The sample size of this study (*n* = 163) comprised 87% of the graduating class. Of the twenty-five non participants of the study, fourteen were absent according to the attendance roster, two consented to participate but could not complete the instruments due to personal reasons, and one returned instruments that were incomplete. Eight students chose not to participate. Comparing the full cohort of 188 students and the 163 participants, the characteristics between the two groups were notably similar in gender proportion and ethnicity breakdown, as indicated in Table 1 below. The participants' average grade point average (GPA) was also comparable to that of the overall cohort. None of this is surprising, given an 87% participation rate. The sample of the present study therefore could be considered as representative of students in late adolescence (16 to 18) in the school.

Table 1 Characteristic Comparisons of Graduating Class and Study Participants

	HKIS Cohort Overall: 188		**Actual Respondents: 163**	
	Number	Proportion	Number	Proportion
Gender				
Male	84	45%	70	43%
Female	104	55%	93	57%
Ethnicity				
Chinese	100	53%	88	54%
Caucasian	60	32%	51	31%
Korean	17	9%	15	9%
Others (Japanese, Indian, Eura.)	11	6%	9	6%
Average Grade Point Average	3.08		3.10	

In-depth interviews were successfully arranged and conducted with seven interviewees who volunteered to participate in this second part of the qualitative data collection process. They were four female and three male students. Two of them were Caucasians and the rest of them of Chinese ethnicity. The interviews were conducted in English as all of them were English speaking. The purpose of the interviews was to present cases.

They were not necessarily typical of the whole sample, but collectively, rich qualitative data was provided that assisted in interpreting and complementing the quantitative data.

The Hong Kong International School Context

In the Hong Kong International School context, students have been trained in a western framework that includes cultural heritages of the US, UK, China, Australia and Europe. The school describes itself as providing 'an American style education'. The students are by heritage 70% Asian with Chinese being the dominant ethnicity, followed by Koreans and Japanese (see Table 1). Most of the ethnically Asian students have come from abroad, the United States, Canada, Australia, the UK, or have been in the international school context since early grades. The remaining 30% are Caucasians from North America and Europe. Students are English-speaking. The significance of such a combination of cultural backgrounds in this school is discussed in a later section.

The faculty and staff at the school by nationality (passport held) is 51% American, 10% Canadian, 7% Australian, 7% UK, 7% Hong Kong and China, and 18% from other countries (Handrich, 2004). While students are educated in a western framework, being raised and living in Hong Kong has direct impact on their development. In Chinese culture, academic achievement or improvement is often upheld as the most important indicator of positive growth leading to success. The main pillars of Asian culture are however taught to children and youth from a young age, regarding social appropriateness, respect for parents, elders and peers, and the maintenance of harmony in human relationships (Lam, 2005).

Reflecting a 'fusion' of Western and Asian cultures and influences, students have been trained in a context that values growth in various areas including academic excellence, character formation, cultural understanding, spiritual development, and contribution to society as reflected in the Student Learning Results established by the Strategic Plan of the school (Handrich, 2004). While these values and areas of growth do not represent all of western and eastern culture, the school seeks to pass on some of what it considers to be the best elements of the two cultures. The HKIS curriculum places emphases on social, moral, and spiritual development, helping students develop skills, understanding, and attitude toward positive growth in all areas. These areas are aligned with

developmental tasks necessary to be learned and achieved by adolescents according to developmental theories (Havighurst, 1971; Erikson, 1975). They are also similar to the areas of influence, described by Bennetts (2003), that a mentor has on the mentee's growth.

At HKIS, a phenomenon of engaging in informal mentoring can be observed. Students are encouraged to connect with their grade level deans/counselors, teachers, coaches, and other adults in the community. Informal opportunities are available including self-referred counselling, seeking out teachers for help. Another nurturing ground for the formation of mentoring relationships is the homeroom system which places students in a group that meets every day for a short period of time ranging from 15 minutes to 25 minutes, depending on the time table. The group or homeroom is led by the homeroom teacher who may or may not be a subject teacher to a student in his/her homeroom. Homeroom time is a time away from academic work. Students can play games in the homeroom, join activities or discussions led by their teacher or fellow students, read, or talk with their teacher or peers in the homeroom. A student stays in the same homeroom for the duration of high school (from grade 9 to 12) so that opportunities for bonding among them are increased. Students in the homeroom are in the same grade so that they are in the same developmental stages. Additionally, the school's academic curriculum and programs engage students in clubs, sports, and services outside of school, providing opportunities to connect with adults within and outside of the classroom. Mentor-mentee relationships can be developed with various adults in the community, including homeroom teacher, subject teachers, coaches, clubs and team leaders, counselors, and staff.

The participants of the present study therefore are students of a variety of cultural heritages, studying in an international school with a context and curriculum that reflect cultural input from the east and the west. The international nature of the sample could allow findings to be considered for young people of different nationalities and ethnicities. Employing the case study method, the present study did not attempt to investigate a large sample that would have included perhaps many more international schools or local schools.

The Instruments

This study employed four instruments, two of which were quantitative and two of which were qualitative:

1. Self Perception Profile for Adolescents (SPPA)
2. Inventory of Parent and Peer Attachment (IPPA)
3. Open questions in the questionnaire
4. Semi-structured interview schedule

The two quantitative instruments, the Self Perception Profile for Adolescents (SPPA), (Harter, 1988) and the Inventory of Parent and Peer Attachment (Armsden & Green, 1987) measure specific areas or domains of adolescent development. Data collected from these instruments answered the first set of research questions which focus on whether positive adolescent development is correlated with having experienced mentoring relationships and if so, which areas of adolescent growth are affected.

A questionnaire was developed as a qualitative instrument for completion along with the two quantitative instruments by all participants in the sample, as one package. The questionnaire used open questions to probe into the processes, content, and quality of the mentoring relationship. Finally, an interview schedule was designed and used in interviews with seven participants individually. The interview questions were more in-depth, requiring details on the initiating, development, and maintenance of the mentoring relationship. The questionnaire and the interview outline are in Appendices C and D respectively. Qualitative data from the questionnaire and the interviews answered the second set of research questions about the processes and experiences of the informal mentoring relationship.

The Self-Perception Profile for Adolescents (SPPA)

Among myriad instruments developed throughout recent decades to measure psychological well-being, social emotional development, and stage development, the present researcher decided to use the Self-Perception Profile for Adolescents (SPPA) developed by Harter of Denver University (1988). Neill (2007) of the University of Canberra, Australia, recently analyzed over 25 instruments in his Summary of

Instruments for Analyzing Personal and Group Change in Psycho-Social Intervention and Training Programs. He concluded that among the numerous instruments, the SPPA is one of the better known self-concept scales and one of the few designed specifically for adolescents. Since its creation in 1998, the SPPA has been well recognized, validated, and has continued to be used in research for adolescents globally. The SPPA has been cross validated with other established and recognized instruments such as the Rosenberg Self-Esteem scale (Hagborg, 1993). It has continued to be well used by researchers exploring a wide spectrum of issues and aspects of adolescent development. Some examples include Aasland and Diseth's (1999) research on the psychological outcome in adolescents with chronic physical disorders, Rhodes' (2000) study on the impact of mentoring on specific areas of development in adolescents, and Garst, Scheider and Baker's (2001) measuring of the impact of outdoor adventure program participation on self-perception.

As Harter's SPPA has continued to be used by researchers to study strategies to enhance adolescent development and related issues, the present study has also employed the SPPA to explore any difference between mentored and non mentored groups in the domains of growth among adolescents. *The Manual for the Self-Perception Profile for Adolescents* (Harter, 1988) that contains the instrument was purchased directly from Susan Harter and used with her permission. As HKIS students are proficient in English and have been in an English-medium of instruction school for most or all of their lives, the 1988 version of the SPPA was used without language change or any other adjustment.

A copy of the SPPA can be found in Appendix C. The Self-Perception Profile for Adolescents (SPPA, Harter, 1988) has undergone numerous tests for internal consistency reliability and validity and is recommended for adolescents from grade 9 to 12. The SPPA was an upward extension of the Self-Perception Profile for Children (SPPC, Harter, 1986). While the content of the original six domains was kept parallel across the child and adolescent versions, three additional domains, Job Competence, Close Friendship, and Romantic Appeal were added to the adolescent version, reflecting areas relevant and important in the teenage years (Harter, 1988). Harter's instruments have been well used by studies (including the present one) on strategies to enhance positive adolescent growth.

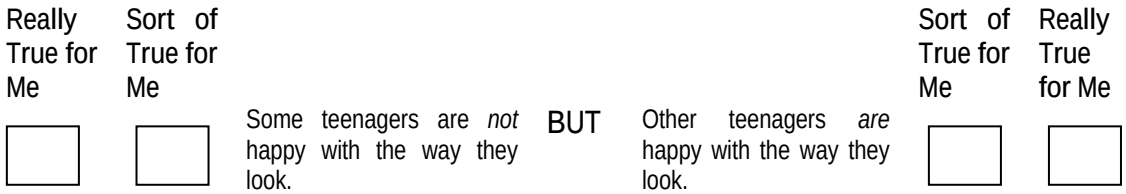
As the SPPA measures specific judgments of competence or adequacy in eight domains, each subscale provides a separate score, thereby allowing one to examine the adolescent's evaluative judgments across domains. Domains could be analyzed separately or together for correlations and relationships. Of the total forty-five questions, each domain has five questions contributing to the score for the domain. Questions asked on the SPPA have been carefully phrased, avoiding concerns for teenagers choosing answers considered as more socially acceptable. Rather than a scale 1 to 4 the SPPA poses questions in the format of "What Am I Like". Choices available to the teenager are as in the following example:

'Some teenagers like to go to movies in their spare time' BUT
'Other teenagers would rather go to sports events'

Students were to indicate which kind of teenagers they were more like. Then, they would choose between the additional choices of the degree to which they were like that group of people by choosing one of the following options.

'Really True for Me' OR
'Sort of True for Me'

Answers are scored from 1 to 4 according to the choices the students made. For example, according to the SPPA scoring key, the score 1 was assigned when 'Some teenagers are *not* happy with the way they look' and 'Really True for Me' were chosen. The score 2 was assigned when 'Some teenagers are *not* happy with the way they look' and 'Sort of True for Me' were chosen. Likewise, the score of 3 was assigned when 'Other teenagers *are* happy with the way they look' and 'Sort of True for Me' were chosen, and the remaining option was assigned the score 4. Only one score out of the four possible choices would be assigned per question. Scores were assigned and recorded by the researcher, not by the students. The scores were not visible to the respondents. The following is a sample sentence from the Scoring Key. The number in the box would be the score for the sentence should the box is checked with the student.



For the present study, two domains, Scholastic Competence and Global Self-Worth of the SPPA were of particular consideration. These were two of the four dependent variables for the present study. Related to self perceived scholastic competence was the actual achievement which was reflected by the grade point average (GPA) of the student. The cumulative GPA of each participant up to the last semester was accessed through the school record, with permission from the school principal and the informed consent of the student. The cumulative GPA of the student was used as it was the average academic achievement of the student for the entire time they were at the high (secondary) school, rather than his/her achievement in the last semester only. The cumulative GPA therefore better represented the 'actual achievement' of the student.

The Inventory of Parent and Peer Attachment (IPPA)

Two other dependent variables to reflect aspects of adolescent development were relationship with peers and relationship with parents. These were measured by the Inventory of Parent and Peer Attachment (IPPA, Armsden & Greenberg, 1987) which was developed to assess adolescents' perceptions of their relationships with their parents and close friends. Specially, the positive and negative affective and cognitive dimensions of relationships were measured to examine how strongly these figures serve as sources of psychological security. The concept of psychological security was introduced in the theoretical framework of Attachment Theory (Bowlby, 1969).

Despite the importance of Attachment Theory in developmental research, there is an absence of valid and reliable tools with which to assess attachment beyond infancy and prior to late adolescence (Gullone & Robinson, 2005). Recognizing that the IPPA developed by Armsden and Greenberg is one of few such instruments, Gullone and Robinson (2005) developed a revised version for children and young adolescents to suit

their research among younger students. Also based on the IPPA, another instrument was developed to study attachment from the parent's perspective (Johnson, Ketring & Abshire, 2003). As an established and trusted instrument, the IPPA was used to validate other tools such as the Attachment Questionnaire for Children (AQ-C) by Muris, Meesters, Melick and Zwambag (2001). Linking attachment with teen issues such as depression, anxiety, and family relationships, the IPPA has been deployed to measure the quality of attachment compared with level of depressive symptoms by various researchers (Armsden, McCauley, Greenberg, Burke & Mitchell, 1990; Muris, Meesters, Melick & Zwambag, 2001). Research on strategies to enhance adolescent growth has employed the IPPA. For example, using the IPPA, Aseltine, Dupre, and Lamlein (2000) found that students who were in the mentored group had significantly lower levels of problem behavior and alcohol use and higher levels of self-control, cooperation, and attachment to school and family than those of the control group. Rhodes et al. (2000) examined in detail a major structured mentoring program, the Big Brothers Big Sisters program in the US, among 1,138 young urban adolescents. The IPPA was used to find any significant difference in relationship with parents (in the form of attachment) between the control (no mentoring) group and the treatment (with mentoring) group.

The measuring of adolescents' relationship with parents and peers is relevant in addressing the Western concept of the self in social-emotional development of the self in identity and behavior. In the Asian framework, successfully relating to relationships in the adolescent and adult world is a priority for a young person becoming mature (Lam, 2007). Therefore, the measuring of relationship with parents and peers is valued in both Western and Eastern traditions, and the IPPA is an important instrument that measures growth areas relevant to adolescents in various cultural contexts. For this reason, the IPPA's proven reliability and worldwide recognition, the present study has selected the IPPA as one of its tools to measure two dependent variables of adolescent development.

The IPPA was purchased and used with permission through the ETS Collection online. The version updated with Mother, Father, and Peer Attachment scales was used as advised by the IPPA authors. The English version was used with no translation or adjustment as all participants were English-speaking.

The IPPA (see Appendix D) has 25 items in each of the mother, father, and peer sections, yielding three attachment scores. It assesses three broad dimensions: degree of mutual trust; quality of communication; and extent of anger and alienation for each of these sections (Armsden & Greenberg, 1987). The instrument is a self-report questionnaire with a five point likert-scale response format ranging from 1 (almost never or never true), 2 (not very often true), 3 (sometimes true), 4 (often true), to 5 (almost always or always true). Parent and peer attachments have been found to correlate with positivity and stability of self-esteem, life satisfaction, and affective status (such as depression, anxiety, covert anger, loneliness) (Armsden & Greenberg, 1987), problem-solving, coping strategies and emotion-managing efforts in stressful situations (Armsden, 1986). While overall attachment scores for peers, mother, and father are the main data for comparison, the subscale scores are useful for more detailed comparison and detection of less apparent differences. Internal reliability of the IPPA, using Cronbach's alpha (Cronbach, 1951) is high with Mother attachment, .87; Father attachment .89; and Peer attachment .92 (Armsden & Greenberg, 1987). Cronbach's alpha determines the internal consistency or average correlation of items in the instrument to measure its reliability. The validity of the IPPA was tested for positive correlation with other scales such as the Tennessee Self Concept Scale and the Family Environment Scale (Armsden & Greenberg, 1987). The IPPA has been considered a reliable instrument to measure critical areas of positive growth in adolescents and children.

The Questionnaire on Mentoring

According to many researchers, qualitative methods are particularly useful in evaluating programs that are embedded in human organizations such as schools (Guetzloe, 1997; Karcher & Lindwall, 2003; Lawson, 1997; Welkoitz, Broer, Topper, Thomas, Backus, & Hamilton, 2000). Therefore, qualitative data were collected to supplement and confirm or disconfirm any quantitative finding and to inform how the mentoring relationships were formed and nurtured and how the mentors have helped the student. As noted by Babbie (2004), open ended questions are often used in interviews and sometimes they are written down and given to respondents for completion.

The open ended questions in this study were posed in writing for students to give their individual responses also in writing (see Appendix E). An example of a qualitative question is ‘how did the mentoring relationship begin?’ The questions were piloted with five students who were not part of the cohort for the actual study. This was to ensure that the questions were piloted with the study’s participants. They were students in the same school and close in age to that of the participants. Some of them may have been younger by one year as they were in grade 11, one class lower than the graduating class. Their level of understanding of the questions was expected to be similar to that of the participants. Their feedback gave opportunities to refine the contents, wording, and length of the questions, ensuring the questions’ clarity and appropriateness for the target sample, as suggested by Cohen, Manion, and Morrison (2000) and Babbie (2004). Minimal changes were made; for example, the question “How often did you meet with each of your mentors?” was edited to “How often did you meet (spend time) with each of your mentors?” to help define the meaning of ‘meet’. As participants were already asked to complete the two quantitative instruments, it was important to limit the number of qualitative questions in this study. Upon checking, editing and refining, the questions were finalized.

The question of having had a mentor was quantified into a range. Students were asked to reflect on whether they’ve had one or more mentors during their years of growth. The first question posed to the participants was similar to that used in Bennetts’ study (2003, p. 64), “There has been one or more adult(s) who has/have been responsible for helping your potential to develop most fully.” Bennetts’ original question was “Who in your life has been most responsible for helping your potential to develop most fully?” For the purpose of determining if there has been a person or not, the question for the present study was posed as a statement for students to respond to first. Additionally, to allow for more than one mentor, the words “one or more adult(s)” were included. The question of ‘who’ were the mentors was addressed in the next question on the questionnaire. The mentors could be any significant adult that has helped them grow, including a parent, an aunt, an uncle, a teacher, a counselor, a youth group leader, a friend of the family, a pastor, etc. It was emphasized to the students that a mentor referred to an adult, someone significantly older or in a different life stage than themselves, thereby excluding peer relationships. Students rated themselves on a scale of 1 to 5 regarding the degree to which this statement applied to them with ‘one’ being

'not at all agree' to 'five' being 'very much agree'. Thus, the students self-selected into groups ranging from 'much mentored' to 'not mentored'. Questions on who their mentors were and how much support they received then followed. Students could 'check as applied' from a list that included teacher, counselor/dean, parent, older sibling, older friend, uncle/aunt, and 'other' (specification requested). Subsequent questions explored the mentoring relationship on how the relationship began, how often they met, what areas of help were given and how the relationship was maintained or further developed. In informal mentoring, mentors and mentees did not necessarily meet regularly to talk about 'a problem'. When they did meet, there was no particular 'agenda'. These are some of the characteristics of informal mentoring. The qualitative data resulting from the questions provided rich information on the development and processes of mentoring.

The Interview Schedule

According to Kvale (1996), the qualitative research interview seeks to describe the facts and the meaning of central themes in the life world of the participants. The main task of interviewing is to understand the meaning of what the interviewees say. Interviews are therefore particularly useful for getting the story behind the subject's experiences. The interviewer can pursue in-depth information on the topic. Interviews may be useful as follow up to further investigate responses to the questionnaire completed previously (McNamara, 1999). The interviews in the present study were conducted with such a purpose, to further investigate and identify experiences and meanings of the mentoring relationship from a number of respondents who had completed the questionnaire and the instruments. Additionally, the interviews provided more in-depth information to explain some of the questionnaire responses.

In qualitative research, there are different types of interview that range from Informal Conversational Interviews with questions emerging and asked in the natural course of the conversation with no predetermined questions or wording, to Closed Quantitative Interviews in which all interviewees are asked the same questions and are to choose answers from among the same set of alternatives (Cohen, Manion & Morrison, 2000). The present study used the Interview Guide Approach with components of the Standardized Open-ended Interviews which is an interview type in between the two

mentioned types. Topics and issues were specified in an outline (see Appendix F) and the same set of questions was used with the interviewer being able to ask the questions in various sequences so that the interview remained conversational rather than in a question-answer format. As the same questions were asked of the interviewees, the data collection was systematic, allowing for comparison of responses among the interviewees. The interviews were conducted in English. Students did not have difficulty expressing themselves in English as the school was an English-medium school. Most students have high proficiency in English.

The interview questions further explored the mentoring relationship through open-ended questions that allowed the subject to give anecdotal comments on relationship, stories, events, and incidents.

The Data Collection Process

Responses to the questionnaires and the two instruments (SPPA and IPPA) were collected through one packet. Participation in the study was voluntary as the researcher explained to each senior class of 12 to 20 students the purpose and procedure of the study. Students signed a consent form and were given a letter explaining the research. Students were assured verbally and in writing of confidentiality and that their decision to participate or not would have no effect or influence on their grade whatsoever. Students choosing not to participate in the research were to do their own work or read quietly. The researcher then distributed the packet to participating students. The packet entailed the Questionnaire on Mentoring, the SPPA, and the IPPA. The first statement that defined a mentor was read aloud and explained further to ensure a consistent understanding among the participants. The sample question at the beginning of the SPPA was also discussed in each class, and similarly, the first question of the IPPA on mother attachment was explained to assure students' understanding of how to complete each instrument. Any further questions were clarified and participants were then

allowed to start completing the packet. Participants were given up to the whole lesson of 50 minutes to complete the packet. While some completed in less than 30 minutes, all participants completed the packet well before the end of the class. Packets were collected and put aside, ready for coding. Each of the completed packets was assigned a number, corresponding to the name of the student on a coding sheet. The same researcher conducted the research in each of the senior classes, collecting 163 completed packets. Students could not be identified from the packet as students were not required to write their name on the packet. The coding sheet with student name and assigned number was used for the purpose of recording the student GPA only. Once each student's GPA is placed next to his/her assigned number, the coding sheet was filed away.

The second part of the qualitative data involved interviews with seven students individually. All participants in the sample who completed the questionnaire and the two quantitative instruments were informed of the option to participate in an in-depth interview regarding their mentoring relationship. Interested candidates could contact the researcher and appointments were arranged for an interview. Interviews were successfully arranged and completed with seven participants within two weeks of completion of the questionnaire and instruments.

Interviewees were asked to reflect on and describe how the relationships were developed and nurtured in greater detail than that required in the written questionnaire. Interviews were conducted in English and in the researcher's office. Interviews lasted between forty-five minutes to one hour and a half. Audio-taping was not used to avoid any sense of intrusion felt by the interviewee during the interview. Instead, detailed notes were taken by the researcher during the interview using the computer. As the researcher had excellent typing skills, the spoken words and main points of the interviewees were captured in full. The main points and meaning of spoken words were checked with the interviewee throughout the interview to ensure accuracy of recording of the interviewee's responses.

Data Analysis

Both quantitative and qualitative data were collected with the former to examine any correlations of mentoring and positive adolescent development and the latter providing descriptive information on the process and quality of mentoring. While correlations were determined through analyses of the quantitative data, the qualitative information provided evidence toward explaining some of the phenomena discovered by the quantitative results. Analyses among the groups varying from no mentoring received to very much mentored were conducted to determine any significant differences in means for each of the dependent variables. Then, *t*-tests were applied between various groups of two, contrasting, for example, the extreme groups (groups 1 and 5) and other combinations of two groups. Analyses were further performed on a subgroup of the entire data with parents as the only mentor removed, to more accurately determine the correlations of positive adolescent development with mentoring alone. Emerging themes were determined from the qualitative data that revealed processes that contributed to the beginning, continuation, and maintenance of mentoring relationships. Details of each of the analyses performed are described below.

For the analysis of the two quantitative instruments, the independent variable was mentoring. It was part of the experience of the students and not a present 'treatment' or intervention for the students. Mentoring could have taken place in the community, in school, at home, or elsewhere, depending on whom the mentor was and how the relationship developed.

Four dependent variables were selected to reflect the areas of adolescent growth already studied by researchers. These were: perceived scholastic achievements and actual academic achievement, self worth, parent relationships and peer relationships. These variables do not represent all areas of positive growth. They were selected based on their significance in the cultural context of the Hong Kong International School (as described earlier), the availability of reliable instruments to measure these variables, and the availability of similar data from a previous study by Rhodes, Grossman and Resch (2000) for comparison purposes. The first variable was academic achievement

measured by scholastic competence (confidence in school work) scale (of the SPPA) along with the actual grade point average (GPA), representing actual academic achievement of the student. The second variable, self worth, also measured by the SPPA, was the youth's belief in his/her own competence, sense of belonging, and value. This variable indicated growth beyond social and academics, but in one's own sufficiency and worth. As positive relationships with peers and parents have been considered as indicators of social emotional development and well being (Jekielek et al., 2002), the third and fourth variables were attachments to parents and peers, measured by the IPPA.

To address the first research question of whether or not informal mentoring had effects on positive adolescent growth, comparisons between and among groups from different levels of mentoring were explored. Students were asked to reflect on whether they've had one or more mentors during their years of adolescence. Students were grouped into five groups, according to the choices they made on the Likert scale from '1' being 'not at all mentored' to '5' being 'very much mentored'. Participants that reported the statement of having had a mentor to be 'not at all true' belonged to Group 1, the Not At All Mentored Group; participants choosing the 'not very true' option formed Group 2, the Not Very Mentored Group; participants reported 'somewhat true' formed Group 3, the Somewhat Mentored Group; participants choosing 'quite true' belonged to Group 4, the Quite Mentored Group, and those reporting 'very true' formed Group 5 the Very Much Mentored Group. Table 2 below details the five groups.

Table 2 Groupings and Number of Students by Groups, *n* = 163

5 Groups Numbers	***Group Name (from questionnaire)***	***Number of Students***	***3 Groups Labels***	***Group Name***	***Number of Students***
1	not at all mentored	6	A	low mentoring	19
2	not very mentored	13			
3	somewhat mentored	27	B	medium mentoring	27
4	quite mentored	63	C	high mentoring	117
5	very much mentored	54			
	TOTAL:	163		TOTAL:	163

For comparisons among groups, Analyses of Variance (ANOVAs) appropriate for comparison of means among more than two groups were performed to identify any significant differences among the groups for each of the dependent variables. Independent sample tests such as Levene's Test for Equality of Variances and *t* -Tests for Equality of Means were also performed to detect any significant difference between two groups in each of the domains in the SPPA and the subscales in the IPPA. Comparisons were first made between the extreme groups, that is, group one and group five and with other groupings.

Additionally, as the numbers of students in certain groups were particularly small, groups were also placed together to form three groups, for further analyses in one way ANOVA comparisons. For example, groups 1 and 2 (the Not At All Mentored and Not Very Mentored groups) were grouped together to form Group A, named as Low Mentoring, groups 4 and 5 (students answering 'quite true' and 'very true' were grouped together to form Group C, named as High Mentoring, and Group 3 (students answering 'somewhat true') remained as a group on its own as Group B, named as Medium Mentoring. Table 2 above indicates the grouping, group names and the corresponding number of students in each group. This group formation was by logic and convenience, combining the two groups of similar positions into one group and the middle one remaining as one group, resulting in three groups as required by ANOVAs. Comparisons were made for significant differences of means of the various dependent variables among the groups.

Performance of tests and analyses on specific components of the data were carried out as needed to determine more accurately any influence of mentoring. For example, data that had parents as the only mentor to the subject were removed, leaving only those with other adults as mentors or parents and other adults as mentors. Analyses were performed on the more specific data for any significant differences in the dependent variables. In this way, results could be considered as correlations with mentoring, rather than parenting.

Following the ANOVA analysis, *t*-tests were performed. For this purpose, the participants needed to be divided into two groups for comparison. Three sets of t-test were performed:

- comparing groups 1 versus 5
- comparing groups 1 & 2 combine versus groups 4 & 5
- comparing groups 1 & 2 & 3 combined versus groups 4 & 5

The results of the ANOVA and *t*-test analyses will be discussed in Chapter 4.

The descriptive data from the questionnaire were recorded and organized on a spread sheet. Responses to the questions that explored the mentoring relationship were recorded by topics explored on the questionnaire, as follows:

- How the relationship began.
- How often meetings occurred
- What areas of help were given?
- What was most effective in helping the mentee?
- How the relationship was maintained or further developed.

These questions also served as categories under which data were organized. Written notes from the seven in-depth interviews were also transcribed onto the spread sheet so that all qualitative data were in one place for analyses. Responses to questions and in the interview were coded for referencing and quotation purposes. For example, Q23 would be a quote from responses on questionnaire #23, and I4 would be a quote from responses on interview schedule #4. As outlined by Byrne (2001), the next step in the process of data analysis was to pare down the data to represent major themes that describe the phenomena being studied. Data reduction assists in 'making sense' of the large amount of data and facilitates communicating the findings simply and efficiently. This paring down is termed 'thematic analysis' (Miles & Huberman, 1994). For each of the questions or categories explored on the questionnaire, the responses were read, re-read, and studied. Any patterns and themes stemming from repeated statements, comments, or ideas from the participants' own words were noted. Themes could be identified from the words the participants used in their answers to the questions. The emergent themes were compared with the raw data again to ensure they accurately represented the responses.

Two readers, the researcher and one other researcher unassociated with any other sections or processes of the present research, studied the descriptive data and went

through the thematic analysis process. The two lists of themes for each category were compared and checked for any discrepancy. A final list of themes for each category was then completed. The details and anecdotal descriptions collected from the interviews were included in the thematic analyses and also served as cases to illustrate some of the main themes and trends and to further describe the formation, development, and maintenance of mentoring relationships, and the quality, frequency, and content of mentoring. As the results entailed the description of themes that emerged from the data, no further reduction or interpretation of the data was required for the reporting of the results. Examples of actual comments or expressions from the participants under each theme demonstrated the logical emergence of the themes.

Summary

The present study adopted a case study method, focusing on the graduating class of the Hong Kong International School. In accordance with the case study approach, the sample is a specific instance to illustrate more general principles on adolescent development and mentoring. It is an example of real people in real situations. Both quantitative and qualitative approaches were employed in data collection and data analyses to answer the research questions of whether or not positive growth in adolescents is correlated with adolescents having experienced informal mentoring relationships, and how are informal mentoring relationships formed, maintained and developed. The combination of the two approaches in this study permitted a more comprehensive exploration and understanding of the results and related issues.

A total of 163 graduating seniors completed the package that contained the qualitative questionnaire and two instruments. Harter's SPPA (1988) and Armsden and Greenberg's IPPA (1987) were used as instruments to measure the four dependent variables. The instruments were selected for their proven reliability, continued usage by other researchers, and appropriateness specifically for adolescents. The four dependent

variables reflecting positive growth in adolescents were academic achievements along with scholastic competence, parent relationship, peer relationship, and self worth, which corresponds to the youth's belief in his/her own competence, sense of belonging, and value. A questionnaire was developed, containing nine open-ended questions to collect qualitative data to answer the second set of research questions.

The second part of the qualitative data involved interviews with seven students individually. Students were asked to reflect on and describe how the relationships were developed and nurtured in detail. The interviews were conducted in an Interview Guide Approach with components of the Standardized Open-ended Interviews (Cohen, Manion & Morrison, 2000). Interviews followed an outline of the questions to maintain consistency among interviews. While all questions were asked of all interviewees, latitude was exercised in the order of the questions asked to ensure a conversational flow and flexibility in obtaining quality data from interviewees.

Confidentially was a priority in the quantitative and qualitative data collection process, encouraging response honesty among participants. The researcher was the only person conducting the data collection, avoiding inconsistency in data collection approaches. Tests for significant differences and comparisons (ANOVAs and t-Tests) were performed on the data with variations on grouping. The descriptive data were recorded and organized. The second part of the qualitative data from the interviews served as cases to illustrate main themes and trends. Two readers, the researcher and one other researcher otherwise unassociated with the present research, studied the descriptive data noting emerging themes, trends, and repeated statements or ideas. Both readers conducted thematic analyses (Miles & Huberman, 1994) on all of the qualitative data, comparing and cross-checking to form the list of themes. Reporting of the themes was supported by quotes from anecdotal comments and words spoken by the participants. The following section reports the findings of this study.

Chapter 4

Results and Discussions

Introduction

This chapter presents the results (analyzed data of the study) and discussions of the findings. In accordance with the design of the study and research questions, the quantitative results presented first address the question of whether or not informal mentoring was correlated with positive growth in adolescents; if so, what were the areas affected. Correlations of mentoring with variables on adolescent development were tested through Analyses of Variance of Means (ANOVAs) among groups. Then, tests of significant differences between two groups (*t*-tests) were performed to determine correlations between the same. The tests were performed again on a subgroup of the data which excluded participants whose only mentors were parents. This was to separate any effects of parenting from the results. Results are discussed with references to possible explanations, previous research findings on formal and informal mentoring, and existing theories on mentoring. Discussions are held for both findings of positive correlations between informal mentoring and adolescent growth and findings of no correlations between the same. The qualitative data that explored the processes and experiences of informal mentoring among participants are presented and discussed. The data describes how mentoring relationships were formed and developed, yielding insights on the processes of mentoring, how mentoring began and what made mentoring work, based on the themes that emerged from the data. In addition to discussing the findings with references to theories and previous research findings on mentoring strategies, the qualitative data often provided support and explanations for some of the quantitative results. The usage of both quantitative and qualitative approaches was demonstrated to be useful, yielding comprehensive results that help in the furthering of understanding of informal mentoring.

Correlation of Informal Mentoring with Positive Growth

The participants of the study were graduating seniors (grade 12 students) in the Hong Kong International School. They (n = 163) were teenagers in their late adolescence and soon embarking onto young adulthood. To address the first research question of whether or not informal mentoring had effects on positive adolescent growth, specific areas of growth were addressed. They included parent relationship, peer relationship, academic achievement (perceived and actual) and self value. Comparisons between and among groups from different levels of mentoring were explored. Students were asked to reflect on whether they've had one or more mentors during their years of adolescence. Students were grouped according to the choices they made on the Likert scale from '1' being 'not at all mentored' to '5' being 'very much mentored'. As detailed in Table 2 in the previous section, different groupings were used for comparison among groups and between groups. The ANOVA searched for significant differences of means of among the groups for each of the dependent variables, to determine if mentoring was correlated with variables such as academic achievement and relationship with parents. To determine differences between two groups, *t*-tests were employed, comparing, for example, the Not At All Mentored Group (Group 1) and the Very Much Mentored Group (Group 5).

The Inventory of Parent and Peer Attachment

Parents

For ANOVAs which determine differences between two or more groups, the three groups arrangement was used. Groups 1 and 2 were combined to form the Low Mentoring Group to yield a larger sample size for comparisons, and groups 4 and 5 were combined to form the High Mentoring Group. Group 3 remained the Medium Mentored Group. Significant differences were found among the groups in Mother Attachment with $F = 3.47$, $p < .05$ and in Father Attachment with $F = 4.57$, $p < .05$. This indicated that students involved in the various levels of mentoring had different levels of attachment to their parents. Table 3 presents the differences in parent attachments and significant differences in more specific domains on the Inventory of Parent and Peer Attachment (IPPA). Communication with Mother ($F = 4.20$, $p < .05$, Alienation from Mother ($F = 3.17$, $p < .05$), and Communication with Father ($F = 6.31$, $p < .01$)

were domains that had significantly different results among the groups. The significant difference was especially strong for Father Communication with p value at less than .01. ANOVA comparisons indicated positive correlations between mentoring, Mother Attachment, Father Attachment, Mother Communication, Mother Alienation, and Father Communication. Therefore, students who have been mentored expressed different experiences of attachment, communication and feelings of alienation with their parents.

Table 3 ANOVA Test of Difference in Means Among Groups: Parent Attachments

	All Data ***n = 163***				**Data excluding students mentored by parents ONLY, *n = 130***			
	Informal Mentoring				***Informal Mentoring***			
Dependent Variables/ Groupings	Group A: Low Mentoring Group *n*=19	Group B: Medium Mentoring Group *n*=27	Group C: High Mentoring Group *n*=117	F	Group A: Low Mentoring Group *n*=15	Group B: Medium Mentoring Group *n*=24	Group C: High Mentoring Group *n*=91	F
Mother Attachment	90.53	84.19	93.68	3.47*	91.13	82.21	92.98	3.69*
Father Attachment	76.83	82.58	89.90	4.57*	77.78	81.96	90.43	3.92*
Mother Communi-cation	29.11	27.74	31.62	4.20*	28.53	27.13	31.59	4.90**
Mother Alienation	21.79	19.48	22.01	3.17*	22.27	19.08	21.83	3.39*
Father Communi-cation	21.78	26.00	28.87	6.31**	21.86	25.91	29.18	6.81**

*p < .05, **p < .01

Mentored, Not Parented

With parents being a major group of mentors for the participants, the effects of mentoring could be confused as the effects of parenting. The group that had parents as the *only* mentors could be argued as being 'parented' rather than 'mentored'. To separate the effects of mentoring from those of parenting, participants who named their parent as their only mentor (33 in total) were removed from the main data. The remaining 130 participants had either one mentor who was *not* their parent or other adults as mentors in addition to their parents. These other adults included school personnel, older friends, older siblings, uncles or aunts, grandfathers, coaches, etc. The same analyses were performed for any significant difference correlated with mentoring.

ANOVA comparisons of means of the dependent variables were performed to compare the Low Mentoring Group, the Medium Mentoring Group, and the High Mentoring Group. Significant differences as presented also in Table 3 were found among the groups in Mother Attachment with $F = 3.69$, $p < .05$, and in Father Attachment with $F = 3.92$, $p < .05$. Mentored students were significantly more attached to one or both of their parents than were non mentored students. Among the same groups, significant differences were also found in Communication with Mother ($F = 4.90$, $p < .01$) and Communication with Father ($F = 6.81$, $p < .01$), and Alienation from Mother ($F = 3.39$, $p < .05$). Analyses with the subset of the data that excluded students mentored by parents only yielded the same results as those using the entire data. Therefore, mentoring, not just parenting, was correlated to Alienation from Mother, Attachment to, and Communication with Mother and Father.

Significant differences in parent attachment were found in *t*-tests of equality of means between the two extreme groups of the data, the Not At All Mentored Group (Group 1) and Very Mentored Group (Group 5). Table 4 presents the comparisons between these groups in Mother Attachment ($t = - 1.91$, $p < .05$) and in Father Attachment ($t = -2.70$, $p < .05$). Differences were also confirmed in specific domains of Communication with Mother ($t = -2.94$, $p < .01$) and Communication with Father ($t = -4.04$, $p < .001$) between the two same two groups. As the sample size of Group 1 was small, groups were placed together for additional *t*-test comparisons. Groups 1 & 2 formed one group to be compared with a group formed by combining Groups 4 & 5. The middle group, Group 3, was left out. No significant difference was found with this grouping. Another grouping was tried utilizing all the data to form two groups of larger sample sizes, for another *t*-test comparison. As the sizes of Groups 4 and 5 were relatively large, by logic and group sizes, Group 3 was placed with Groups 1 and 2 to form the Barely Mentored Group, totaling 46 in number. Groups 4 and 5 formed the Mentored Group which had 117 students. With this grouping, significant difference also resulted in Mother Attachment ($t = -2.32$, $p < .05$), Father Attachment ($t = -2.54$, $p < .05$), Mother Communication ($t = -2.82$, $p < .01$) and Father Communication ($t = -3.12$, $p < ,01$). In this grouping and the first grouping, significant differences were especially strong between groups in Father Communication with $p < .01$ and $p < .001$. The p value being less than .01 means that less than 1% of the time would the statistical process produce a finding this extreme if the null hypothesis (of no difference) were true. Therefore,

students who have been mentored were more likely to experience positive parent relations. Conversely, students who have barely been mentored were less likely to experience attachment and positive communication with their parents.

Table 4 T-Test of Equality of Means Between Groups: Parent Attachment

	Informal Mentoring					
	All Data					
Grouping/ Dependent Variables	Not At All Mentored (Group 1)	Very Much Mentored (Group 5)	*t*	Barely Mentored (Groups 1, 2,3)	Mentored Group (Groups 4&5)	*t*
Mother Attachment	82.33	96.50	1.91	86.80	93.68	-2.32*
Father Attachment	63.17	95.75	-2.70*	80.23	89.90	-2.54*
Mother Communication	24.50	32.80	-2.94**	28.30	31.62	-2.82**
Father Communication	17.33	31.87	-4.04***	24.27	28.87	3.12***
	Data with parents		***Students ONLY***	***mentored by excluded***		
Mother Attachment	82.33	96.93	-1.93	85.64	93.0	-2.21*
Father Attachment	63.17	97.00	-2.81*	80.38	90.43	-2.73**
Mother Communication	24.5	33.18	-3.11**	27.67	31.59	-3.07**
Father Communication	17.33	31.86	-5.34**	24.38	29.18	-3.30**

*p < .05, **p < .01, ***p < .001

The *t* tests performed on the entire data were also applied on the sub-cohort of the data with 'parents as the *only* mentor' removed. The results yielded similar significant differences. Table 4 above also presents significant differences through *t* test between the Not At All Mentored Group and the Very Mentored Group in Father Attachment (t = -2.81, p < 05), Mother Communication (t = - 3.11, p < .01), and in Father Communication (t = -5.34, p < .01). The *t* tests of equality of means also confirmed the differences in Mother Attachment (t = -2.21, p < .05) and Father Attachment (t = -2.73, p < .01), and in specific domains of Mother Communication (t = -3.07, p < .01), and Father Communication (t = -3.30, p < .01) between the Barely Mentored Group and the Mentored Group. The results indicate that students who were mentored had significantly stronger attachment to and communication with their mother and/or father.

It is noteworthy that using data that excluded 'parents *only* as mentors' (n = 130) yielded the same results as those using the entire data (n = 163). Significant correlations between mentoring and parent-child relationship were present in both analyses. Even when participants who only had parents as their mentor were removed from the data, the effects of mentoring remained apparent and strong. This implied that the results were not about 'parenting', but about a broader effect, that of mentoring.

Overall, the data indicated that mentored teenagers communicated significantly better with their mother and father than the less-to-non mentored teenagers. There was therefore a correlation between parent-child relationship and mentoring relationship. Teenagers who were mentored had better relationships with their parents as demonstrated by higher attachments to mother and father, better communication with, and less alienation from parents. This is consistent with findings from an earlier study by Rhodes, Grossman and Resch (2000) on formal mentoring relationships. Improvement in parental-child relationship was one of the aspects of adolescent growth found to be positively related with mentoring.

The question of 'direction of influence' is significant here. Does mentoring positively impact parent-child relationship or vice versa? Previous research has provided evidence for the direction of influence being from mentoring to parent-child relationships. In a study by Rhodes, Conreras and Mangelsdorf (1994) on natural mentoring relationships among Latina adolescent mothers, it was found that mentoring relationships appear to enhance young women's capacity to benefit from their supportive resources, including parental support. Results from more recent research have evidenced the same direction of influence, that mentoring relationships enhance the young person's relationship with his/her parents (Keller, 2005b; Rhodes et al., 2000, 2002). The present study affirmed that informal mentoring is positively correlated to improvement in relationships with parents. Significant differences in all three dimensions of assessment of parent-child relationship specified by the Inventory of Parent and Peer Attachment (Armsden & Greenberg, 1987) were found. Students who have experienced informal mentoring had positive attachment to mother and father, less alienation from mother and better communication with both parents. The present study, however, could not demonstrate that these aspects of positive growth were caused by informal mentoring, only that they were correlated.

An enhanced parent-child relationship opens up positive influences on other domains of adolescent development as asserted by Rhodes, Grossman and Resch (2000) who theorized that mentoring effects positive growth in global self-worth, perception on school value, and academic achievements, mediated by improved parental relationships. While the indirect effects of mentoring mediated by improved parental relationships were not specifically analyzed as these were not the goals or focus of the present study, this intriguing theory on the mediated process deserves further research.

How May Mentoring Influence Parental Relationship?

Although the present study only studied correlation, not causality, the question of *why* or *how* mentoring relationships influence the parental relationship has been explored in previous research, with various theories proposed. Among them, the processes proposed by Rhodes (2002, 2005) that take place in mentoring relationships are noteworthy for this question. Rhodes proposes that mentoring relationships promote the social and emotional well-being and development of youth. Mentoring provides opportunities for positive emotional experiences that may generalize to and improve youths' social relationships with other people. Results from the present study, that mentored students have better relationships with their parents, affirmed Rhodes' proposed notion. Through corrections and support from their mentors, students may have gained skills and emotional readiness in relating to adults beyond their mentors, in this case, parents. The positive experience could extend to relationships which will continue to give confidence to the youth in further relationships with adults. Positive gains from being in a relationship with an adult can be harnessed for other relationships.

Rhodes' theory echoes the Attachment Theory originated by Bowlby (1988) who observed that when the child knows the mentor is a dependable source of protection and support, a sense of security accrues in the child. He or she is then willing and able to engage in productive exploration of the social environment that leads to the development of knowledge, skills, and competence (Ainsworth, 1989; Bowlby, 1988). In the present study, students' descriptions of their feeling safe, not judged, accepted and always being able to go to their mentor reflected Attachment Theory's key concepts of a safe haven and a sense of security that gave strength to the mentee to reach out to other relationships. Mentors, in the context of Attachment Theory, are functioning as

attachment figures, providing a secure base from which youth can make crucial social and cognitive strides. Better relationships with parents may be a result of one of the strides taken by the youth.

Comparison with Rhodes' Study on Informal Mentoring

The present study utilized quantitative methods of comparison between mentored and unmentored youths and instruments including the IPPA and SPPA similar to those in the Rhodes study in 2000. However, two contrasts are noteworthy: formal mentoring and sample size. Rhodes et al. analyzed the effects of formal mentoring in which youths experienced mentoring with intentional adult mentors through structured programs (Big Brothers Big Sisters programs). Adult mentors were trained and youths volunteered their participation. The Big Brothers and Big Sisters organizations existed to enable successful formal mentoring relationships, providing pairing, support and guidance for mentees and mentors. The present study explored informal mentoring relationships, ones developed, maintained, and happening in everyday life through natural relationships. Relationships were formed without pairing, support or guidance from an external source. The findings were that informal mentoring relationships contributed significantly to adolescent development, specifically in the adolescent's relationship with his or her parents. Secondly, the same major finding of Rhodes, better parent-child relationship with the mentored group, was apparent despite the smaller sample size of this study (n = 163) based on a specific population, an international school in Hong Kong, compared with Rhodes et al.'s sample size of 959 young adolescents in the US, the same major finding of better parent-child relationship with the mentored group was apparent. Assuming that causality could be implied, this result demonstrates the potential impact of informal mentoring on a significant part of the social-emotional development of an adolescent, the ability to relate to his or her parents.

Peers

As one of the dependent variables of the present study was peer relation, ANOVAs were performed on the data for Peer Attachment among Low Mentoring Group, Medium Mentoring Group, and High Mentoring Group. The same analysis was performed with the same grouping on the data subset that excluded students mentored by parents only. As presented in Table 5, in both cases, no significant difference was

found. Therefore, correlations of informal mentoring and positive peer relations were not demonstrated in this study.

Table 5 ANOVA Test of Difference in Means Among Groups: Other Dependent Variables

	All Data ***n = 163***				**Data excluding students mentored by parents ONLY, *n = 130***			
	Informal Mentoring				***Informal Mentoring***			
Dependent Variables/ Groupings	Group A: Low Mentoring Group *n*=19	Group B: Medium Mentoring Group *n*=27	Group C: High Mentoring Group *n*=117	F	Group A: Low Mentoring Group *n*=15	Group B: Medium Mentoring Group *n*=24	Group C: High Mentoring Group *n*=91	F
Peer Attachment	99.00	96.23	99.28	.513	101.9	96.35	98.96	.82
Scholastic Competence	13.90	13.27	13.41	.28	14.2	13.2	13.4	.59
Grades	3.08	3.06	3.1	.074	3.09	3.05	3.09	.09
Globel Self Worth	13.11	14,04	14,6	2.12	13.9	14.0	14.6	.71

*p < .05, **p < .01

To further test for any significant difference in comparison of mean between two groups, *t* tests were performed on all data and the subset data with the various groupings. Results presented in Table 6 below indicate again no significant differences between any of the groups compared. Therefore, mentored students did not demonstrate better peer relationships than less- or non-mentored students.

Table 6 T-Test of Equality of Means Between Groups: Other Dependent Variables

	Informal Mentoring					
	All Data					
Grouping/ Dependent Variables	Not At All Mentored (Group 1)	Very Much Mentored (Group 5)	*t*	Barely Mentored (Groups 1, 2,3)	Mentored (Groups 4&5)	*t*
Peer Attachment	104.83	100.00	.86	97.4	99.28	-.77
Scholastic Competence	14	13.31.	.54	13.53	13.41	.24
Grades	3.07	3.06	.07	3.07	3.1	-.36
Global Self Worth	13.5	14.86	-1.00	13.64	14.60	-1.79
	Data with parents		***Students ONLY***	***mentored by excluded***		
Peer Attachment	104.83	100.07	-1.93	98.55	98.96	.712
Scholastic Competence	14.00	13.38	.461	13.61	13.39	.38
Grades	3.07	3.00	.34	3.06	3.09	-.312
Global Self Worth	13.5	14.93	-1.05	13.50	14.93	-1.19

*p < .05, **p < .01, ***p < .001

In previous research, evidence toward mentored youth having better relationships with peers has been scarce. Researchers had suggested connections between mentoring relationships and improvements in young people's perceptions of support from peer relationships (Rhodes, Haight & Briggs, 1999). The analyses of the evaluation of the Big Brothers Big Sisters programs in the United States found evidence to support the potential of positive mentoring relationships to strengthen or modify youths' other relationships, in particular, the parent-child relationship (Rhodes, Grossman & Resch, 2000). Other researchers have theorized that as young people experience acceptance from a mentor, they may develop positive peer relationships, positive feelings about self, and prosocial behavior (Rohner & Britner, 2002). A recent study Karcher (2008) on school-based mentoring found that participants in a multi-component, intervention program in schools reported positive effects of mentoring on connectedness to peers, self-esteem, and social support from friends. Peer relationships therefore have been considered by researchers as an aspect of adolescent growth that can be correlated with mentoring. While the present study did not find any such correlation, further research is needed to confirm the logical considerations and theories of researchers, that mentoring contributes toward improving young people's perception of or their actual peer relationships.

The Self Perception Profile of Adolescents

The SPPA was used to explore the correlations of informal mentoring with two of the other dependent variables relevant to adolescent development: scholastic competence (including actual academic achievement) and global self worth. The entire data as well as the subset of data were tested for correlations between informal mentoring and the two dependent variables, through the various groupings. ANOVAs and *t* tests were performed for any significant differences among and between groups. As presented in Table 5 and Table 6, no significant differences were found between mentored and non mentored groups in actual academic achievement (in terms of grade point average), perception of Scholastic Competence, and Global Self Value. Correlations of informal mentoring with these variables were therefore not evident. Results from the present study indicated that the mentored students did similarly well to those unmentored academically and perceived themselves at similar levels in scholastic competence and global self worth.

Could the mentored students have done less well in the absence of mentoring? Without a control group or a before and after treatment (in this case, mentoring) group, no further answer can be provided here. However, using a control group and treatment would be contrary to the very nature of informal mentoring, which occurs naturally rather than as a planned intervention. To ascertain data on the correlation of mentoring with academic achievement (as well as the other variables), further research is needed, perhaps with larger or different cohorts of students.

Intervening Factors on Aspects of Positive Growth

Tutoring Influencing Academic Achievement

The absence of significant scholastic differences between the mentored and non mentored group in the present study is consistent with that of the study by Rhodes et al. (2000). As noted by Dubois and Silverthorn (2005), mentoring alone will not likely be sufficient to fully address the needs of youth in specific areas as academic achievements. As many other variables contribute to a student's academic achievement and his/her scholastic perception, students struggling with academic issues will not necessarily do significantly better with a mentoring relationship.

In the context of Hong Kong, students have other resources that help them achieve in academic areas. An intervening factor that could impact academic progress is tutoring. The hiring of tutors to help the student improve in specific academic discipline as well as general studies is a popular strategy in enhancing academic performance. At the Hong Kong International School, a large number of students report engaging in private tutorials to help them get ahead or keep up their academic performance. The effectiveness of tutors has been documented in research, with tutored students outperforming those not tutored (Cohen, Kulik & Kulik, 1982). In the present study, tutoring could have intervened with any influence mentoring may have had on the students. Similarly, self perception on scholastic competence was likely to have been more influenced by having been tutored rather than having been mentored.

Other Factors Influencing Self Worth

Self perception on global self worth according to Harter (1988) refers to a global judgment of one's worth as a person, the extent to which the adolescent likes her/himself. According to Harter, many factors contribute to the development of a person's self worth, not the least the judgment or opinions of peers during adolescence. An adult mentor's influence may be less than the powerful effect of peers and other intervening factors relevant to the stage of adolescence.

Another contributing factor to the development of self worth may be related to exposure to community service. Over eighty percent of the students of the graduating class of the Hong Kong International School were involved in community service projects (Handrich, 2004) such as building homes for the disadvantaged in the Philippines, feeding severely disabled children, serving food to the homeless in Hong Kong, caring for orphaned infants in Vietnam and China, and teaching English to underprivileged children. Student reflections on their involvement in these and other services have indicated dramatic and lasting changed views on the world, their relevance in relation to the needy world, and even the meaning of their own life. It stands to reason that doing service influenced how students see their own worth. A student who had no mentor but was involved with services deeply meaningful to him may have developed a strong self worth. Thus, exposure to service and other factors may have been stronger influences than mentoring on the development of adolescent self worth.

Overall Discussions

Overall, the quantitative component of this study found evidence to support the correlations of informal mentoring and adolescent development, specifically in the area of positive parental relationship. However, no correlation was found of informal mentoring with peer relations, scholastic competence (in perception and actual achievement), and global self worth. This study demonstrated that without mandates, structure, or particular intentions to intervene with the life of the student, informal mentoring relationships achieved results among a group of high school students in an international school in Hong Kong similar to those found in structured mentoring programs for 'at risk' youth (Rhodes et al., 2000). Other aspects of adolescent growth including peer relations, scholastic competence, and global self worth not found to be

correlated with informal mentoring in this study may have been affected by intervening factors and contexts. Possible contributing factors were explored and discussed, but more importantly, point to research with more control of the various variables. The quantitative part of the study presented evidence of the need and readiness of the teenager, across culture and backgrounds, for an adult mentor as well as the potential effects of informal mentoring relationships.

The question that logically follows is ‘how is informal mentoring developed and maintained?’ Exploring more in depth the processes of informal mentoring relationships can provide insights to teenagers seeking a mentor and an adult wanting to be a mentor. Additionally, more intentional strategies can be developed to encourage and enhance the forming and furthering of informal mentoring. Mentoring programs can also be improved and strategies and policies developed based on the processes and nature of mentoring found in this study.

Processes and Experiences of Informal Mentoring

This study had confirmed that positive growth in adolescents in terms of relationship with parents is correlated with experience in mentoring relationships. The second set of research questions explored in depth some of the processes of the informal mentoring relationships: how are the informal mentoring relationships formed and developed, what makes the relationships ‘work’ and continue, who are the mentors. The qualitative data came from responses to a questionnaire (refer to Appendix E for detail) completed in writing by all participants, and in-depth interviews (see set of interview questions in Appendix F) with seven adolescents regarding their mentoring relationships.

The processes and experiences of informal mentoring are described in detail according to results from the present study, starting with who the informal mentors were and how often they met with their mentees. The beginning of the mentoring relationships is then discussed with themes on how and what made the relationships develop. The content of mentoring is described drawing insights on how the mentoring relationships were maintained. And finally, strategies that worked well for mentoring are discussed. The data derived from this study can help inform how adults involved in or entering the life of the youth on how to an effective informal mentor and help adolescents looking for a mentor reach their goals and improve the quality of the mentoring relationship.

The Informal Mentors

Who are they?

In defining who the mentors were, students could tick one or more of the categories that applied, including teacher, parent, older sibling (see Appendix E). If they had more than one mentor in a category, they could also indicate the number of mentors they had. For example, some put '2' next to the 'teacher' category, indicating they had two teachers as mentors. With this process, the number of mentors each student had was also apparent. Overall, a majority of the surveyed HKIS students had been able to access and develop a positive relationship with one or more adults. Many of the students had more than one mentor to date. Table 7 reflects that 46 students reported having one mentor, 45 students reported having 2 mentors, 41 had 3, 16 had 4, and 6 had 5 mentors or more. In all, the students had at least 353 mentors. Therefore, approximately 30% of mentored students who had a mentor had one mentor and the majority, 70% of mentored students had two or more mentors.

Table 7 Number of Mentors Students Had

Number of Students	Number of Mentors	Number of Mentors Students Had (# of students x # of mentors)
46	1	46
45	2	90
41	3	123
16	4	64
6	5 or more	30 or more
	Total number of mentors:	**353 or more**

Among the mentors, the group most frequently nominated as a mentor was 'parent(s)' who were nominated 121 times (79% of the participants who had a mentor), as indicated on Table 8. The next largest group was school personnel, 'teacher' or 'counsellor' with 82 (over 50% of mentored students). 'Older friend' was nominated on 44 occasions (29%), older sibling was nominated 43 times (28%), uncle/aunt 25 times (16%), and 'others' including coach, tutor, grandparent, helper, etc. totaled 39 (25%). Mentors were mainly people in natural relationships with the student, such as people close by, at home, school, and in the family.

Table 8 Frequency of Adults Nominated as Mentors

Mentor Groups	***Frequency***	***Percentage***
Parent(s)	121	79
School Personnel	82	53
Older Friend	44	29
Older Sibling	43	28
Uncle/Aunt	25	16
Others	39	25

The present study confirmed other studies' findings (Dubois et al., 2005; Zimmerman et al., 2002) that informal or natural mentoring relationships exist in abundance in the natural environment of the adolescent. They are formed with people in relationships natural to the young person. Informal mentoring do not have to address some of the difficulties that formal mentoring have. As informal mentoring relationships are formed and continued voluntarily, informal mentoring runs lower risks of incompatible matches, poor commitment, personality clashes, and premature termination of the mentoring relationship, causing disappointment, hurt feelings and harm to the mentee and/or the mentor (Grossman & Rhodes, 2002). Without the formal mandates of structured mentoring, relationships developed in the natural setting may bring the same benefits that formal mentoring yields for both parties involved.

Frequency of Contact

Mentors and mentees who met on a regular basis had contact frequency ranging from daily to three times per year. Some whose mentor was their teacher could talk to the mentor almost every day during recess, class, lunch-time, a free period, or after school.

Others could talk to their mentor daily when their mentor is their parent, as one student put it, “we talk every or every other night” [Q103] (from questionnaire #103). Some did not meet at regular intervals but did meet frequently: we communicate through “random phone calls or meetings after school as time of discussion permits” [Q45] (from questionnaire #45). Some who met infrequently would meet for a long time or for many times during a short period, for example during a month in the summer. Another student had a regular time with his mentor as he noted, I meet “every Sunday with my pastor” [Q17] (from questionnaire #17). Additional sample quotes from participants on frequency of contacts with their mentors are in Appendix G.

In cases of older siblings or cousins being a mentor, some have left for studies abroad. Nevertheless, the mentoring relationship had continued through various forms of communication, including calls through mobile phone, MSN, Facebook, and other cyber networks and means. As students (mentees) recognized, their own imminent departure for college, the frequency of contact with their mentors will decrease due to distance. Some already had plans to ‘catch up’ with their mentor during their first break back to Hong Kong. From mentees’ description of their contacts with their mentors, frequency of contact varied and was not a direct reflection of the closeness of the relationship. As one student put it, “Our relationship goes back a long way. It’s strong. Our contacts are of quality, not quantity!” [Q76].

Discussion

Overall, the majority (over 72%) of students at the Hong Kong International School sample had been able to access one or more people who have helped them further develop their potential. Mentors were apparently not difficult to find or be engaged for this group. Zimmerman, Bingenheimer and Notaro (2002) found that over 50% of the adolescents they interviewed (n = 770) from a large Midwestern city in the US reported having a natural (informal) mentor. In a study on Natural Mentoring Relationships and Adolescent Health (Dubois & Silverthorn, 2005), based on evidence from a national longitudinal study in the United States, approximately three quarters of the sample (72.9%; n = 2,323) reported having had a mentor. Similarly, Japanese adolescents had little difficulty naming important adults in their life who helped them grow (Darling,

Hamilton, Toyokama & Matsuda, 2002). Evidently, teenagers in different areas of the world, Hong Kong, China, Japan, and the United States, are willing and readily able to develop informal mentoring relationships.

With the long and rich history of mentoring, dating back to Homer's Odyssey in the West and the three Chinese sage kings as early as 2300 BCE in the East (as discussed in Chapter 2), it is encouraging to affirm that informal mentoring is continuing to operate in the 21st century, asserting its positive influence among young people in various parts of the world.

Parents

In this study, no differentiation was made to exclude parents from being identified as mentors. The definition of a mentor given to the students was "one or more person(s) in your life who were most responsible for helping your potential to develop most fully" (see Appendix E) based on the work by Bennetts (2003, p, 64). Students decided for themselves who fitted the description for their own situation. Over seventy-nine percent of the participants who had a mentor named their parent(s) as their mentor. This is not surprising as earlier studies (Hamilton & Darling, 1996; Munsch & Blyth, 1993) previously noted that when asked to name important adults in their life, nearly all adolescents listed their parents, usually first. Despite many researchers' insistence that a mentor is one outside of the family and that even siblings, aunts, uncles, and grandparents would hardly fall within their definition of a mentor (Hamilton & Hamilton, 2005), the reality for adolescents is that many parents have been among the most important people who have helped them develop most fully. Their parents have been and are continuing to be their mentors.

Teachers and Counsellors

The next largest group named as mentors was school personnel, 'teacher' or 'counsellor', constituting more than fifty percent of the participants who had a mentor. This is in contrast to Dubois and Silverthorn's (2005) findings. Only one quarter (26%) of the participants in the above study named teachers or counsellors as their mentor. The researchers speculated that this was probably related to the size of the classes in US schools, preventing development of adequate bonding between teachers and students. A call for smaller classes could be made on the basis of this. Nevertheless, there may be

other cultural factors or broader issues here preventing more school personnel named as mentors; for example, assumptions on the role of the teacher.

The large percentage of students naming teacher/school personnel as their mentors at HKIS may reflect on the system and culture of the school. Classes at HKIS range from 12 to 24 in size. Compared to Hong Kong local schools' usual 40 students per class, students at HKIS are privileged to have high teacher-student ratios. Students are assigned to a Homeroom which meets daily. The Homeroom teacher being the first line of pastoral caretaking for the student is usually not a subject teacher of the student. The stress of grade-related concerns is therefore alleviated from the homeroom teacher-student relationship. Students can communicate with their Homeroom teacher about any topic without concerns for their grades being affected. The daily Homeroom is an informal time that allows students to interact freely with peers and teacher as needed. As the Homeroom teacher has the role of a 'school parent', Homeroom is like a 'living room' to the student who enters it to work, talk, or just relax.

Two (part-time) counsellors are assigned to each grade level to oversee the pastoral needs of the students. These guidance counsellors have the responsibility to connect with the students. Additionally, teachers are expected to and do help students outside of class as needed. Extra-curricular activities, school projects, service/culture/adventure week, and many sports teams are sponsored or led by teachers. Students are encouraged and learn to seek help from adults in school. Thus, the HKIS system and culture, though far from being perfect, afford many opportunities for students to connect with adults, conducive to mentoring relationship development. That over half of the students named a teacher or counsellor as a mentor compared to the significantly lower percentage in the study by Dubois and Silverthorn (2005), was indicative of the effects of the school's intention to build teacher-student connections. A comparative study between HKIS and one or more other institutions might confirm or contradict these assertions.

Issues within the existing supportive system of HKIS remain to be addressed so that the percentage of students being connected with teachers could yet be higher. Some of these issues include the level of function of the Homeroom System, and finding time and space on the school schedule for students to develop student-mentor relationships. Additionally, the workload of teachers in teaching and pastoral duties has been a point

of contention. For HKIS and other schools with a goal to nurture adolescent development, considering these questions would be the first steps toward increasing the quantity and quality of teacher-student connection and the development of mentoring relationships between teachers and students. In recent years, there have been initiatives to set up mentoring programs in schools (Karcher, Davis & Powell, 2002; Lawson, 1997). Addressing these elements that create an environment conducive to informal mentoring relationships could prove helpful to developing effective formal mentoring programs.

Other Informal Mentors

Other mentors following school personnel in terms of frequency were family members including older siblings, uncles, aunts, grandparents, and helpers (who in the Hong Kong context are usually live-in maids and are often considered as part of the family). Close to forty percent of the participants named these relatives as mentors. Approximately the same result was found in the US national study by Dubois and Silverthorn (2005). Helpers were not included in the 'relatives' category as live-in maids are less common in the US than in Hong Kong.

Informal or natural mentors are therefore adults who are naturally in the life of the adolescent. They are part of a young person's existing social network rather than introduced explicitly as mentors (Hamilton & Hamilton, 2005). The participants in the present study had rich resources of adults to connect with. Mentoring relationships were formed with people related to or close to them. It stands to reason, then, that teenagers looking for a mentor should start with people naturally occurring in their lives, making use of informal opportunities to meet adults. Adolescents who find themselves in contact with a high number and wide variety of adults increase their chances of finding a suitable mentor. Likewise, adults aspiring to become a mentor should take note of teens already in their social network, finding the natural opportunities to connect with the young person. As for factors and processes that contribute toward the formation and development of the relationships, the discussion is found in the next section of this paper.

The Start of Mentoring

Written responses to the questionnaire from the 163 participants were gathered and categorized as outlined below. Seven interviews were conducted asking more detailed questions about the mentoring relationships. Six major themes related to how mentoring began emerged:

1. Natural and easy access
2. Talking
3. Time spent
4. Student need
5. Student initiated
6. Adult initiated

Each of these is outlined in detail below based on data from both the open questions in the questionnaire and the in-depth interviews. A table with an overview of the themes and specific quotes is provided in Appendix H.

Natural and Easy Access

Mentoring relationships often *started in natural and accessible existing relationships*. For example, students noted that they were "born into the family" [Q118], they and their mentors were "connected by blood" [Q14], "they are my parents" [Q18], therefore mum and/or dad cared about them. In addition to parents, brothers, sisters, and cousins were often cited as ones who have 'been there' for the student. When not living under the same roof, cousins, uncles and aunts became mentors during regular family dinners, gatherings, and meetings, including the many seasonal festivals on the Asian calendar during which most Chinese families would get together. Gatherings and family dinners have often taken place throughout the life of the adolescent. Hong Kong has seventeen General Holidays observed by schools, many of which are traditional Chinese holidays such as the Lunar New Year involving at least four days of celebration, Tuen Ng Festival, Ching Ming Festival, Mid-Autumn Festival, National Day, and Chung Yeung Festival. These holidays, like many of the Western holidays such as Christmas, Easter, New Year in Western tradition, require celebrations, dinners and gatherings with families. When the extended family, including cousins, aunties and uncles, gets together, it is usually for many hours prior to and after the dinner. The family gatherings become

regular ‘nurseries’ for nurturing mentoring relationships between the adolescent and an aunt, uncle, an older cousin or an older sibling. A point of clarification on older siblings and aunts/uncles: it should be noted that having older siblings as mentor is feasible as Hong Kong does not and never did fall under China’s ‘one-child policy’. Thus, Hong Kong parents have always had the privilege of having as many children as they want, or could afford.

One group of people that have natural and accessible relationships with the teenager is the domestic helpers. Often counted as part of the family but having no blood relations in the family, domestic helpers (always women) who have been with the child since his/her birth have been people to whom the child has gone regularly for support. Thus, some teenagers have said that their Helper is their ‘second mum’. One student said that, “my amah (another name for domestic helper) has been there for me since my birth” [Q16]. In Chinese, domestic helpers are often given the name ‘older sister’ to be called by the child or teenager. There may also be fewer consequences in confiding in the Helper, rather than parents, as the Helper usually does not have the role of teaching the child. Some teenagers have asserted the helper’s importance and contribution to their growth.

Apart from home and family, opportunities also arose among teaching and coaching relationships in school and outside of school. Homeroom teachers, counsellors, and subject teachers that were admired and well respected by the student often became a mentor to the student. Regular class meetings and the accessibility of the teachers or counsellors made the development of the relationship natural and easy. If going to the counsellor may be a stigma for some students, coaches, tutors, and others could be mentor candidates. Tutorials, lessons, training occurring outside of school allowed students to encounter adults that became their mentors. From in-depth interviews on mentoring relationships, students named their SAT (a college admission preparation course) teacher, their swimming coach, their art teacher, or their music tutor as their mentor. These were people who had entered the life of the student through natural circumstances.

Talking

Almost all of the responses to the question of how mentoring began involved the element of *‘talking’* between the mentor and the mentee. Some traced the beginning of

the relationship to “a conversation” [Q175]. Others noted that there were continuous conversations in a regular time, such as a car ride, that grew to become more than just a talk, but a relationship. One teenager recalled that her mentor emerged by asking her how she was doing during a critical period when fighting was occurring regularly at home. The adult asked many times and the teenager was touched by the adult’s genuine care for her. She began to open up to the adult, sharing her feelings and working through her confusions in long conversations with the mentor [I2] (from interview #2).

Time Spent

Related to or coupled with talking was *time spent*. Students noted that the willingness of the adult to spend time (usually a substantial amount of time) with them helped begin the mentoring relationship. The family gatherings during festivals detailed above imply a large amount of time spent between the mentor and the mentee. Teachers, coaches, counsellors, siblings, willing to give practical help to, talk to, and care for the student pay the price of time for the mentoring relationship (see sample quotes Q105, Q108, Q122 in Appendix H). One student noted that her mentor went out of his way to be with her, dropping by her summer school in the US while he was on a business trip. On other occasions, the mentor brought the student along to various occasions, spending time with her and introducing her to different circles of people [I4]. Therefore, talking, spending time, being present and available were repeatedly mentioned as contributing factors to the start of mentoring.

Student Need

A fourth emerging theme was that the mentor helped *meet a need of the student*. For example, the teenagers needed help in a subject, had a problem that they could not solve, were depressed from a fight with their parents, or just wanted to talk to someone they could trust. From one of the interviews, a student felt her world was fast ‘falling apart’ when her parents were going through a divorce. A friend of her parents persisted in checking on her well being by asking her, spending time with her, and listening to her [I2]. Help during a crisis was an effective start to a positive relationship. Then sometimes, the meeting of needs became mutual. One student noted that after receiving much help from his tutor, trust and respect for each other were developed. He found himself reciprocating the help, giving counsel and helping his mentor think through

some of his own confusions [I7]. Mentoring relationships were sometimes developed, from needs and meeting of needs.

Student Initiated

The fifth theme on the beginning of mentoring was that *students often initiated the relationship*, taking an active role in looking for help, approaching the role model, and starting the conversation. Eleven students found a teacher whose style of teaching, value, and abilities appealing or helpful to their learning and would then seek out the teacher for additional help or ask for counsel from the teacher on various concerns. For example, "I admired my Taekwando teacher and began to ask him for about other things" [Q130], and "I've always been used to asking my mum question about life and other problems" [Q132].

Adult Initiated

On the other hand, a related sixth theme was that *adults sometimes intentionally and even worked hard to seek out the student.* Mentoring relationships were at times noted to have been started by the mentor. A teacher offering help to the student needing assistance [Q110], a coach asking the student about concerns beyond the subject area [Q122], a father understanding the potential of his son and finding ways to interest him and develop him [Q64], a grandfather taking aside the grandchild and talking to her about college [Q68], a youth pastor calling up a young person [Q17] were all examples of the adult playing an active part in seeking out the teenager to become his/her mentor. Regarding the religious demography of Hong Kong, according to the 2000 International Report on Religious Freedom on Hong Kong, approximately 9% of Hong Kong's population claimed to be of Christians (US State Department, 2000).

According to the data, either students or adults initiated the relationships. Teenagers took initiative in finding help, asking questions, visiting mentors, etc. As well, adults were often reported to have started the relationships, reaching out to teenagers to initiate contacts and care.

Maintaining the Mentoring Relationship

Mentoring Content

Mentors were consulted in all areas of growth, including peer relationships, parent-child relationships, academic and career development, life lessons. Many reported that once the mentor-mentee relationship was established, they were open to help in all areas of their lives. Friendship issues were discussed with parents sometimes, and mostly with teachers, aunts/uncles, older friends and other adults. Academic matters were discussed with parents, subject teachers and older siblings, career choices were often conversation topics with parents, teachers, and older siblings. Life lessons were common topics with parents, grandparents, uncles, tutors, and coaches. While consulting with all mentors on various issues, the teenagers asked their non parent mentors about parent-child relationships, seeking assistance and advice from them about stress with parents, how to communicate with parents, and how to resolve issues with their father or mother, for example see quotes from [Q191], [Q197], [Q32], [Q58]. This finding helps explain the quantitative results of the present study, that young people who had a mentor had better relationships with their parents. Direct assistance in improving parent-child relationships from the mentor may have contributed to actual improvement in youths' relationship with their parents. This is a good example of the qualitative data enriching and even explaining a phenomenon found in the quantitative data.

Actions Contributing to Mentoring

When asked what maintained or made the mentoring relationship last, responses included actions that maintained mentoring. They were *continuous contacts, commonalities (shared interest and activities) and talking*. Each of these is described below. Detailed sample quotes from students can be found in Appendix I.

Continuous Contacts

Participants attributed the lasting of the relationship to the action of *continuous contact*, such as "constant contact/communication" [Q183], "by keeping in touch" [Q110], "frequent connecting" [Q197], "continual support and just checking in" [Q186], "close connections"[Q117], "frequent meetings and chats" [Q188], and an intentional effort to keep up contacts, as one student put it, "I made conscious decisions to talk with him, to keep in touch"[Q43].

Commonalilties

Another kind of action involved *commonalities or (shared interests)* between the mentor and mentor, such as "sports" [Q119], "fun time" [Q112], "family bonds" [Q133], and "similarity in how we act and activities we both like to do" [Q123]. One student stated directly, "the gatherings and things we do together help it last" [Q35].

Talking was noted by numerous participants as a factor that helped maintain the relationship. For example, they said, "we talk all the time, I take initiative to ask questions" [Q105], "being able to talk things through" [Q113] , "talking about anything I want" [Q177], and "they shared their knowledge and wisdom with me a lot" [Q5]. Mentoring relationships therefore are nurtured by continuous efforts to keep in contact, be with each other, do things together, and talking (communicating) through whatever means. The theme of *talking* seemed to appear in the starting, developing, and maintenance of mentoring relationships. It is the action that has brought mentors and mentees together and made them stay together.

Nature of the Relationship Contributing to Mentoring

Participants also responded to the question with descriptors of the nature of the relationships, including *trust and respect, and genuine care*. Such themes reflected the depth and closeness of the relationships.

Trust and Respect

The words "mutual trust", "trust", and "respect" were noted by participants repeatedly to describe what made the relationship last. For example, "ease of conversation and mutual trust" [Q108], "open and honest relationship, talk about anything; trust" [Q122], "they did not interrupt when I spoke, and I trusted them with my secrets" [Q48]. Other phrases reflected the trusting and mutually respectful relationship, for example, "a sense of neutrality, like their responses weren't colored too much with their on personal beliefs" [Q182], "I can be comfortable to be myself around them" [Q196]. "the fact that they don't try to push things on me" [Q191]. Participants cited *trust and respect* as an important factor to maintaining the mentoring relationship.

Genuine Care

Another descriptor of the nature of the relationship that helped mentoring last was *genuine care.* Students described their mentors as "kind and genuine" [Q5], and that "engagement and care" [Q131] made the relationship last. Phrases such as "he's my dad, he really cares deeply about me" [Q184], "I grew up with her. She is like a second mother to me and I love her greatly" [Q16], and "our efforts in loving each other" [Q1], convey genuine care in the relationship that was deemed critical in maintaining the relationship.

As mentoring relationships further developed, 'genuine care' was experienced by both parties and feelings and respect for each other became mutual. At the end of the interviews, the teenagers reflected on their relationships with their mentors. Many noted that they were not sure if their mentors knew how they felt about the mentoring relationship, as they and their mentors had never talked about it. The following revealed and summed up the teenagers' gratitude and feeling for mentoring:

> "More people should give my mentor credit for what he's done" [I7]
>
> "Mentors should not dump the mentee or the other way around, because they have come to depend on each other. It's an important relationship" [I5]
>
> "She lights up the room. She makes anyone comfortable. She's down to earth and very approachable…. she puts people at ease. She feels secure. She may not know that I look up to her." [I5]
>
> "He's made such an impact in my life and continues to do so. But I don't' think he knows it." [I4]
>
> "We'll be apart soon, but I'm planning on and looking forward to visiting with him when I come back for Christmas, in the summer…" [I7]
>
> "I don't think my mentors realize how much they have done for me; I appreciate them so much!" [I2]

Many of the students noted that they will find an opportunity to express their gratitude to their mentor(s). In a positive mentoring relationship, 'genuine care' has developed into 'mutual care' between the mentor and the mentee, reflective of a reciprocating and development-inducing relationship.

Maintenance and often further development of the mentoring relationship, according to the participants, were related to mentors helping the mentees in all areas of the mentee's life as needed and appropriate deemed by both parties. Mentors and mentees who had a lasting relationship contacted each other continuously, shared and did activities of common interests together, and talked to each other frequently and in depth. The nature of the mentoring relationships was of trust and respect, and genuine care that sometimes became reciprocating and mutual between the mentor and the mentee.

Mentoring Strategies That Work Well

An interviewed student had the following to say about an experience with her mentor:

> I was going through a particularly difficult end to a relationship. I was mentally and emotionally overwhelmed. I was left in a state of confusion and lack of direction (as to what I should do next). My mentor was there with me, to listen and to comfort me. Her advice was one that I desperately needed. She pointed me in a spiritual direction, back to the Christian faith, emphasizing that my relationships depended not on one person, and my own worth was far greater than what one person made of it. I took the advice, and I had a quick recovery – emotionally, physically, mentally and spiritually. Recovery in the sense of, being able to let go and deal with the pain appropriately, and being able to see a new hope that was founded in firm spiritual faith. Not only has my mentor helped me recover from my moment of turmoil, but she has taught me to grow even in tough times – so that if I may encounter similarly difficult situations, I may know how to deal with them more effectively. [I6]

This case illustrated some of the major strategies that work well in mentoring. For this student, the strategies included the mentor's presence, being there in a critical time, genuine care in the form of listening, encouraging and comforting, talking, timely and wise advice based on an accurate analysis of the situation, and life lessons that were practical, workable, and transferable to other situations in the life of the student. The work of the mentor in this case was effective and powerful in lifting the student from turmoil to hope, changing her from being confused to letting go, from feeling lost to having confidence to face other challenges in life.

Written and interview responses on what was most effective in helping the student reflected at least six common themes. Sample quotes of students' own words are outlined in Appendix J.

Listening with Genuine Care

Half of the responses had references to the familiar theme of *listening with genuine care* (in the mentees' own words), putting this theme on the top of the list. 'Genuine care' is difficult to define and quantify. It has been described by the mentees in the context of listening as follows. The mentee was allowed and often invited to talk and was made comfortable by the mentor's attention and expressions of care. By listening, the mentor supported, calmed, and reassured the mentee. The mentor made the student feel secure and accepted as as noted by a student, "my mentor is effective by giving me options, mostly just listening and understanding" [Q186]. Another student said that the mentor gave "customized advice" [I6] that was applicable to the individual and unique situation of the mentee. But the customized advice was developed only after intensive 'listening' had taken place. Having heard the mentee's story, analyzed the circumstances, only then was any advice given. Sometimes, the mentor simply listened and was just there. Mentees found the mentor effective because 'listening' was the first and continuous step in the helping process. Genuine care was conveyed through taking time to listen, respond, and comfort (addressing emotions).

'Listening' or being listened to were recognized and noted repeatedly by students as a determining factor for effectiveness in the mentoring relationship. This finding is consistent with existing knowledge in human dynamics and relationships. The power of listening in mentoring and other relationships will be discussed in greater detail in a later section.

Talking

Going hand in hand with listening was *talking*, one of the elements by which a mentoring relationship began. Students felt they could talk with their mentors about anything. The "relaxed environment" [Q132] was inviting and effective for the student. "Talking things through" [Q113], "talk my problems out" [Q182] and "discussing different points of view" [Q1] reflected an active engagement in the problem solving

process (see detailed quotes in Appendix J). One student put it precisely as "talking, listening, not giving me answers, but made me find it" [Q195]. The conversations apparently extended beyond the initial issue or a problem the mentee had. Mentors and mentees looked for opportunities to talk beyond these initial issues and onto things happening in each other's lives. One student said, "we began with a meal together, then we began talking on the phone more and more often, and I was encouraged to share as much as I wanted to. It became increasingly easy and comfortable for both of us to share." [I1] The 'conversations' were reciprocal, communicative and enjoyable.

Giving Choice and Latitude

Another repeatedly reported factor that contributed to the furthering of the positive relationship was that while their mentors were eager to give information, analyze the situation, and help solve difficulties, the mentor was willing to give *freedom and latitude* to the teenager to *decide for him/herself*, "saying the possibilities and always respecting my decision" [Q42]. By this, the latter felt effectively helped. Students appreciated mentors not imposing their views on them, but rather supported and helped only when asked: "my mentors never imposed their views on me: they supported me when I asked for help or advice and acted more like equal friends than anything else" [Q43]. Parents, uncles and teachers alike, these mentors were noted for giving information, analyzing the situation, exploring options with the student, and then leaving it to the student do decide on what to do. A student remarked, "my mentor was not very pushy on how I should act and whether or not I followed the advice given" [I1]. Choices and decision making power, directly related to the teenager's drive to be independent and an individual, are reportedly treasured by the mentee: "when I did not want to, I did not follow the advice, and that was 'ok' with him" [I3]. Effective mentors were ones who stepped in and stepped out to help the teenager grow.

Sharing of Own Experience, Showing, Modeling

In addition to listening, caring, talking, and giving latitude, teens identified the following as effective helping strategies in mentorship: *sharing of own experience, showing and modeling* of ways to address problems or do things. Acknowledging and often admiring the wisdom and expertise of the mentor, teens enjoyed hearing real life stories and witnessing the practice of a skill or problem-solving method. One teen said,

> She's my role model in life and in career development. I admire her for just being who she is. She's fulfilled my childhood dream and now she's introducing me to the world of art and design that I had never known or experienced before. Looking at her, I understand the satisfaction of this identity and profession. I know who I want to be. [I2]

(With the encouragement and help of her mentor, this student applied for art school, and is currently in one of the leading art colleges in the US.)

Another student stated her rationale for seeking life experiences:

> I've been grateful for the fact she was also willing to share stories about her life and because our age gap was only 4 years, I could actually relate to her on a lot of things And since she had gone through similar situations, particularly on decision making, I found it helpful to simply go with her advice rather than having myself spending extra time in figuring things out from scratch. [I1]

Trust, Mutual Acceptance, Love

Perhaps deeper than showing, watching, and modeling was the sense of *trust, mutual acceptance and love* developed between the mentor and the mentee. Students felt loved by their mentor when accepted by them. Trust then developed. From "joking around with each other a lot" [Q23], and being able to "talk about anything, knowing that what is said will be accepted" to impacting the internal processes of the mentee: "He helped me to become more confident of who I am" [Q64]. Here's how one mentor achieved this:

> My mentor is very practical about helping me. He makes things happen for me, such as getting me a summer job in the area of my career interest. He visits me despite how it's so out of the way for him and he is very busy. His sacrificing of time to be with me makes me feel very special. Even though I'm way younger than him, he brings me along to functions to meet many people that you would not meet otherwise. They are eye opening exposures. I learned to socialize… such as 'think before you talk' [I4].

In addition to the already discussed themes of taking time for and being with the mentee, also highlighted here was the 'trust' given to the mentee which made the teenager feel honored and willing to learn to fit the role in socializing.

Also from a relationship of trust, a teenager noted how her teacher for a college entrance test ‘yelled’ at her for not knowing the answers to questions she was studying for. The teacher made her practise repeatedly all summer. When she looked at the back of the book for answers, he yelled at her again, correcting her from an unconstructive behavior. The teenager not only accepted the reprimanding and correction, she was grateful for the mentor’s making her face reality, confronting what she was doing wrong, and helping her improve effectively. The teen further disclosed that she was fine with the teacher being tough with her because she understood it was for her own good. She trusted the motive of her mentor. He had earlier learned that the student had not completed her piano exam and wanted to hide this fact. But when she had to admit to the teacher, he made her face up to and accept what she had done and not done. The student appreciated learning to confront her weakness, accept it, and then do something about it. Her mentor taught her to face reality, to stop being naïve and to become mature [I3]. Established trust set the context for the learning of this significant life lesson.

It should also be noted that the present researcher does not recommend that mentors 'yell' at their mentees, but rather that this example shows the fundamental important of trust, so that when there is trust, even such controversial/unadvisable actions can become interpreted as well-intentioned and constructive.

Lecturing, Giving-Advice

A final popular theme on how mentors effectively helped the teenager was that the mentor ‘*lectured* or *advised’* him/her. Close to half (59) of the responses contained ‘lecturing’ or advice giving’. Of these, 26 were lecturing/advice-giving along with listening with genuine care, and 32 were lecturing/advice-giving alone. Mentees often received advice as well as listening with genuine care from their mentor, as one student stated plainly, “they always listen FIRST, then give advice that suits my situation” [Q107]. In such cases, listening co-existed with advice-giving as the mentors listened, allowing the student to talk, analyzed the problem, and then gave advice. Mentees deemed this effective in helping them.

Then there were instances where students were pleased to just have advice from their mentors. Contrary to the teenager’s need for independence and development of

independent thoughts and identity, this usually less favored helping method of lecturing and advising was reported as 'most effective' by some of the students. In a Western cultural context, 'lecturing' may carry a negative connotation; however, in an Asian context, 'lecturing', especially from a well respected and older person, is commonly acceptable, and in the present study, found to be sought after. Teens admitted to going to the mentor with a question about their life or any type of problem the student was having, requesting advice and help. The mentor did not mind answering the questions, often in the form of an advice or lecture.

A number of sub-themes accompanied the lectures and the advice. Students appreciated the lecture when the content was about the *'big picture'*. A repeated assertion was that the mentor gave an "outside view (that taught the mentee)… how to see things in the big picture instead of getting caught up in the moment" [I7]. Students admitted to their limited experience and were open to other perspectives that would help them make wiser choices. On the matter of wisdom, lectures and advice were often regarding *deeper knowledge*, such as life lessons, values, life mottos or philosophies. Comments such as the following stood witness to the effects of mentors on mentees in the deeper aspects of development:

> "mentors (in this case, parents) instilled morals and guided me to become who I am" [Q21]
>
> "they helped me figure out who I am and who I want to be" [Q5]
>
> "they've tried to keep me on the right track, taught me what was right and wrong in many situations" [Q195]
>
> "they offered me comfort, advice, stability, and examples to follow and be inspired by, for a life time." [Q78]

A music student learned from his instrument teacher, a professional musician with the Hong Kong Philharmonic Orchestra, the secret to playing and living well:

> He said that technicality is not as important as a beautiful sound, captivating and inspiring the audience. This impacted my playing, from struggling through the hard challenge to 'creating' music. I feel so much better knowing that I don't have to be THE best. I'm enjoying, and feeling happy as a performer. Further applying this value helped me to look beyond making money. Rather than limiting myself to the materialistic value, doing something I enjoy is of much greater value. I've started doing what I want to do and am enjoying expanding to and being open to experiencing life. [I7]

A third and last sub theme emerged as '*who*' was giving the lectures and advice. There were numerous mentions of parents, teachers, grandparents, people well respected by the student. Life lessons were often connected with someone even older than the parent, i.e. the grandparents; for example, a student wrote on the questionnaire, "人生道理 (life lessons) from 公公 (*Gung Gung*, see paragraph below for meaning of words) were most effective." [Q68] Regarding 教訓 'gao fun' (in Cantonese), 教 'gao' literally means teaching, and 訓 'fun' literally means discipline. While students responded in English, these Chinese words or transliterated words (as in Gung Gung) were used by some (two interviewees and two questionnaire respondents) to express more accurately the mentees' meaning.

In the Chinese tradition, it is common, acceptable, and often expected that young people receive 'gao fun' from the old and the wise. One's 'Gung Gung'(公公) is one such wise person. 'Gung gung' is an intimate way to refer to grandfather from the mother's side. The more formal name for grandfather is 外祖父 'ngoi cho fu' (in Cantonese), which literally means 'outer grandfather'. In accordance with Chinese tradition, 'outer grandfather' refers to grandfather from the mother's side and 'grandfather' refers to grandfather from the father's side; concepts and names are products of a dominant patrilineal society. Seeking advice and learning from lectures by 'Gung Gung' and 婆婆 'Po Po' (outer grandmother) is consistent with Chinese culture and tradition. Students found long lectures from grandfathers and grandmothers one of the most effective ways in learning about life lessons developed from lifetimes of experience.

Discussions

Some of the themes that surfaced throughout the process of mentoring found in the present study have been found by other researchers in previous studies. The present study's findings to answer the second set of research questions on how mentoring began, developed, and what strategies worked well lend support, affirm, and bring new insights to concepts and theories researchers have developed. In the past decade in particular,

researchers have actively engaged in exploring the processes of mentoring. They have conducted meta-analyses of nationwide data as well as reviews, surveys and case studies (Bennetts, 2003; Dubois & Silverthorn, 2005; Herrera et al., 2007; Liang et al, 2002; Rhodes et al, 2000). Through both quantitative studies and descriptive analyses of cases in qualitative studies, a number of theories, frameworks, and models have emerged in an attempt to organize, summarize, and interpret the findings to date in the area of mentoring relationships. The following discusses the repeated themes that have emerged throughout the mentoring process in the contexts of some of the existing theoretical concepts of mentoring.

Developmental Mentoring: Care and Support

Unlike structured mentoring in a community mentorship program or a school-based mentoring project, results from this study affirm that adults and students got together under natural circumstances. The participants indicated that the starting point was often a casual conversation, followed later by other conversations. Sometimes, there was a crisis or an acute need in the life of the mentee (for example, failing an exam and not knowing how to face one's parents, or parents going through a divorce,) that the adult noticed and asked about. As '*care*' (a descriptor used repeatedly by the participants) was conveyed through the attention and concerns given, the mentee felt 'emotionally moved' and began to open up more to the mentor. Trust developed, and the mentoring relationship was established.

Karcher and his colleagues (Karcher, Kuperminc, Portword, Sipe, & Taylor, 2006) called this beginning process Developmental Mentoring, in which the primary focus of the relationship is one of *support*, with the aim to promote the youth's development in social, emotional, and possibly other areas or growth. The developmental approach reflects the view that development of a close trusting relationship is the primary means by which skills development occurs. The direction of this theoretical model is that increased social support brings increased self-esteem and connectedness which may lead to gains in academic achievement, and other areas of growth. Thus, nurturing, care and support are found in mentoring which ultimately lead to various areas of adolescent development. The starting of mentoring relations described in the present study lends evidence to mentoring being a social, emotional support to the mentee during critical and ongoing periods in the life of the mentee.

Instrumental Mentoring: Skills Improvement

In contrast to the Developmental Mentoring theoretical mode is what Karcher et al. (2006) call Instrumental Mentoring, which has the primary goal of skills learning or achievement of specific goals: improvement in specific skills (academic or otherwise) leads to increased social support which brings increased self-esteem and connectedness. Descriptions of the starting of mentoring from the present study also supported this model. Subject tutors, SAT (Standardized Aptitude Test, a test developed by the US College Board for university entrance) tutors, sport coaches, and music teachers cited as mentors by the student had the initial goal of imparting skills and knowledge in their subject area. Consultations subsequently extended beyond the subject area to other areas of concern, often depending on the needs, life circumstances, and the questions the youth had. As conversations continued and problems resolved with the help of the adult, care, trust, and respect developed over time and through cumulative experiences. Mentoring had begun. It is apparent that the beginning of mentoring can be either Developmental or Instrumental. In both cases, mentoring is related to effecting positive self-esteem and therefore improving psychological well-being as noted by Dubois and Silverthorn (2005b).

It could have been useful to correlate the kind of mentoring with specific variables of adolescent development, for example, instrumental mentoring with academic achievement. However, mentors in the present study were often a mixture of both instrumental and developmental, and therefore no clear lines could be drawn to separate the mentors definitively. Such comparisons could be informative in a future study structured to separate the mentors by categories.

Shared Ownership

One of the unique features of an informal mentoring relationship is that its beginning and development are entirely voluntary, natural, without interference or pressure from an outside source. There are no structured goals to accomplish, no manual to follow, and no external people to please or satisfy, as would be the case in a mentoring program context. The relationship can be started by either the adult or the youth.

Student Initiated

The present study has found that it was indeed true that either the adult or the student took the initiative to begin the relationship. Students who liked a particular teacher's style of instruction took the first step to stay after class for a subject-related conversation which later continued on to other more in-depth topics. Others admittedly consulted their significant adult (a cousin, an uncle, a tutor) whenever they felt they could not deal with some problems on their own. They were happy to ask for help from someone they trusted.

The advantage of an adolescent reaching out to help her/himself is that the locus of control is on him/her. Larson (2006) emphasized that when adults are overbearing, they undermine motivation and learning in the teenager. Adults are most effective when they support young people's experience of ownership and agency (Ryan & Deci, 2003). In natural mentoring, teenagers may identify their own mentor at a time and in a place of their own preference. Teenagers can also develop the relationship at their own pace. Young people can take ownership of their own action, and experience the positive results of the choice they made.

In psychology, this process is called returning the locus of control to the adolescent, or 'empowering' the youth (Liang, Tracy, Taylor & Williams, 2002). Liang and colleagues asserted that among many characteristics of and benefits from mentoring relationships, youth experience 'empowerment' which is associated with lower levels of loneliness and higher self-esteem among college age women. Informal mentoring affords the youth locus of control, to be 'in the driver's seat' of engaging and maintaining a mentoring relationship, and to receive credit for the positive gains from the relationship. In light of these clear benefits, young people are encouraged to take the initiative to look for and engage an adult to be their mentor.

Adult Initiated

According to this study's findings, adults were not slow to take initiatives in developing a relationship as they saw fit: a father understanding the potential of his son sought ways to interest and develop him, a grandfather taking aside the granddaughter to talk to her about college, a cousin took the student out to dinner, and after a few times, they

began to share on more and more in-depth issues. Adults were often active and sometimes apparently intentional in developing the relationship with the student.

Larson (2006) argued that an apparent 'dilemma' might exist for the adult who has to now try to empower the young person and concurrently keep ownership of the relationship (in a formal mentoring program). Nevertheless, the 'sense' (or perception) of ownership teenagers experience when they are challenged and motivated by the adult to strive to improve or achieve their goals can be invaluable. Thus, the adult mentor sharing ownership with the mentee must motivate, guide, and take initiative appropriately, leaving the locus of control to remain with the mentee. This is a challenge for the adult but it has apparently been possible. Mentors in this study were active and overt and deemed effective by their mentees. These characteristics of a mentor are consistent with those found in previous research (Dubois & Silverthorn, 2005a; Larson, 2006). The same are set as requirements of mentors by structured mentoring programs (Bryan and Zimmerman, 2003; Grossman & Rhodes, 2002; McDonald, Erickson, Johnson & Elder, 2007).

Trust

Active engagement on the part of the adult reportedly did not drive the youth away. Rather, it was much appreciated by the mentee. The crucial factor was in a theme repeatedly surfacing throughout the mentoring process; students' answers to the questions of 'most effective factor in developing the relationship' and 'what made the relationship last?' were consistently, containing the concept of *trust* (see sample quotes in Appendix J). Somewhere in the mentoring process, possibly in the early part of the relationship, 'trust' was established. Trust made possible many behaviors and actions that served to further deepen the relationship. Once trust is established, there is a lesser likelihood of the clash of adult and youth intentions, of who is in control and who is following (Larson, 2006).

A mentor in the present study was described to have heavily reprimanded a student for not making her best effort. The student not only was not offended by the harsh discipline, but interpreted the mentor's action as care, genuine concern for her growth, and deemed the teaching method effective. She trusted her mentor's intentions and actions which she believed to be 'for her own good'. Another student explained the

relationship clearly, “we trust each other. I know I can talk to him about anything, and know that it will be accepted” [I4]. A safe environment has been established in which the mentee feels comfortable to share with the mentor without being judged. Cohen and Steele’s (2002) study of cross cultural student-teacher relationships found that for non White youth to build productive relationships with teachers who belong to different ethnic groups, they must be able to trust the teacher. For such trust to develop, students must feel assured that they will not be viewed through the lens of a negative stereotype. Established trust sets the context for the relationship development and positive learning.

Trust in the mentoring relationship opens doors to teachable moments, learning opportunities, sharing of experience and imparting of wisdom and life lessons, the myriad benefits that can be gained through a successful adult-youth relationship. In this study, students accepted, appreciated and sought out advice, lessons, and even lectures from trusted and experienced adults who shared with their mentees the ‘big picture’ perspectives and their life experiences. It is argued here that the key was not ‘experience’ but ‘trust’, as there are numerous experienced, well trained, and seasoned adults around who are not mentors to a student. While learning and hearing ‘gao fun’ (teachings) from older adults such as grandparents might be more usual in the Chinese culture than in the West, not all grandparents are listened to or have a readily appreciative audience. From the students’ point of view, trust was the major factor here. One teenager noted that her teacher for her college entrance test was very tough in instructing her and confronting her weakness. She trusted the motive of her mentor and actually appreciated her methods of helping her improve. She reported learning to face reality and becoming more mature. Other words from teenagers include, “I trust, love and admire my mentor” [Q126], “trust and honesty maintains our relationship” [Q112], “ they do not interrupt when I speak and I trust them with my secrets” [Q48]. After many interactions and communications, the young people knew that they could hear from and listen to these specific adults, because trust had been developed.

Listening and Talking

If trust is such a vital bridge to making the mentoring relationship effective, the natural question is: what contributed toward the building of trust between the mentor and the mentee? What processes helped develop trust in the mentoring relationship? From being virtual strangers or mere acquaintances to being long-term mentor and mentee, the

recurring theme consistently reported throughout various stages of the relationship was *'talking'* and often coupled with *'listening'*. Students noted that the relationships started with 'a conversation', the cousin took time to talk to the youth, the domestic helper and the teenager talked everyday, the car rides turned into regular conversations about the day, etc. Talks became more in-depth explorations and exchanges about issues and life.

What made the conversations effective was that 'customized advice' (as one teen put it) was developed only after 'intensive listening' had taken place. Having heard the mentee's story and analyzed the circumstances, only then did the mentor begin to share any opinion or advice. Sometimes, the mentor simply listened and was 'just there'. Genuine care of the adult was conveyed and could be felt by the teen as the mentor took time to listen, reflect, talk and help. One student said in the context of continuous conversations with the mentor, "Having casual conversations: this relaxed environment is most effective for me" [Q132]. Thus, the actions of listening and talking (in that order on the part of the mentor) convey genuine care, providing a safe, comfortable environment to the mentee to disclose further of him/herself. This process opens the door to trust and respect enjoyed by both the mentee and mentor.

The themes discussed above emerged from words and descriptions of the mentoring relationships experienced by participants of this study. They are, according to the students, contributing factors to the development of effective mentoring relationships. These findings affirm elements of existing and developing theories on human dynamics and relationships.

Concluding Remarks

In the present study, having experienced informal mentoring is found to be correlated with positive relationship with parents. The rich quantitative and descriptive data shed light on how mentoring started, what factors maintained it, and on the strategies that

worked well for mentoring.

The next logical question is what do all these mean? How do they answer the research questions of the present study? Are the results new discoveries or do they affirm, further develop or conflict with existing theoretical frameworks of human relations, counseling, and adolescent development? Perhaps most important of all, how can the results of the present study influence in practical ways the lives of adolescents and the adults with whom they interact? The conclusion section of this paper in the next session endeavors to answer these questions.

Chapter 5

Conclusion

Introduction

As outlined in the previous chapter, the study confirmed that having experienced informal mentoring relationships is correlated with positive development in youth, in areas of parent-child relationships. While correlations with scholastic achievement, global self worth, and peer relations were not found in the present study, factors possibly affecting any correlations and other intervening factors were discussed with reference to existing research and theories on adolescent development. To understand the processes of mentoring, how mentoring begins, what maintains the relationships and the strategies for mentoring, results of the present study are discussed in the context of some of the prominent theories on relationship development in this chapter. In light of the findings, practical implications for youth looking for a mentor, and an adult aspiring to be a mentor are explored. Recommendations for programs and policies on mentoring for consideration are made. And finally, the significance of the present study is discussed with its limitations and suggestions for further research, with reference to other literature.

Relational Processes: Empathy and Authenticity

In attempting to understand the mentoring process, Spencer (2006) examined the mentoring relationship in the framework of relational theories, which link psychological health and vitality with participation in growth-fostering relationships. Two of the four processes were *Authenticity* and *Empathy*. Authenticity, defined by Spencer as engaging with a relational partner in a genuine way, was emphasized by the pairs of mentee and mentor as important to the building of the relationships and critical to developing trust in their mentors. Students in the present study also found the adult trustworthy because of the genuine care, that is, authenticity, they identified in their mentor.

Another relational process Spencer examined was empathy which in the context of mentoring was the mentors' efforts to understand their mentees' experiences within their current contexts in all of their complexities (Spencer, 2006). Mentors in Spencer's study described being intensely aware of the differences in circumstances and background between themselves and their mentees and striving to understand things from their mentee's perspective. In the present study, mentees experienced empathy as mentors intently listened, understood, reflected, and customized their advice according to the circumstances of the student. Mentors were 'present' and 'with' the student physically, and emotionally.

Genuine Care

The relational processes of Authenticity and Empathy of Relational Theory (Spencer, 2006) found in the present and other studies have been well documented, applied, and used in other human interactions and relationships (Kennedy & Charles, 2001; Rogers, 1959). According to Egan (2006), being present, listening, empathizing, showing genuine care, then reflecting, talking, and advising are key steps and characteristics in the helping process in the counseling framework. Active listening is a skill to be acquired and refined to convey empathy which is a requirement in an effective counseling relationship. In addition to being skillful, considered as one of the most important characteristics in a counselor is his or her genuineness. Counselees, mentees, and anyone engaged in any relationship need to know that the expressions of care are real and genuine. Active listening, summarizing, exploring resources, and other important skills in counseling have little or no effect when genuineness is lacking. While a mentor is not a counselor, relationships such as counseling and mentoring function best with the engagement of the heart. Genuine care expressed through listening and talking is authenticity and empathy which lead to trust and open doors to deeper relations that effect positive change.

Interrelated Processes

In addition to the processes of genuine care, authenticity, and empathy, Rhodes (2005, 2009) has proposed that mentoring affects youth through three interrelated processes (see also Diagram 2 in Literature Review):

1. by enhancing adolescents' social relationships and emotional well-being
2. by improving their cognitive skills through instruction and conversation, and
3. by promoting positive identity development through serving as role models and advocates

Each of these is discussed hereunder, in relation to the findings of the present study.

Interrelated Process 1: Social and Emotional Well-Being Development

One of the ways of developing the social and emotional well-being of young people is providing corrective emotional experiences that may generalize to and improve young people's other social relationships. As discussed earlier, having experienced a positive relationship with a mentor may have given strength to the adolescents to improve other relationships including their parental relationship. Other social relationships such as ones with peers were not found to have improved. Nonetheless, results of the present study lend support to this proposed process, confirming that when young people develop strong and engaging connections with their mentors, their capacity to relate well to others, in this case, parents, also increases (Rhodes, Grossman, & Resch, 2000).

Another way that adults assist young people in developing social and emotional well-being, according to Rhodes, is in emotion regulation (Rhodes, 2005; Rhodes, Spencer, Keller, Liang & Noam, 2006). Young people turned to their mentor sometimes when they were emotionally overwhelmed, with poor grades, facing an end to a relationship, strained by the home environment, etc. Mentors helped them sort out their feelings, see the bigger picture, as well as understand, label and manage their emotional responses. Mentees in the present study reported learning by verbal instructions and modeling of managing anger, depression and crises, from the mentor. Gottman referred to this as 'emotion-coaching' (Gottman, 2001). Good mentors can coach their mentees in

regulating their emotions, thereby influencing them toward positive social emotional development.

Interrelated Process 2: Cognitive Skills Development

In addition to the process of enhancing a youth's social relationships and emotional well-being, the second of Rhodes' three interrelated processes is the improvement of their cognitive skills through instruction and conversation (Rhodes 2002, 2006). A mentor may introduce experiences that broaden the youth's horizons, capture teachable moments to challenge the youth's thinking, and motivate and support the youth exploring intellectual interests and higher level thinking, to name just a few examples of cognitive development (Rhodes et al., 2006).

Although the quantitative findings of this study could not establish a significant correlation between informal mentoring and academic achievement, in the qualitative component, students referred to experiences with their mentor challenging them to overcome their obstacles. One student was challenged to own her shortcoming and to change from her poor study habits and attitude which were leading to imminent failure. Learning in this case was not limited to making a stronger and more serious effort in exam preparation. The mentee concluded that she must always face her problems, discipline herself, and be assertive in all her endeavors [I3].

Another youth devastated by an end to a relationship was grateful for the timely help of her mentor, and wrote, "Not only has my mentor helped me recover from my moment of turmoil, but she has taught me to grow even in tough times – so that if I may encounter similarly difficult situations, I may know how to deal with them more effectively" [I6]. Capturing of teachable moments enabled the learning of life lessons. Student description of cognitive development opportunities were numerous, including the regular and seasonal family gatherings during which words of wisdom were imparted from their older, more experienced, and trusted mentors.

A cognitive skill that may not have been directly taught but apparently learned by experience was decision or choice making. While students on numerous occasions enjoyed receiving advice and 'lectures', students repeatedly expressed appreciation for their mentors not imposing their views on them, but leaving the choice to them to

follow or not the advice given. At times, the mentor guided the young people through the various options available and left the decision to the mentees to make independently. The giving of latitude is powerful in placing the locus of control, discussed previously, on the young people, challenging them to think logically and independently, and holding themselves responsible for the choice and action they make. Cognitive skills of decision-making, independent thinking, and being responsible were thus taught and learned.

Interrelated Process 3: Positive Identity Development

The third process through which mentors affect youth development proposed by Rhodes (2002, 2005) is by the promotion of positive identity development through serving as role models and advocates. Finding one's own identity is a critical developmental task for adolescents (Dobson, 1989; Havighurst, 1971). Evidence of role modeling of mentors abounds in the descriptive data of the present study. Some said in general that they looked to their mentor as a role model and followed their example. One student in particular articulated clearly that she had found her role model for career development and for life in general. She said, "Looking at her, I understand the satisfaction of the identity and profession. I know who I want to be" [I2]. Following the footsteps of her mentor, the mentee went on to study art in a leading art college in the US.

Another mentor was noted for discussing career interests and choices with the mentee several times, finding a summer job for her, taking her to social functions of the business world and talking to her about the experiences. This mentor took initiatives in advocating for the mentee and helping identify her interest and future professional identity. Evidence was found in the present study in support of the three interrelated processes proposed by Rhodes (2006). These processes contribute to the understanding of what makes mentoring effective in promoting positive development in youth.

Implications

It is noteworthy that as documented in the present paper, the findings lend support to a number of processes, theories, and frameworks suggested by various researchers in other contexts on how mentoring works. In addition to affirming processes and furthering knowledge in mentoring relationships, the relevance of research lies in its implications for and applications to the world. Having established from the present study and previous research that informal mentoring contributes to positive adolescent development, the second set of research questions asked how informal mentoring begins, what makes it work, how adults engaged in mentoring youth can be affirmed and encouraged, and what are the implications for youth looking for a mentor and adults aspiring to be a mentor.

For the Youth Wanting a Mentor

Research findings affirm that the majority of the young people sampled in various studies and representing different populations in the world have been able to identify one or more adults who have helped them develop in their potential (i.e. a mentor). Informal mentoring therefore is more of a norm than an exception. It is occurring in natural settings with people in the social network of the youth.

Many of these informal mentoring relationships were started by youth taking the initiative, approaching the potential mentor and asking for help. Given the documented benefits for the youth from mentoring, young people are encouraged to exercise the latitude to choose and take up the challenge of looking for and beginning mentoring relationships. While participants of the present study may have been a particularly well resourced group with many positive social connections, the people named as mentors were none other than ones naturally occurring in the life of the participants and most youths, with the possible exception of domestic helpers. They are uncles, aunts, siblings, family friends, coaches, pastors, teachers, and parents, who are generally available to most youth. Taking the initiative means opening up, being willing to talk, listening, asking for help, paying attention to people who may be reaching out to make a conversation. Better yet, take ownership to make a conversation, as many have reported that the first notable contact seemed to have started with ‘a conversation’.

As in any relationship, further development into a deeper and more meaningful relationship entails reciprocation. Communications with and responses to the adult mentor should be with genuineness (as discussed in previous sections), which would likely elicit the same from the adult. Various expressions of caring, such as spending time together or making a phone call, contribute to the continuation and further development of the mentoring relationship. As communications become more in-depth, respect for each other and trust, a critical element in relationship development (as discussed earlier), will further nurture the mentoring relationship.

Informal mentoring can happen to any youth as mentors are found in the normal contacts of a young person. Therefore, rather than the assertion that all youth *should* have access to mentoring (Lerner & Steinberg, 2004) and regrettably admitting mentoring for all is not happening, the findings of this study inspire hope that perhaps it is not as difficult to find an informal mentor as had been feared in previous research. Among the present cohort, most students had an informal mentor, and many had more than one. A message for youth wanting a mentor is, notice the adults and make use of the opportunities.

For the Adult Aspiring to be a Mentor

As youth become empowered to look for mentors, adults must respond affirmatively. From the myriad programs that pair mentors with youth, many adults have indeed already volunteered themselves to the cause. But many more have not, for various reasons. The discovery from informal mentoring research is that many have become mentors in the natural setting to one or more young people even without being aware that they were doing so. For example, based on the report on the number of mentors that participants of the present study had, a quick estimate indicates that over three hundred and fifty adults were involved as mentors. Thus, for this group of students at least, adults in their lives have either taken initiative or been responsive to becoming a mentor to them.

Students in the present study reflected on not having talked about their ‘mentoring relationship’ with their mentor and that the mentor may not even know that he/she had been such a help to the mentee. Perhaps the positive conclusion from this observation is

that being an informal mentor is not so demanding that one takes notice of the work and effort made, and yet the action and relationship has positive gains and deep meaning for the mentee. On the other hand, the challenge of being an informal mentor may be that there is often no notice taken by the mentee or anyone else; therefore, there is no recognition, reward, or story to tell, unless solicited as in a study, or noticed by the mentee upon reflection. Some of the students of the present study came to realize that they had never thanked their mentor who may not be aware of the major difference they had made in the youth's life. Informal mentors therefore could often be the unsung heroes.

Recognizing the positive difference mentors make for the developing adolescent, the present study, along with previous studies on natural mentoring in particular, calls for the engagement of adults to become informal mentors. The opportunities to make a difference for one or more young people abound, in the natural social network of the adult, regardless of the age of the adult. Mentors named in the present study and other studies ranged from adults just a few years older than the mentee, to well-experienced older adults sharing stories on life lessons, value, and philosophies with the youth. The adult's noticing the youth, giving positive attention to him/her, and initiating a conversation have proven helpful in starting the relationship. Adults are encouraged to be aware of critical moments reflecting needs in the adolescents around them and express genuine care. As expression of empathy is a skill, intentionally improving listening and communication skills could enhance relationship development with youth or people in general. Noticing, reflecting on, or learning about youth struggles could also help adults better understand the young people in their lives. Furthermore, taking courses on skills development and youth could be instrumental in helping adults become effective mentors.

Again, mentees can emerge from the natural connections of the adult. Adults can take note of students in their own classrooms, athletes on the sport team, members in the fellowship, a niece or nephew seen at numerous family gatherings (one might start by actively participating in and even arranging for those gatherings). Initiate a conversation, listen, talk, find the interest of the youth, challenge and develop him/her as needed. As in the case with a youth as a mentee, making a more intentional choice to connect with

an adolescent already in their life and taking ownership of the relationship, can be empowering to both the youth and the adult and reap many rewards for both.

It should be noted that while the aforementioned suggestions encourage young people and adults to take initiatives, notice needs, and be proactive in relationship development, informal mentoring remains as an unstructured and non programmed relationship. Mentors and mentees in informal mentoring are people naturally occurring in the lives of the parties involved. Relationships are not formed with the help or mandate of a third party or a program. Young people and adults are advised to look within their natural connections and to discover opportunities to develop beneficial relationships. Studying the processes of informal mentoring informs what makes mentoring work and with such information, the informal mentors and mentees can choose to develop more effective mentoring relationships. There could be potential at some stage for a book or booklet to advise parents and other potential informal mentors on strategies for mentoring.

A final and critical note on mentoring is that in a mentoring relationship, the needs of the young person are paramount (Bennetts, 2003). Developing the teenager in various growth areas is the raison d'être of mentoring. While the informal mentoring relationship often reaps benefits for both the mentor and the mentee, meeting the needs of the latter defines mentoring (Britner, 2006). As concluded by Rhodes and Lowe (2009) after their thorough review of literature on mentoring, close and enduring ties are fostered when mentors adopt a youth-centered focus in which the young person's interest and preferences are emphasized. Keeping this focus, a key for the adult aspiring to help a youth is, to take note of the young people around, and reach out to meet the needs of someone, through mentoring.

Program and Policy Recommendations

Focused attention in areas of community and school based programs, government initiatives, and policies on mentoring have grown exponentially in the last decade (Dubois & Sileverthorn, 2005b; Fullerton, 1998; Herrera et al., 2007; Karcher, 2008; Lawson, 1997; O'Beirne, 1998; Tierney, 1995). Examination of the various features of formal mentoring has yielded much insight into the process of mentoring. Some of these features include having structured programs that pair adults and youth, following a guideline on interventional measures, and setting goals on the mentor-mentee relationship. From the results, researchers and educators have proposed models and theories on what makes mentoring work, with the purpose of improving the effectiveness of mentoring programs. In more recent years, discovering that informal (natural) mentoring is actually the norm among the general youth population (McDonald, Erickson, Johnson & Elder, 2007) researchers have begun to also focus on mentoring in the natural setting. Most young people interviewed are able to name an adult who has been in the role of a natural mentor for them (Beam et al., 2002; Dubois & Silverthorn, 2005). While research on informal mentoring is in its infant stage, what is striking is that already, there is evidence suggesting that informal mentoring may yield similar benefits to those of formal mentoring. Although the present study could not demonstrate causality, other research has found that informal mentoring relationships facilitate positive gains in the health and well-being of developing youth (Beier, Rsenfele, Spitalny, Zansky, & Bontempo, 2000; Dubois & Silverthorn, 2005; Rhodes, Contreras, Mangelsdorf, 1994).

In informal mentoring, without specially assigned roles, pairing, programmed activities, or ongoing support by an outside source, the adult-teenager relationships are developed and maintained. These natural bonds bring growth to the mentee and satisfaction and learning to the mentor. Formal mentoring on the other hand, requires a cumbersome amount of effort and cost from an outside source, sorting through mentors and mentees to make suitable matches, providing ongoing support and follow up, and even with the best of effort, many relationships end in failure. Aside from the required effort, some unsuccessful connections have been found to bring harm to the mentees and the mentors (Rhodes, 2006). Failing mentoring relationships attested to the difficulties of structured

human relationships. Spencer (2006) notes that as more than half of all formal mentoring relationships dissolve within the first few months (Rhodes, 2002), the 'life-long connections' often described or studied in mentoring relationships are more rare than the zeal mentoring programs often suggest. When mentoring occurs naturally and voluntarily, the adult and youth find and make their own match, without being overtly intentional about it.

It is possible that there are failed relationships as well in informal mentoring. In the present study, students were asked if they had mentors that were helpful to them and therefore, data collected were based on relationships that did work. If the question of whether or not students have had informal mentors that were not helpful to them was asked of the students, data on failed relationships would have been collected. It could be argued that the adult found to be not helpful to the student would not have become a mentor for the student as the relationship would not have begun or develop to become a mentoring one in the first place. These possibilities and logical deductions await exploration with data from further research on informal mentoring.

Developing Informal Mentees

The mentee in an informal mentoring relationship is empowered with choices in mentors, engagement, continuation, and deepening of the relationship. To harness the substantial resource of informal mentoring for more youth, teens need to be made aware of the importance of having a mentor. Based on the benefits that mentoring relationships bring as evidenced by the statements and expressions of the students in the present study, it is recommended that education on the process of mentoring, how it works, and skills in relationship development be a prominent part in the curriculum of life skills classes. The positive effects of informal mentoring on adolescent growth and that informal mentoring is actually an existing 'norm' among youth are recommended to be conveyed to young people to encourage them to actively seek out mentors for themselves. As Larson (2006) asserted, positive development among adolescents depends a great deal on their experience of intentionality. The goal is for the adolescents' own internal motivation to be activated. As young people make their own choices on mentor selection and relationship development, informal mentoring allows

them to take control of their own mentoring relationships and credit for the benefits gained.

Developing Informal Mentors

It is apparent that informal mentoring has numerous advantages over formal mentoring. Recent research is 'catching up' in the inquiry into the informal mentoring processes. Often, the emphasis is on using the knowledge of what makes informal mentoring work and applying them to formal mentoring. Therefore, further examination and development of the processes that make informal mentoring is beneficial to both informal mentors and formal mentoring programs. While 'programming' informal mentoring would make the relationship formal and is not advisable, it is recommended that adults in the community be alerted to the needs and positive effects of informal mentoring, thus motivating them to become an informal mentor. Education on adolescent growth and the developing processes, frameworks, and theories on mentoring are suggested to take place in natural settings, targeting potential natural mentors. Natural settings would include where potential natural mentors live and gather, such as the workplace, churches and other religious groups, social groups (clubs, community groups), and schools. It should be noted that mentors may have dual roles, such as being a teacher who assesses the student and being a mentor who supports the same student, or being a supervisor and a mentor to an intern. Informal mentors will likely have dual roles with the young person. Awareness and understanding of the roles will help maintain and enhance the mentoring relationship.

At the risk of venturing into paradox, natural opportunities for meeting of potential mentors and mentees, could be developed. As discovered in the present research, family gatherings are 'nurseries' for nurturing mentoring relationships. Arrangement of and encouragement to attend such gatherings can directly enhance the development of natural mentoring. Similarly, in the community, gatherings with cross age participation can contribute to the cultivation of mentorship development. Rather than or in addition to 'pairing' up adults and youth, natural mentoring relationships are recommended to be cultivated through community gatherings such as fundraisers, marathons, service oriented projects, etc. In addition to being informed on adolescent development, part of the education for the informal mentors is suggested to draw on their own experiences

from their teen years, remembering and analyzing what made their own relationships with mentors work. With opportunities to cultivate mentoring, adults and youth educated on the benefits of mentoring and equipped with relationship development skills, positive mentoring relationships can result.

School as an Environment for Informal Mentoring

For young people who have minimal support in the family and are not connected with the community, the natural setting where they can meet positive adults is school. Teachers, coaches, and school personnel have a critical role in providing opportunities for mentorship. It is conceded that informal mentoring, with all its advantages, is nonetheless left to the resources, initiative, and effort of the adolescent supported by the adult to form and develop. Recent research has suggested the painful but real phenomenon that mentoring relationships are least likely to form among young people who need mentors the most, that is, disadvantaged youth (Erickson, 2005). When the formation of mentoring relationships is left entirely to the youth, the fear is that mentoring will not occur. Thus, the role of structured mentoring programs for at-risk youth, who may not trust adults, is a significant one. In contrast, the participants in the present study came from privileged rather than disadvantaged backgrounds, which may have contributed to the vast majority having access to one or more informal mentors.

The general population of adolescents is engaged in a school setting for a substantial period of time on a regular basis. The opportunity for schools to facilitate in engaging informal mentors and mentees seems to be a natural solution. As discussed earlier, schools are recommended to develop a culture and environment that can cultivate and nurture the development of informal mentoring relationships. One example is a Homeroom System in which homeroom teachers see the student every day and is the first line of care for the student. Time, activities and goals are set out in homeroom that focuses on the overall growth of the student.

The class schedule of a school day is arranged with adequate time in between classes or during recesses for students to consult with and speak at leisure with teachers to nurture the development of connections between subject teachers and students. The expectation that teachers are available to meet with and guide students is made overt and training in

adolescent development and communication skills recommended to be provided to teachers. A support system such as guidance counselors, or a counseling team should be in place for teachers to deal with students with greater needs or difficulties. Through such intentional education on becoming a mentor or a mentee and creation of opportunities for mentor-mentee connections in school, family, and community, the reality is no longer every youth *should* or *can* have a mentor, but every youth *does have* a mentor.

Recommendations on Further Studies

The following recommendations are offered with the limitations of the study in mind. The relatively small and unique sample of the present study limits the generalizability of its findings beyond the sample studied. The total sample was 163, comprising the majority of the graduating class of the Hong Kong International School. The background of the sample was unique as it came from an international secondary school, one of only 27 in Hong Kong (Education Bureau, 2008). While the results found in the study may be limited to the sample, they are nevertheless consistent with findings from other research that drew from large samples through nation-wide longitudinal studies on formal mentoring and informal mentoring (Dubois & Silverthorn, 2005; Rhodes et al., 2000). The fact that similar results in informal mentoring were found in a sample in Asia lends support to the likelihood of generalizability of the effects of informal mentoring across cultures.

Since very few studies have investigated informal mentoring in China, and even within Asia more generally, it is hoped that this study will stimulate interest in further studies using Asian samples. For example, in Asian culture, the concept of mentoring is often through the relationship of a ‘Master’ and an ‘Apprentice’, in usually skill-based areas,

what Karcher et al. (2006) would call ‘instrumental mentoring’. Such relationships are known to extend well beyond the skill learning arena, and onto life-long relationships on values, life-lessons, philosophies, etc. Given the strong pre-existing concept in mentoring in Chinese and much of Asian history, education and philosophy, what difference might there be between mentoring relationships in China (or other Asian countries) and in the west? What are the processes that work well in traditional Chinese mentoring that are in use or can be used in mentoring today? How have traditional Chinese or Asian mentoring influenced modern day mentoring and what can be learned from it in Asia and in the west? These questions are yet to be explored and answered with data drawn from Chinese or other Asian populations.

There are advantages to having a sample from an international school in which there was no one particular ethnicity or culture but a mixture of many cultures from various parts of the world as detailed in Chapter 3. Results from the present study can be considered to have implications across ethnic groups based on the sample, thus widening the scope of impact of the present study. However, it would be informative as well as intriguing to compare results between the present sample and a sample from a local (that is, not international) school in Hong Kong. Difference in culture or background would be highlighted by any difference found in the results. The present study did not attempt the comparison because of its intent of focusing on one manageable issue at a time, but further research with such comparisons would be most valuable.

Another limitation of the present study is that the interviews and survey of the present study were single snapshots in time of the mentoring relationships. Students were asked to draw from retrospective accounts of mentoring relationships. While the quantitative data and qualitative description pointed toward apparent positive differences made by informal mentoring, the actual difference could not be quantified or monitored. A longitudinal study in this case, with various measures at different stages of the mentee’s life and forming a series of in-depth case studies, would yield more direct evidence.

Furthermore, mentees’ recollections of mentoring relationships at one particular instance may have had the tendency to focus only on the positive mentoring relationships in their life, and rejecting the ones that had failed. Selective reporting

often provides a challenge for the accuracy of self-reported data. The present study did not address the informal relationships that did not work out but asked the question that if there had been one or more mentors, how those relationships had worked. If the relationship had not worked, the participant was free to say so. In this study's data, there were no references to any negative experience. Nevertheless, as examples of failed formal mentoring relationships abound and learning from them had proven helpful, the studying of what did not make an informal mentoring relationship work should provide a valuable and more comprehensive understanding of informal mentoring.

In contrast to informal mentoring, much attention in terms of program development, government budgets, and research has been poured into structured mentoring programs. The creation of assigned mentor relationships is currently being viewed as a powerful intervention for disadvantaged or at-risk youth (Spencer, 2006). Therefore, mentoring programs are growing at an exponential rate (Rhodes, 2002). Many of these programs have developed quickly and in isolation of established methodologies or strategies based on up to date research. Researchers are concerned that the gap between new mentoring initiatives and the knowledge base on mentoring is widening. Within this gap, development of the knowledge base on informal mentoring is lagging behind even more severely (Dubois & Rhodes, 2006). Research on informal mentoring is in its infant stage, receiving some attention only in recent years. Owing to calls from researchers (Beams et al., 2002; Bennetts, 2003; Dubois et al., 2002; Rhodes, 2000, 2002), some research has begun and to date only a relatively small number of research projects have explored the subject of Informal Mentoring (Hamilton & Hamilton, 2005; Silverthorn, 2005). Some researchers have noted the lack of differentiation between formal and informal mentoring (Allen, Eby, O'Brien & Lentz, 2008).

What is of interest is that, without the effort and required budgets of formal mentoring, informal mentoring may be able to achieve similar results to those of formal mentoring. Further studies on the processes of formation, development and maintenance of informal mentoring are needed to encourage more informal mentoring to develop and to shed light on when and how to apply the processes in formal mentoring to achieve the best results. Processes and frameworks need to be further developed and documented, with connections to the theories and knowledge base on human relationships.

Conclusions

The present study examined the correlation between informal mentoring and adolescent development. While correlations between mentoring and scholastic competence, global self worth and peer relations were not found, the quantitative section of the study confirmed that informal mentoring correlated with better relationships with adults, in this case, parental relationship. This is connected to other studies' findings of improved psychological well-being and social-emotional adjustment. The mentored students have stronger significant relationships in their life, an important indicator of positive adolescent development.

Also investigated were the processes of informal mentoring through qualitative studies. Answers to questions on how mentoring began, what was most effective about it, and what made it last, gave much insight on the functions, processes, skills, and motivation in mentoring. Findings supported many of the processes proposed by researchers. Some of the more prominent processes this study supported include Karcher and his colleagues' (2006) model on Instrumental and Developmental Mentoring, Rhodes' (2002, 2005) model on the three interrelated processes of social and emotional development, cognitive development, and identity development, and Spencer's relational processes of Authenticity and Empathy of Relational Theory (2006). Findings from the present study confirmed the processes theorized from formal mentoring.

In using a similar framework and methodology as those used in a study on formal mentoring by Rhodes et al. (2000), the present study found similar results in informal mentoring. A recent study (Dubois & Silverthorn, 2005) also confirmed the powerful effects of informal mentoring. The study reported in this thesis combined quantitative and qualitative studies in which the qualitative findings enriched and explained the quantitative findings. This model of study, while requiring effort, was especially rewarding in terms of 'making sense' of the results.

Furthermore, to date, little research has been conducted in Hong Kong, China, with a sample from a population of different background from the US or western nations. This study began to discuss the relationship between Chinese (Asian) culture and the processes of mentoring, introducing further opportunities for research on culture and mentoring. Data and findings from this study added new dimensions and applications to knowledge and studies of informal mentoring and mentoring in general.

Perhaps most important of all, the present study confirmed that informal mentoring is a common phenomenon, makes a positive difference in the development of youth, and both the adult and youth are responsible for starting, developing, and maintaining the relationship. Adults already being mentors have been effective in expressing empathy (taking time to listen and talk) and being genuine (authenticity) which developed mutual trust, a key to furthering the relationship. Mentors can be affirmed of their work as they have helped adolescents develop in vital areas of growth. These areas include

1. social adjustment, such as emotional regulation
2. cognitive development, including specific skills and higher thinking skills
3. identity development, in which the mentor is a role model to help the mentee find develop/determine his/her own.

The process of mentoring brings rewards and meaning to both the mentor and the mentee. With defined benefits in and from the relationship, young people are urged to seek out one or more mentors throughout their years of adolescent growth, starting with adults they are already acquainted with. Adults with a genuine desire to help young people are encouraged to look through their own social network, identify possible mentees, and initiate relationships that will make a powerful difference in the lives of youth, one at a time.

Appendices

Appendix A

Invitation and Letter of Consent

Thank You for considering to participate in the research on the Effects of Informal Mentoring on Adolescent Development!

The following is some details on the research for your information:

The present research conducted by Ann Ling Mok for her Educational Doctorate Program with the University of Technology, Sydney will answer the questions: Is personal growth correlated with having experienced valuable mentoring relationships? What are the areas of personal growth that are affected? How are the informal mentoring relationships formed and developed? The areas of adolescent growth being studied are social emotional development indicated by scales on peer and parent relationships, academic achievement reflected by a scholastic competence scale and grade point averages, and self sufficiency and worth indicated by scores from a self worth scale. Participation in the study will involve completion of the questionnaire that entails these scales and questions on the mentoring relationship. Time used will be approximately one hour. Some of the students will also be interviewed on how the relationships were developed and maintained.

The data collected from the study will be kept confidential. Students will be given a number to be placed on their questionnaire. The code that links the name of the student with the assigned number will be used to identify the collected data with the student's grade point average (GPA). The code will be stored separately from the collected data and will be accessible to the researcher only. The researcher and other readers of the qualitative data during data analysis will have access to the data. After completion of the research, only the researcher will have access. Hard and soft copies of the data will be stored in a box marked confidential in the researcher's storage area at home. The quantitative data will be analyzed through t tests for differences between the mentored and the non-mentored groups in the four variables. The written (qualitative) data will be sorted by recurring themes and reported.

This research is entirely separate from assessment exercises in any of the student's classes. Participation and results from the research will not affect the student's grade in any way.

I have read the above and consent to participating in the research.

Name Signature

Appendix B

Letter to Students and Parents

March, 2005

Dear Students and Parents,

I deeply appreciate your participation in my research for the Educational Doctorate Program with the University of Technology, Sydney. The present study is on the topic of mentoring, to explore how informal mentoring relationships may affect adolescent growth. It will answer the questions: Is personal growth correlated with having experienced valuable mentoring relationships? What are the areas of personal growth that are affected? How are the informal mentoring relationships formed and developed? The areas of adolescent growth being studied are social emotional development indicated by scales on peer and parent relationships, academic achievement reflected by a scholastic competence scale and grade point averages, and self sufficiency and self worth indicated by scores from a self worth scale. Participation in the study involves completion of the questionnaire that entails these scales and questions on the mentoring relationship. Time used was approximately one hour. You could also volunteer to be interviewed on how the relationship were developed and maintained.

The data collected from the study will be kept confidential. You were given a number to be placed on the questionnaire. The code that links your names with the assigned number will be used to identify the collected data with your grade point average (GPA). The code will be stored separately from the collected data and will be accessible to me only. During data analysis, a reader of the qualitative data and I will have access to the data. After completion of the research, only I will have access. Hard and soft copies of the data will be stored in a box marked confidential in my storage area at home. The quantitative data will be analyzed through t tests for differences between the mentored and the non-mentored groups in the four variables. The written (qualitative) data will be sorted by recurring themes and reported.

This research is entirely separate from assessment exercises in any of your classes. Participation and results from the research will not affect your grade in any way. The questionnaire you completed will remain anonymous and your identity protected. All data will be securely kept in confidence.

Should you have any question regarding this research study, please contact me at [redacted] or [redacted]. Again, I am grateful for your help and generous giving of your time and effort in completing the questionnaire.

Very Sincerely Yours,

Ann Ling Mok
EdD Student at UTS

Appendix C

Self Perception Profile of Adolescents (SPPA)

What I Am Like

Name_____ Age_____ Birthday_____ Group_____
Month Day

SAMPLE SENTENCE

	Really True for Me	Sort of True for Me				Sort of True for Me	Really True for Me
a)	☐	☐	Some teenagers like to go to movies in their spare time	**BUT**	Other teenagers would rather go to sports events.	☐	☐
1.	☐	☐	Some teenagers feel that they are just as smart as others their age	**BUT**	Other teenagers aren't so sure and wonder if they are as smart.	☐	☐
2.	☐	☐	Some teenagers find it hard to make friends	**BUT**	For other teenagers it's pretty easy.	☐	☐
3.	☐	☐	Some teenagers do very well at all kinds of sports	**BUT**	Other teenagers don't feel that they are very good when it comes to sports.	☐	☐
4.	☐	☐	Some teenagers are *not* happy with the way they look	**BUT**	Other teenagers *are* happy with the way they look.	☐	☐
5.	☐	☐	Some teenagers feel that they are ready to do well at a part-time job	**BUT**	Other teenagers feel that they are not quite ready to handle a part-time job.	☐	☐
6.	☐	☐	Some teenagers feel that if they are romantically interested in someone, that person will like them back	**BUT**	Other teenagers worry that when they like someone romantically, that person *won't* like them back.	☐	☐
7.	☐	☐	Some teenagers usually do the right thing	**BUT**	Other teenagers often don't do what they know is right.	☐	☐
8.	☐	☐	Some teenagers are able to make really close friends	**BUT**	Other teenagers find it hard to make really close friends.	☐	☐
9.	☐	☐	Some teenagers are often disappointed with themselves	**BUT**	Other teenagers are pretty pleased with themselves.	☐	☐
10.	☐	☐	Some teenagers are pretty slow in finishing their school work	**BUT**	Other teenagers can do their school work more quickly.	☐	☐
11.	☐	☐	Some teenagers have a lot of friends	**BUT**	Other teenagers don't have very many friends.	☐	☐
12.	☐	☐	Some teenagers think they could do well at just about any new athletic activity	**BUT**	Other teenagers are afraid they might not do well at a new athletic activity.	☐	☐

	Really True for Me	Sort of True for Me				Sort of True for Me	Really True for Me
3.	☐	☐	Some teenagers wish their body was different	**BUT**	Other teenagers like their body the way it is.	☐	☐
4.	☐	☐	Some teenagers feel that they *don't* have enough skills to do well at a job	**BUT**	Other teenagers feel that they *do* have enough skills to do a job well.	☐	☐
5.	☐	☐	Some teenagers are *not* dating the people they are really attracted to	**BUT**	Other teenagers *are* dating those people they are attracted to.	☐	☐
6.	☐	☐	Some teenagers often get in trouble for the things they do	**BUT**	Other teenagers usually *don't* do things that get them in trouble	☐	☐
7.	☐	☐	Some teenagers do have a close friend they can share secrets with	**BUT**	Other teenagers do not have a really close friend they can share secrets with	☐	☐
8.	☐	☐	Some teenagers don't like the way they are leading their life	**BUT**	Other teenagers do like the way they are leading their life.	☐	☐
9.	☐	☐	Some teenagers do very well at their classwork	**BUT**	Other teenagers don't do very well at their classwork.	☐	☐
0.	☐	☐	Some teenagers are very hard to like	**BUT**	Other teenagers are really easy to like.	☐	☐
1.	☐	☐	Some teenagers feel that they are better than others their age at sports	**BUT**	Other teenagers don't feel they can play as well.	☐	☐
2.	☐	☐	Some teenagers wish their physical appearance was different	**BUT**	Other teenagers like their physical appearance the way it is.	☐	☐
3.	☐	☐	Some teenagers feel they are old enough to get and keep a paying job	**BUT**	Other teenagers do not feel they are old enough, yet, to really handle a job well	☐	☐
4.	☐	☐	Some teenagers feel that people their age will be romantically attracted to them	**BUT**	Other teenagers worry about whether people their age will be attracted to them.	☐	☐
5.	☐	☐	Some teenagers feel really good about the way they act	**BUT**	Other teenagers *don't* feel that good about the way they often act	☐	☐
6.	☐	☐	Some teenagers wish they had a really close friend to share things with	**BUT**	Other teenagers *do* have a close friend to share things with.	☐	☐
7.	☐	☐	Some teenagers are happy with themselves most of the time	**BUT**	Other teenagers are often not happy with themselves.	☐	☐
8.	☐	☐	Some teenagers have trouble figuring out the answers in school	**BUT**	Other teenagers almost always can figure out the answers.	☐	☐

	Really True for Me	Sort of True for Me				Sort of True for Me	Really True for Me
29.	☐	☐	Some teenagers are popular with others their age	**BUT**	Other teenagers are not very popular.	☐	☐
30.	☐	☐	Some teenagers don't do well at new outdoor games	**BUT**	Other teenagers are good at new games right away.	☐	☐
31.	☐	☐	Some teenagers think that they are good looking	**BUT**	Other teenagers think that they are not very good looking.	☐	☐
32.	☐	☐	Some teenagers feel like they could do better at work they do for pay	**BUT**	Other teenagers feel that they are doing really well at work they do for pay.	☐	☐
33.	☐	☐	Some teenagers feel that they are fun and interesting on a date	**BUT**	Other teenagers wonder about how fun and interesting they are on a date.	☐	☐
34.	☐	☐	Some teenagers do things they know they shouldn't do	**BUT**	Other teenagers hardly ever do things they know they shouldn't do.	☐	☐
35.	☐	☐	Some teenagers find it hard to make friends they can really trust	**BUT**	Other teenagers *are* able to make close friends they can really trust.	☐	☐
36.	☐	☐	Some teenagers like the kind of person they are	**BUT**	Other teenagers often wish they were someone else.	☐	☐
37.	☐	☐	Some teenagers feel that they are pretty intelligent	**BUT**	Other teenagers question whether they are intelligent.	☐	☐
38.	☐	☐	Some teenagers feel that they are socially accepted	**BUT**	Other teenagers wished that more people their age accepted them.	☐	☐
39.	☐	☐	Some teenagers do not feel that they are very athletic	**BUT**	Other teenagers feel that they *are* very athletic.	☐	☐
40.	☐	☐	Some teenagers really like their looks	**BUT**	Other teenagers wish they looked different.	☐	☐
41.	☐	☐	Some teenagers feel that they are really able to handle the work on a paying job	**BUT**	Other teenagers wonder if they are really doing as good a job at work as they should be doing	☐	☐
42.	☐	☐	Some teenagers usually *don't* go out with the people they would really like to date	**BUT**	Other teenagers *do* go out with the people they really want to date.	☐	☐
43.	☐	☐	Some teenagers usually act the way they know they are supposed to	**BUT**	Other teenagers often don't act the way they are supposed to.	☐	☐
44.	☐	☐	Some teenagers *don't* have a friend that is close enough to share really personal thoughts with	**BUT**	Other teenagers do have a close friend that they can share personal thoughts and feelings with.	☐	☐
45.	☐	☐	Some teenagers are very happy being the way they are	**BUT**	Other teenagers wish they were different.	☐	☐

INVENTORY OF PARENT AND PEER ATTACHMENT (IPPA)

Authors:

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This questionnaire asks about your relationships with important people in your life; your mother, your father, and your close friends. Please read the directions to each part carefully.

Part I

Some of the following statements asks about your feelings about your mother or the person who has acted as your mother. If you have more than one person acting as your mother (e.g. a natural mother and a step-mother) answer the questions for the one you feel has most influenced you.

Please read each statement and circle the ONE number that tells how true the statement is for you now.

	Almost Never or Never True	Not Very Often True	Some-times True	Often True	Almost Always or Always True
1. My mother respects my feeling.	1	2	3	4	5
2. I feel my mother does a good job as my mother.	1	2	3	4	5
3. I wish I had a different mother.	1	2	3	4	5
4. My mother accepts me as I am.	1	2	3	4	5
5. I like to get my mother's point of view on things I'm concerned about.	1	2	3	4	5
6. I feel it's no use letting my feelings show around my mother.	1	2	3	4	5
7. My mother can tell when I'm upset about something.	1	2	3	4	5
8. Talking over my problems with my mother makes me feel ashamed or foolish.	1	2	3	4	5
9. My mother expects too much from me.	1	2	3	4	5
10. I get upset easily around my mother.	1	2	3	4	5
11. I get upset a lot more than my mother knows about.	1	2	3	4	5
12. When we discuss things, my mother cares about my point of view.	1	2	3	4	5
13. My mother trusts my judgment.	1	2	3	4	5
14. My mother has her own problems, so I don't bother her with mine.	1	2	3	4	5
15. My mother helps me to understand myself better.	1	2	3	4	5
16. I tell my mother about my problems and troubles.	1	2	3	4	5
17. I feel angry with my mother.	1	2	3	4	5
18. I don't get much attention from my mother.	1	2	3	4	5
19. My mother helps me to talk about my difficulties.	1	2	3	4	5
20. My mother understands me.	1	2	3	4	5
21. When I am angry about something, my mother tries to be understanding.	1	2	3	4	5
22. I trust my mother.	1	2	3	4	5
23. My mother doesn't understand what I'm going through these days.	1	2	3	4	5
24. I can count on my mother when I need to get something off my chest.	1	2	3	4	5
25. If my mother knows something is bothering me, she asks me about it.	1	2	3	4	5

Part II

This part asks about your feelings bout your father, or the man who has acted as your father. If you have more than one person acting as your father (e.g. natural and step-father) answer the question for the one you feel has most influenced you.

	Almost Never or Never True	Not Very Often True	Some-times True	Often True	Almost Always or Always True
1. My father respects my feelings.	1	2	3	4	5
2. I feel my father does a good job as my father.	1	2	3	4	5
3. I wish I had a different father.	1	2	3	4	5
4. My father accepts me as I am.	1	2	3	4	5
5. I like to get my father's point of view on things I'm concerned about.	1	2	3	4	5
6. I feel it's no use letting my feelings show around my father.	1	2	3	4	5
7. My father can tell when I'm upset about something.	1	2	3	4	5
8. Talking over my problems with my father makes me feel ashamed or foolish.	1	2	3	4	5
9. My father expects too much from me.	1	2	3	4	5
10. I get upset easily around my father.	1	2	3	4	5
11. I get upset a lot more than my father knows about.	1	2	3	4	5
12. When we discuss things, my father cares about my point of view.	1	2	3	4	5
13. My father trusts my judgment.	1	2	3	4	5
14. My father has his own problems, so I don't bother him with mine.	1	2	3	4	5
15. My father helps me to understand myself better.	1	2	3	4	5
16. I tell my father about my problems and troubles	1	2	3	4	5
17. I feel angry with my father	1	2	3	4	5
18. I don't get much attention from my father.	1	2	3	4	5
19. My father helps me to talk about my difficulties.	1	2	3	4	5
20. My father understands me.	1	2	3	4	5
21. When I am angry about something, my father tries to be understanding.	1	2	3	4	5
22. I trust my father.	1	2	3	4	5
23. My father doesn't understand what I'm going through these days.	1	2	3	4	5
24. I can count on my father when I need to get something off my chest.	1	2	3	4	5
25. If my father knows something is bothering me, he asks me about it.	1	2	3	4	5

Part III

This part asks about your feelings about your relationships with your close friends.
Please read each statement and circle the ONE number that tells how true the statement is for you now.

	Almost Never or Never True	Not Very Often True	Some-times True	Often True	Almost Always or Always True
1. I like to get my friend's point of view on things I'm concerned about.	1	2	3	4	5
2. My friends can tell when I'm upset about something.	1	2	3	4	5
3. When we discuss things, my friends care about my point of view.	1	2	3	4	5
4. Talking over my problems with friends makes me feel ashamed or foolish.	1	2	3	4	5
5. I wish I had different friends.	1	2	3	4	5
6. My friends understand me.	1	2	3	4	5
7. my friends encourage me to talk about my difficulties.	1	2	3	4	5
8. My friends accept me as I am.	1	2	3	4	5
9. I feel the need to be in touch with my friends more often.	1	2	3	4	5
10. My friends don't understand what I'm going through these days.	1	2	3	4	5
11. I feel alone or apart when I am with my friends.	1	2	3	4	5
12. My friends listen to what I have to say.	1	2	3	4	5
13. I feel my friends are good friends.	1	2	3	4	5
14. My friends are fairly easy to talk to.	1	2	3	4	5
15. When I am angry about something, my friends try to be understanding.	1	2	3	4	5
16. My friends help me to understand myself better.	1	2	3	4	5
17. My friends care about how I am					
18. I feel angry with my friends.	1	2	3	4	5
19. I can count on my friends when I need to get something off my chest.	1	2	3	4	5
20. I trust my friends.	1	2	3	4	5
21. My friends respect my feelings.	1	2	3	4	5
22. I get upset a lot more than my friends know about.	1	2	3	4	5
23. It seems as if my friends are irritated with me for no reason.	1	2	3	4	5
24. I can tell my friends about my problems and troubles.	1	2	3	4	5
25. If my friends know something is bothering me, they ask me about it.	1	2	3	4	5

Appendix E

You and Your Mentor(s)

1. There has been one or more person(s) in your life who was (were) most responsible for helping your potential to develop most fully.

___not at all true ___not very true ___somewhat true ___quite true ___very true

2. How many persons were there? _____, They were (check as applied):

____*a teacher*
___ *a counselor/dean*
___ *a parent*
___ *an older sibling*
___ *an older friend*
___ *an uncle/aunt*
___ *other, please specify* _____

3. I have received a lot of support from my mentor(s).

___*not at all true* ___*not very true* ___*somewhat true* ___*quite true* ___*very true*

4. How did the mentoring relationship(s) begin? Explain each as appropriate.

5. How often did you meet (spend time) with each of your mentor(s)?

6. What areas of help did your mentor(s) give you, for example, friendship problems, academic issues, career directions, life lessons, relationship with parents, etc.?

7. How did your mentor(s) help you? What was most effective to you?

8. What helped the mentoring relationship(s) last ?

9. Anything else about your mentoring relationship(s)?

Appendix F

Interview Schedule

1. How did the mentoring relationships begin?

2. How were you mentored?

3. How frequently do you and your mentor meet?

4. About what things were you mentored?

5. Did the mentor give advice when he/she thought it was needed or did he/she wait till asked?

6. Were you ever dissatisfied with the advice/help given?

7. When did you / did you not act on or follow the advice?

8. Can you tell me about a particular time that you felt grateful to the mentor for advice given or behavior modeled?

9. Give 5 words that describe your mentor.

Appendix G

Sample Quotes on Frequency of Contact with their Mentors

A few times a week via email [Q117]
Met 2 times a week [Q88]
Talk every or every other night [Q103]
Phone or online, since they're in college now [Q62]
Vacations, when he's back in HK [Q43]
Summer with uncle/aunt [Q58]
Every Sunday with my pastor [Q17]
Random phone calls or meetings after school as time of discussion permit [Q45]
At least 3 times a year I see my uncle, talk on the phone with him [Q42]
Twice a month [Q35]
Every day in class and whenever we feel like talking [Q5]

Appendix H

How Mentoring Began

Emerging Themes	***Sample Quotes***
1. Natural and easy access:	● I was born into my family; they're related to me [Q118]* ● Through family gatherings, regular and many family gatherings…Moon Festival, Chinese New Year dinners and visits, Ching Ming, Chung Yeung (we visited graves together), grandma's 'big' birthday parties; we met and kept connected: aunts, uncles, older cousins [Q35] ● My cousin took special care of me…talking and giving specific help to me [Q126] ● My domestic helper's been there for me since my birth [Q16] ● A class that met regularly for a year at least and kept connection with the teacher [Q174] ● Tutoring or lessons outside of school, went regularly [Q112] ● My saxophone teacher who challenged me to take up an additional instrument and opened up my horizon [I7] ● Regularly, every summer, I visited and sometimes lived with my aunt [Q58]
2.Always involved *Talking*	● the relationship started through a conversation [Q175] ● we talked through the night [Q128] ● we talk every day [Q132] ● I talked to my sister about things I wasn't comfortable talking with my parents about. She's a role model for me [Q172] ● She asked to have dinner with me, during which we talked more and more [I2] ● We would talk during our family gatherings, about anything [Q35] ● We went well beyond the subject of music and musicianship and talked about things that were bothering me, at different stages [I7]
3. *Time* was spent to start the relationship	● He had sacrificed a lot of his time for me [Q64] ● We talk about everything all the time [Q105] ● Teacher was willing to take time with me [Q108] ● I spent a huge amount of time with my mentors, we talked about everything [Q122] ● My mentor always has time for me, I never feel neglected [Q128] ● We had limited time but necessary time together [Q88] ● My cousin would take a detour from his business trip to visit me in the States during the summer [I4]
4. Student's *Need*	● I needed to talk to someone [Q62] ● I needed help in a subject [Q63] ● I took the course to prepare for my SAT tests [Q110] ● I was looking for answers to questions about things [Q3] ● She gives me care and support which are needed every day [Q113] ● I realized I was in trouble and needed help [Q143] ● my parents were going through a divorce; I felt my world crashing in [I2] ● I wasn't sure if I wanted to move to Hong Kong… I needed some

	affirmation [Q188]
5. *Student* initiated	● I've always been used to asking my mum questions about life and other problems [Q132] ● I consult them whenever I feel I cannot deal with some problems on my own [Q62] ● I admired my Taekwando teacher and began to ask him about other things [Q130] ● I looked for older friends and cousins to help with various things [Q78] ● She is all I want to be…. My role model; she even responded to my request for help [I2]
6. *Adult* Initiated	● my mum always asks me how things are going [Q23] ● I was experiencing problems in school and my teacher asked me about it [Q110] ● my dad recognized my areas of potential and put his time, money, and effort into helping me improve and become a better person [Q64] ● my church youth pastor called me up [Q17] ● my grandpa gave me a strong life lesson about college [Q68] ● my cousin took me out to dinner… after a few times, we began to share on more and more in-depth issues [I4] ● my talks to me about other lessons, life lessons [Q122]

*denotes location of quote, for example, Q181 is from questionnaire #181, and I7 is from Interview #7

Appendix I

What Made Mentoring Last?

Emerging Themes	***Sample Quotes***
Continuous Contact	● Continual support and just checking in [Q186]* ● Constant contact/communication [Q182] ● Frequent meetings and chats [Q188] ● Regular contact, honesty, explaining yourself, being open [Q172] ● By keeping in touch [Q171] ● Keeping in touch, hanging out together [Q110] ● Frequent connecting [Q197] ● Close connections made it last [Q117] ● I made conscious decisions to continue to talk with him, to keep in touch [Q43]
Common-alities	● Sports [Q119] ● Similarity in how we act and activities we both like to do [Q123] ● Family bonds [Q133] ● Fun times, kindness [Q112] ● Our personalities are very alike; she encouraged me to try new things [Q58] ● The gatherings and things we do together help it last [Q35]
Talking	● We talk all the time, I take initiative to ask questions [Q105] ● Talking about anything I want [Q17] ● They shared their knowledge and wisdom with me a lot [Q5] ● Being able to talking things through [Q182]
Trust and Respect	● Mutual trust and respect [Q126] ● Trust [Q122] ● Ease of conversation and mutual trust [Q108] ● A sense of neutrality, like their responses weren't colored too much with their own personal beliefs [Q182] ● I can be comfortable to be myself around them [Q196] ● The fact that they don't try to push things on me [Q191] ● Respect, trust [Q138] ● A good atmosphere [Q193] ● Open and honest relationship, talk about anything; trust [Q122] ● They did not interrupt when I spoke, and I trusted them with my secrets [Q48]
Genuine Care	● Respect, a caring relationship [Q187] ● He's my dad, he really cares deeply about me [Q184] ● I hope they know how much help they've been; I appreciate them so much [I2] ● I'm really lucky, glad, and thankful that I have met my mentors [Q127] ● I grew up with her. She is like a second mother to me and I love her greatly [Q16] ● Kind and genuine [Q5] ● The fact that I knew they were my parents who really care for me [Q119] ● Engagement and care [Q131] ● Communicate a lot, patience [Q58] ● Our efforts in loving each other [Q1] ● We are family and therefore are always there no matter what [Q101]

*denotes location of quote, for example, Q186 is from questionnaire #186, and I2 is from Interview #2

Appendix J

What did your mentor do that was most effective in helping you?

Most Effective	***Sample Quotes***
1. Listening with Genuine Care (taking time to listen, respond, and comfort)	• He listened to me with genuine care [Q121]* • They talk and listen without judging [Q172] • She just listens to me and gave advice I could take or not [Q107] • giving me options, mostly just listening and understanding [Q186] • Always support, calm and understanding [Q108] • Listen to my problems and concerns [Q188] • Just listening to me and encouraging me [Q179] • Just talking; taking care of me when I'm sick, being there for me [Q3]
2. Talking (by either mentor or mentee)	• I can talk my problems out [Q113] • talks to me privately [Q105] • Talking and listening, not giving me answers, but made me find it [Q196] • Having casual conversations: this relaxed environment is always most effective for me [Q132] • Just talking [Q35] • Mostly through talking and discussing our different points of view and helping me solve my problem [Q1] • They usually analyze what happened, then seek to understand why things happened the way they did, what I think about it, and finally tell me what they think about it and possible solutions [Q1] • Meeting once in a while and talking was most effective [Q78] • Talking to me [Q173]
3. Giving choice and latitude	• Gave me advice I could take or not take [Q107] • My mentors never imposed their views on me: they supported me when I asked for help or advice and acted more like equal friends than anything else [Q43] • she asks me how I am doing ever so often but also gives me space when I need it…until I am ready to talk to her, then only will she talk to me [Q23] • Saying the possibilities and always respecting my decision [Q42] • Came up with strategies that would help me, to discover myself, and my potential. Sort of gave me a direction for my future [Q130] • Not very pushy on how I should act, whether or not I followed the advice given [I1] • Provide me with information that helped make good choices [Q191] • Giving me options [Q183] • When I did not want to, I did not follow the advice, and that was 'ok' with him [I3]
4. Sharing experience, showing, modeling	• Stories from their own experiences [Q18] • They gave me their own experiences which helped me make my own conclusions [Q171] • She shared herself who was my role-model and who has fulfilled my

	childhood dream! [I2] • Real life experience was the most effective way for me to learn [Q143] • Talked things out for me when no one else would listen, assessed problems with me so I could overcome them; A lifeline to me [Q122] • Since they've been through the experience, I can have their word on how to cope with what I'm going through. Reassurance. [Q6] • As a professional interior designer, she actually looked over my portfolio and gave me feedback… helped me with my application to art college [I2]
5. Trust, acceptance, love	• Trust developed….can talk about anything…know they will be accepted [Q122] • He helped me to become more confident of who I am. The most effective thing to me is how much of his time was sacrificed for me [Q64] • he has always been there for me [Q23] • trust and honesty [Q112] • Wandering beyond reason for meeting….e.g. beyond tutorial subject [Q131] • She contributed a lot of encouragement that I wasn't able to get at home. She helped me plan my college related issues [Q58] • I talked to my sister about things I wasn't comfortable talking with my parents about. She's a role model for maturity and open-mindedness. [Q172] • We joke around with each other a lot [Q23]
6. Lecturing, giving advice	• Parents instilled morals and guided me to become who I am [Q21] • They always listen FIRST, then give advice that suits my situation [Q107] • They offered me comfort, advice, stability, and examples to follow and be inspired by, for a life-time [Q78] • The advice given was a 'customized' advice that was formulated from and for my specific case and situation (upon listening to my side of the story first) [I3] • Long lectures from grandpa and grandma about experiences they had, they listen to me when I had to talk [Q32] • They tried to keep me on the right track. Taught me what was right and wrong in many situations [Q195] • Life lessons from 'gung gung' (grandpa) were most effective [Q68] • They gave me an outside view; taught me how to see things in the big picture instead of getting caught up in the moment [I7] • Helped me figure out who I am and who I want to be [Q5]

*denotes location of quote, for example, Q121 is from questionnaire #121, and I1 is from Interview #1

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