The interrelationship between identity development and attachment theory has led to a renewed interest in understanding the role of early attachment in later developmental periods. The identity formation process shares certain basic tenets with traditional attachment theory. Both theories place emphasis on branching out and investigating new things. Both indicate that security, exploration and development are influenced by relationship with parents and that behavior is guided by constructions of perceptions of self and the environment. Attachment theory highlights the importance of the secure base provided by the caregiver as facilitating exploration (Ainsworth, 1982) and identity theorists hypothesize that security is also necessary for establishing an identity (Marcia, 1983, Bhusan and Shirali, 1992, Meeus et al., 2002; Mullis et al., 2003). Further, the positive relationship of identity has also been found to be having a bearing influence on adjustment among adolescents (Meeus, Iedema, Helsen, and Vollebergh, 1999; Luyckx, Goossens, Soenens, Beyers, and Vansteenkiste, 2005; Schaffer, 2006; Schwartz, Zamboanga, Weisskirch, and Rodriguez, 2009; Beyers and Seiffge-Krenke, 2010). Similarly, attachment is also positively associated with psychological well being of adolescents (Armsden and Greenberg, 1987; Cotterell, 1992; Patterson, Pryor and Field, 1994; Nada Raja, McGee and Stanton, 1992; Essau, 2004; Shochet, Homel and Montegomery, 2006; Dwairy, 2010). A brief review of these studies related to this relationship has been described in this chapter.

The research literature for the present study has been summarized under the following headings:

1. Identity and Attachment
2. Identity and Adjustment
3. Attachment and Adjustment
4. Identity: Role of Gender and Age
5. Attachment: Role of Gender and Age

2.1 IDENTITY AND ATTACHMENT

In exploring the nature of our identity, the formulation of our identity is negotiated within a framework of interpersonal experiences. Family, in particular, is a powerful influence in the lives of adolescents and young adult’s lives (Mullis et al.,
2003). From a theoretical perspective, theories such as attachment theory, neo-analytical theory, and the theory on individuation in family relationships address the importance of the family and their role in their adolescent/or emerging adult’s identity development as he/she embarks on their quest to adulthood. These theories highlight that parents are expected to have an influence on identity formation due to the relationships with their children, which have been present since birth (Beyers and Goosens, 2008). Attachment theory highlights the need for exploration to start from a secure base, as the child does during toddlerhood. Identity formation and attachment theory share common beliefs in the importance and influence of relationships. Both paradigms consider the significance of the need for exploration, security, and the construction of the self through one’s environment (Beyers and Goosens, 2008; Samuolis et al., 2001). The neo-analytical theory emphasizes how the identity formation process is characterized by autonomy and “emotional separation” from an adolescent’s parents, reflective of the concept of separation-individuation. The individuation from family relationships theory focuses its attention on the importance for parents to play a positive and supportive role to promote the development of their children’s personal identities (Beyers and Goosens, 2008). Parents play a pivotal role in their child’s identity formation and as Marcia (2002) explains when an adolescent finds themselves in distress they often go to seek support from their parents. All three of the theories demonstrate the importance of a supportive relationship with the parents.

A combination of a warm, intimate relationship among parents and adolescents involving emotional support, guidance, intimacy, and secure attachment, as well as encouragement to become autonomous, valuing independence, and individuation from family is associated with healthy identity development and achievement (e.g. Beyers and Goossens, 2008; Blustein, Walbridge, Friedlander, and Palladino, 1991; Quintana and Lapsley, 1990; Tokar, Withrow, Hall, and Moradi, 2003; Beyers, 2008; Crocetti, Rubini, Luyckx, Meeus, 2008; Sabatier, 2008; Smits et al., 2008). Individuals with a stronger sense of who they are and where their lives are headed would be more likely to engage in mature interpersonal relationships and to successfully assume adult roles (Beyers and Seiffge-Krenke, 2010; Côté, 2002). In contrast, individuals who are unclear about their identity would be more likely to experience distress, engage in destructive
behavior, and experience difficulties maintaining healthy relationships with others (Schwartz, Beyers, et al., in press; Schwartz, Klimstra, et al., in press; Schwartz, Mason, et al., 2009). Thus, while investigating the development of an individual’s identity it is important to consider the characteristics of the family and other influential relationships among other sociological factors (Duriez and Soenens, 2006; Mullis et al., 2003; Umana-Taylor, 2006). A careful balance of parents connecting with their children and letting them still as an individual is also very important for identity exploration and identity resolution (Cakir and Aydin, 2005).

Theoretically, Erikson (1968) highlighted the importance of attachment in infancy and the significance of an individual’s attachment in the development of the individual’s identity. Benson et al. (1992) indicated that according to Bowlby (1980), secure attachment leads to mental health and the idea that identity is assisted by security (Marcia, 1966, 1980) suggests that secure attachments facilitates identity development and prevents identity diffusion. Although attachment theory was developed from the study of toddlers, it appears that the tenets of secure attachments are applicable to the adolescent identity formation process of exploration and commitment associated with adolescents. According to attachment theory, the enduring affectional bond between the child and parent provides the child with both safe haven in times of stress as well as a secure base from which to explore and engage in non attachment behaviors (Ainsworth, 1982). Based on perceptions of availability and responsiveness of the caregiver, the child develops an *internal working model of self* and others (Bowlby, 1969/ 1982). Internal working models are believed to contribute to adaptive and maladaptive developmental pathways, thus, early attachment relationships and working models, both influence and are influenced by late development (Bowlby, 1980) and can be applied to understanding adolescent development. Waterman (1982) proposed a model of identity development which references the importance of significant others in providing support for identity commitments. Josselson (1980) emphasizes connectedness with others in relation to identity development, which is congruent with this aspect of Waterman’s model. Greater emotional support has also been associated with identity groups reflecting commitment (achievement and foreclosure) in comparison to identity groups lacking commitment (moratorium and diffusion) (Benson et al., 1992; Campbell et al.,
Family support has been linked with better identity resolution by researchers like Kamptner, 1988; Bhusan and Shirali, 1992. The extent to which a person is secure in attachment relationships plays an important role in the person’s identity development, because secure attachment facilitates exploration. Attachment plays a role in the early stages of identity as well as in later stages. Erikson (1968) states that it is in the initial stage “such consistency, continuity and sameness of experience provide a rudimentary sense of ego identity”.

Attachment theory (Bowlby, 1969, 1988) states that exploration starts from a secure base. Bowlby (1969) proposed that the bond established between infants and their parents serves a protective function and provides children with a sense of security. This sense of security is reflected in greater exploratory behavior and the development of competency (Ainsworth, Blehar, Waters and Wall, 1978; Grossman and Grossman, 1991). The secure base provided by the caregiver allows individuals to investigate in their environment with confidence; knowing that they can return to a haven of security during times of threat. Secure attachments are associated with greater exploration in both toddlers and adolescents (Armsden and Greenberg, 1987; Kenny, 1987). The bond with parents communicates a sense of acceptance to the adolescent which allows him/her the freedom to try on new roles and to begin to make independent choices and decisions while still maintaining a sense of comfort in the knowledge that parents are there to support this behavior. Green and Campbell (2000) also reported that students who were securely attached were interested in exploratory activities.

Researchers investigating the relationship between attachment and adolescent identity development have found empirical evidence of parental involvement in late adolescents’ identity formation. Such studies largely consist of studies that use identity status paradigm (Marcia, 1966), relating identity status scores of achievement, foreclosure, moratorium or diffusion to parent or family variables (e.g. Adams, 1985; Adams et al., 2006; Adams and Jones, 1983; Adams, Ryan and Keeting, 2000; Benson, Harris and Rogers, 1992; Quintana and Lapsley, 1990; Reis and Youniss, 2004; Sartor and Youniss, 2002; Willemsen and Waterman, 1991; Quintana and Lapsley, 1990) or investigating the differences in parent or family variables between adolescents in different identity statuses (e.g. Campbell, Adams and Dobson, 1984; Schultheiss and
Blustein, 1994). Researchers indicate that quality parent-child attachment, or secured attachment, fosters adolescent identity moratorium and achievement because it serves as a secure base for adolescents to explore the environment outside the family and allows them to feel free to seek comfort when under duress (Collins and Laursen, 2004; Zimmermann and Becker-Stoll, 2002; Campbell, Adams, and Dobson, 1984; Jackson, Dunham, and Kidwell, 1990; O’Connor, 1995; Schulteiss and Blustein, 1994)). Conversely, researchers suggest that “too close, involved, and protected parent adolescent relationships” (Kroger, 2003, p. 213) could lead to overly involved parents who encourage identity foreclosure status (Cakir and Aydin, 2005; Kroger, 2003). Finally, with parents who are distant or rejecting, low attachment between parent and adolescent is highly related to diffusion identity status (Kroger, 2003).

If we closely look at these to developmental theories, then the pattern of relationship observed in the identity statuses is associated with attachment styles such as identity diffused and avoidantly attached individuals have common characteristics. Similarly, foreclosure and the anxiously attached individuals, Moratorium and anxiously attached individuals and Identity achieved and securely attached individuals have many characteristics in common. The below mentioned review analysis provides a better picture of the relationship of these attachment styles and identity statuses.

**Identity diffused and avoidantly attached individuals** share many similar characteristics. The diffusion status is typified as having poor parent adolescent relationships (Marcia, 1993). Specifically, identity diffused adolescents describe their parents as uninvolved in their lives, overly permissive, and failing to understand them, they feel rejected and distant from their parents and report the least emotionally attached to their parents, compared to the other identity statuses. According to Bowlby (1988) and others (Collins and Read, 1990; Kobak and Sceery, 1988), avoidantly attached individuals have fewer relationships than other attachment styles. Identity diffused women in Josselson’s study (1988) were found to have fewer relationships than other identity statuses. Indeed, identity diffused and avoidantly attached individuals are very self reliant and prefer to handle life alone (Campbell, Adams and Dobson, 1984; Kobak and Sceery, 1988). Avoidance is found to be positively correlated with identity
diffusion, as avoidant individuals tend to use disengagement strategies and are unlikely to have reached the stage of deciding to explore their identity.

Avoidantly attached individuals were similar to diffused identity individuals in having a difficult times of dealing with the stress in life as adolescents and adults (Gilligan, 1982; Josselson, 1988; Kenny, 1987; Kenny and Donaldson, 1991; Lapsley, Rice and FitzGerald, 1990; Schulteiss and Blustein, 1994). These individuals had fewer resources and support to handle difficult decisions and often had problems. Diffused youth scored lowest on attachment to parents (Campbell, Adams and Dobson, 1984). Secure attachment was also found to relate negatively to diffused identity (Benson, Harris and Rogers, 1992). Individuals who score high on diffused orientation for processing, (which was related to diffused identity) (Berzonsky, 1989) have been found to score low on closeness and dependency dimensions of attachment (Collins and Read, 1990). Schwartz et al. (2008) also found family functioning to be, in part, responsible for changes in identity confusion.

Zimmerman and Becker-Stoll (2002) reported that attachment insecurity was related to identity diffusion. Anxious attached individuals were marginally related to identity diffusion. Wautier and Blume (2004) found insecurely attached women with an uncommitted identity status to experience higher levels of depression than those with a committed identity status. Secure individuals tend to be comfortable with exploration and cope with a sense of mastery (Mikulincer, 1997). Their relationship experiences have taught them that exploration is a positive and necessary part of life. Individuals with an insecure attachment style have been found to be inflexible in processing any information which contradicts their prior beliefs (Mikulincer, 1997), and so are unlikely to have reached identity achievement. Avoidant individuals also experienced insensitive parenting and significant rejection as infants (Ainsworth et al., 1978). These experiences are also likely to make them fearful of exploration and new information as they did not have a secure base from which to explore. Instead of experiencing this fear as adults, they tend to shun information searches and repress curiosity (Mikulincer, 1997). Avoidance, is therefore, expected to positively correlate with identity diffusion, as avoidant individuals tend to use disengagement strategies and is unlikely to have reached the stage of deciding to explore their identity.
Based on the characteristics of the **foreclosure and the anxiously attached individuals**, these two types of individuals have several characteristics in common. Both types of individuals (foreclosed and anxiously attached) value relationships, yet doubt the security of these relationships. These individuals value relationships more than other aspects of their lives. Most of their time is spent in pursuit of others who could provide care and love to them (Collins and Read, 1990; Josselson, 1988; Matteson, 1993). Family relationships are more important than other relationships (Josselson, 1988). Both anxiously attached and foreclosed individuals perceive less support from their peers than securely attached and identity achieved individuals. Foreclosed women seldom formed friendships outside their families and are unable to trust others for support (Josselson, 1988; Matteson, 1993). As important as family relationships were, these individuals doubted the security of others. They were concerned about depending on others (Collins and Read, 1990; Josselson, 1988; Matteson, 1993; Sperling and Berman, 1994). In an effort to pursue and maintain their valuable relationships, the foreclosed and anxiously attached individuals are more likely to conform to social pressures (Josselson, 1988; Kobak and Sceery, 1988; Matteson, 1993). In conforming to social pressures, they often follow the values, beliefs and ideas of significant others. Thus, usually their values and beliefs and ideas originate in childhood. These values would not be challenged due to fear of losing ever-important relationships (Josselson, 1988; Kobak and Sceery, 1988; Matteson, 1993). Both foreclosed identity status and anxiously attached styles seldom explore other options. This fear of losing significant relationships would inhibit exploration of other options in foreclosed, anxiously attached individual’s lives’. Similarly, Ainsworth (1982) and Bowlby (1969, 1982) suggested that being anxiously attached would inhibit exploration. Anxiously attached individuals score moderately high on closeness and depend high on closeness and depend high on anxiety dimensions of attachment (Collins and Read, 1990). Anxious ambivalent individuals have been taught through their attachment relationships that exploration can lead to rejection by their attachment figure. As children, their mothers were more likely to interfere with their game playing and were insensitive to their needs (Ainsworth et al., 1978), giving them a conflicting message about exploration. Consequently, they demonstrate a desire to explore but are fearful
that showing curiosity could jeopardize their relationships. Thus, anxious individuals tend to be more dependent on other people and attempt to meet the expectations of others. Researchers have also suggested that clear boundaries between family members, with adolescents maintaining their own separate sense of self, appear to achieve more mature commitments (Anderson and Fleming, 1986; Fullinwider-Bush and Jacobvitz, 1993; Perosa, Perosa, and Tam, 2002). On the other hand, adolescents in the identity foreclosure status, a relatively mature status in that some form of commitment is embraced, have tendencies to over-identify with their parents (Adams, Dyk, and Bennion, 1987; Coûte´ and Levine, 1983). Foreclosed adolescents reported feeling guilty when parents have disagreements, but also report loving and affectionate parents who tend to be controlling and critical. Adolescents in the identity foreclosure status, a relatively mature status in that some form of commitment is embraced, have tendencies to over-identify with their parents (Adams, Dyk, and Bennion, 1987; Coûte´ and Levine, 1983). Foreclosed adolescents report feelings of guilt when parents have disagreements. They also report loving and affectionate parents who tend to be controlling and critical (Adams and Jones, 1983; Donovan, 1975).

**Moratorium individuals and anxiously attached individuals** also share many characteristics in common like foreclosed individuals have with anxiously attached people. Moratorium status is characterized as having bivalent family relationships (Marcia, 1993) as well as loving, supportive parents who encourage independence (Adams, 1985; Adams and Jones, 1983; Campbell et al., 1984; Grotevant and Cooper, 1985). The main difference between the attachment style of moratorium and foreclosed individuals is the amount of anxiety felt. Like the foreclosed and anxiously attached individuals, moratorium individuals are anxious about significant relationships. They are somewhat concerned about others abandoning them (Collins and Read, 1990; Josselson, 1988). This sense of possible abandonment results in a single minded focus on relationships. Relationships determine what options they will explore because moratorium individuals are more interested in relationships than in exploring (Josselson, 1988). These individuals are less anxious than the foreclosed and are able to explore options, unlike the foreclosed individuals. Although they are able to explore options, the moratorium individuals lack the trust and dependence of significant
relationships to commit to their options similar to the anxiously attached individuals (Collins and Read, 1990; Josselson, 1988). Unlike the foreclosed individuals who have never changed their ideas or beliefs, moratorium individuals are searching for the correct way to make decisions. They are looking for the correct values, ideas and beliefs by exploring. Similar to anxiously attached individuals, moratorium individuals are more likely to conform to society than the diffused or identity achieved individuals (Collins and Read, 1990; Josselson, 1988).

**Identity achieved and securely attached individuals** have several characteristics in common. Research clearly shows that nurturing parents promote identity exploration and commitment. A combination of a warm, intimate relationship among parents and adolescents involving emotional support, guidance, intimacy, and secure attachment, as well as encouragement to become autonomous, valuing independence, and individuation from family is associated with healthy identity development and achievement (Beyers and Goossens, 2008; Blustein, Walbridge, Friedlander, and Palladino, 1991; Quintana and Lapsley, 1990; Tokar, Withrow, Hall, and Moradi, 2003).

Adolescents in the achieved status have reported parents who were warm, supportive, and consistently enforced the rules while non-achieved adolescents had restrictive or permissive parents (Douvan and Adelson, 1966). Sartor and Youniss (2002) reported that achieved adolescents were associated with parental knowledge of adolescent daily activities and emotional support from their parents.

Supportive parenting predicts the emergence of successful identity formation (Luyckx et al., 2007). Samuolis et al. (2001) found that secure attachments appeared to facilitate identity development and prevent identity diffusion in females. Secure attachments are proposed to promote the development of identity by encouraging the exploration of identity alternatives. In adolescents, communication was the most important aspect, with parental trust a predictor of school commitment, while maternal trust a predictor of school exploration (Meeus et al., 2002). In terms of Marcia’s ego identity statuses, Kennedy (1999) reported that secure individuals had higher identity achievement scores than fearful (anxious) individuals in a study of first year college students. They were also found to have low moratorium scores than preoccupied
(anxious and avoidant) individuals and lower identity diffusion than fearful and preoccupied individuals.

Positive adolescent–parent relationships have been found to foster identity commitments (Meeus, Oosterwegel, Vollebergh, 2002; Samuolis, Layburn, and Schiaffino, 2001). Moreover, adolescents who strongly identified with their commitments reported trusting their parents more and having a good relationship with them (Crocetti, Rubini, and Meeus, 2008). Parents, who lack autonomy, support, and encouragement, have adolescents with lower commitment and exploration (Fullinwider-Bush and Jacobvitz, 1993). Conversely, the experience of parental support and attachment were found to be related to greater achievement and less diffusion in identity (Campbell, Adams, and Dobson, 1984; Jackson, Dunham, and Kidwell, 1990; O’Connor, 1995; Schulteiss and Blustein, 1994). Adolescents in the achieved status have reported parents who were warm, supportive, and consistently enforced the rules while non-achieved adolescents had restrictive or permissive parents (Douvan and Adelson, 1966). Sartor and Youniss (2002) reported that achieved adolescents were associated with parental knowledge of adolescent daily activities and emotional support from their parents. First, they perceive more social support than others do and have a balance in life. Relationships are important to these individuals, yet they feel a sense of security and trust in others. Identity-achieved and securely attached individuals perceived more social support than other identity statuses and attachment styles (Kobak and Sceery, 1988; Pulkkinen and Ronka, 1994; Josselson, 1988). These individuals feel secure and confident in both self and others (Bowlby, 1988; Kenny, 1987; Lapsley, Rice and FitzGerald, 1990). Due to the security and trust of others, these individuals are able to balance all aspects of their lives (Bartholomew, 1990; Josselson, 1988; Pulkkinen and Ronka, 1994). Both have a secure base to explore options. With the strong internal external resources of self and others, identity-achieved and securely attached individuals are able to explore options within their lives (Bowlby, 1988; Kenny, 1987; Lapsley, Rice and FitzGerald, 1990). With his secure base, identity-achieved individuals are able to explore various identities had secure bases and were able to explore more options.
They are less likely than the other identity statuses and attachment styles are to conform to society and conform on their own terms. After exploration, these individuals commit to decisions based on their confidence in themselves as well as the support of other (Bowlby, 1988; Kenny, 1987; Lapsley, Rice and FitzGerald, 1990). The identity achieved and securely attached individuals are able to choose their own beliefs, identity and life plans (Collins and Read, 1990; Josselson, 1988; Matteson, 1993). Collins and read (1990) found that the securely attached individuals were more willing to stand up for their beliefs. In multiple studies, both securely attached and identity achieved individuals were less likely to conform and more likely to commit to their own values than other identity status and attachment styles were (Ainsworth, 1982; Bartholomew, 1990; Bartholomew and Horowitz, 1991; Bowlby, 1969, 1982; Josselson, 1988; Kobak and Sceery, 1988; Matteson, 1993). Both identity achieved and securely attached individuals have secure bases of parents and significant others. Several studies have found warm and supportive parents associated to identity achieved and securely attached individuals (Adams and Jones, 1983; Bowlby, 1969; Collins and Read, 1990; Cooper et al., 1983; Enright et al., 1980).

The relational issues with parents are counterpointed by the emphasis of almost all of the adolescents on the importance of friendships. “Parents first, and peers second, appear to be the contexts for primary influence for early adolescent identity development although all contexts contribute influential socialization experiences” (Kroger, 2000, p. 51).

Erikson (1968) noted that peers provide an important source of self validation during a time of self uncertainty. Seeing all that is good or bad about the self reflected in the eyes of one’s friends provides an objective source of validation of one’s own subjective reality. This process has been described by other theorists in their descriptions of the looking-glass-self (Cooley, 1922, 1998), mirroring (Kohut, 1977), or eye to eye validation. Erikson (1968) noted that peers serve an important role for those who are in process of individuating from parents and developing a sense of identity. Erikson (1968) describes the significance of the adolescents’ peer group in several ways. First, they provide feedback about others’ perceptions of themselves. Erikson (1968) noted that the adolescents’ preoccupation with how they appear to others is
related to their need to develop a subjective sense of self sameness and continuity. In order for the formation of identity to proceed, the adolescent must feel that their friends accept them for whom they think they are. At another level, peer group provides an important source of social support as the adolescent begins to individuate from the family and begins to express their own autonomy. Newman and Newman (1976), expanding on Erikson’s notions, suggest that the central crisis of early to middle adolescence is “group identity versus isolation”. They suggest that being accepted by a peer group is essential in the formation of an identity; however, this occurs only if the peer group meets the social needs of the adolescent and provides an environment of belonging (Newman and Newman, 1976).

Meeus and Dekovic (1995) found that perception of social support from intimate friends was positively associated with both exploration and commitment in the relational domain and with exploration in the school and occupational domains. In fact, the results suggest that social support from peers is more strongly related to development of identity in the relational domain rather than social support from parents. Likewise, Flum (1994) found that having a high dependency on peers, coupled with an asocial orientation and a lack of ability to withstand peer pressure predicted a diffusion style of identity formation. A diffuse style is characterized by lack of feeling of control over one’s future and an over dependence on self and peers to the exclusion of friends in making future decisions. Such individuals are not provided the necessary environment by their peer group for the successful individuation from the family (Flum, 1994).

As adolescents become more independent from their parents, peer group starts becoming more influential (Bednar and Fisher, 2003). Adolescent peer relationships play an important role in fostering positive adolescent psychosocial development. Peer group contributes to identity formation by serving as a guide to establish a sense of self that is separate from their parents or family (Brown, 1990). Peers frequently provide different perspectives to stimulate independent thought through expressed differences while maintaining a balance by establishing their own beliefs and principles (Kerpelman and Pittman, 2001; Parker, Rubin, Earth, Wojlawowicz, and Buskirk, 2006) which is also essential for identity achievement. Adolescent peer relationships
have an essential function to the identity formation process of adolescents based on Erikson’s notion (Parker et al., 2006) because peer relationships provide possible identities and subsequent consequences, which are more likely to be age related, helping adolescents to establish their personal identity (Moore and Boldero, 1991). These relationships also help form one’s identity by “forming cliques and by stereotyping themselves, their ideals, and their enemies” because of the fear of role confusion (Erikson, 1963, p. 262). Furthermore, peers may serve as a secure base for adolescents to explore and try out new activities that contribute to identity formation. In sum, maintaining quality peer relationships may facilitate the adolescent identity exploration process for possible identities in terms of what they believe and how they act based on their beliefs and values.

From a Freudian perspective, the transition of attachment ties from parents toward peers is seen as essential to individual independence and autonomy. In addition, from a social-learning perspective, peers can function as role models in terms of autonomy achievement to encourage the adolescents to become more autonomous (Zimmer-Gembeck and Collins, 2003). Likewise, from a cognitive stimulus aspect, peers provide rich decision-making information for adolescents that can help adolescents gain more autonomy (Bednar and Fisher, 2003).

There are many researches done on the relationship between attachment and processes of commitment and exploration. Relationships aid identity development. People are who they are because they have unique relationships with others; and thus identity is a psychosocial characteristic (Marcia, 1983). Marcia stated that it is impossible to achieve a sense of identity without support for meaningful exploration. Based on identity research, Marcia (1983) felt confident saying that: “no attachment, no meaningful exploration and experimentation; no meaningful exploration and experimentation, no subsequent commitment; no commitment, no identity” (p. 221). Marcia (1989) has claimed that the most useful place to start (when desiring to promote identity development) is not with identity statuses but with the process that underlies them; exploration and commitment. In order to make commitments, people must feel that they will have support even if they let go of some alternatives. Support can come from the family, social situations, or peers; ideally it will come from all three areas.
Others, however, have found that both identity achieved and foreclosed individuals are high in secure attachment, and that fearful attachment predominates among moratorium and identity diffused individuals (MacKinnon and Marcia, 2002). One study found a positive correlation between dismissing attachment and identity diffusion (Zimmermann and Becker-Stroll, 2002) while another found fearful attachment to be negatively correlated with identity achievement and positively correlated with identity diffusion (Hoegh and Bourgeois, 2002).

In attachment theory, commitment is an important dimension of a satisfactory relationship. Some studies indicate that people with a secure attachment style have more stable relationships (Duemmler and Kobak, 2001; Simpson, 1990; Faber et al., 2003; Hoegh and Bourgeois, 2002). Individuals with a dismissing attachment style avoid commitment in relationships (Mikulincer and Shaver, 2005). Two forms of identity commitment during late adolescence and adulthood have been identified in Marcia’s (1966, 1980) work: the ability to make commitments following identity exploration (identity achievement) and the ability to make commitments without exploration (foreclosure). It is likely that different adolescent attachment patterns are associated with each identity commitment type. As described in the previous section, commitment preceded by identity exploration (identity achievement) as well as identity exploration itself (moratorium status) have been linked with secure attachment patterns during late adolescent and adult development (Campbell et al., 1984; Grotevant and Cooper, 1986; Marcia, 1988, 1993). By contrast, commitment without identity exploration (foreclosure) has been associated with the combination of emotional attachment to parents and parental discouragement of exploration, independence strivings, and expression of differences (Campbell et al., 1984; Grotevant and Cooper, 1986). Strong fear of abandonment and high nurturance needs on the part of the adolescent (insecure attachment patterns) has also been associated with this foreclosed identity commitment position (Kroger, 1985, 1995). The inability to commit (in identity terms identity diffusion), has been linked with failure to form strong attachment bonds with parents through parental neglect or unavailability (Marcia, 1988, 1993) as well as parental inability to support adolescent individuality (Campbell et al., 1984).
Positive adolescent–parent relationships, thus, have been found to foster identity commitments (Meeus, Oosterwegel, Vollebergh, 2002; Samuolis, Layburn, and Schiaffino, 2001). Moreover, adolescents who strongly identified with their commitments reported trusting their parents more and having a good relationship with them (Crocetti, Rubini, and Meeus, 2008). Parents, who lack autonomy, support, and encouragement, have adolescents with lower commitment and exploration (Fullinwider-Bush and Jacobvitz, 1993).

Benson, Harris and Rogers (1992) studied attachment as it is related to identity formation. Instead of categorizing participants into one of the four identity statuses, the study used the scores on two identity dimensions. The results suggested that attachment contributes to the development of commitment to aspects of identity. Blustein et al. (1991) concluded that those who experience a moderate degree of attachment with parents in conjunction with a relationship of high conflictual independence also show an increased commitment to career choices. Thus, vocational commitment is associated with an absence of guilt, mistrust, anxiety or resentment in relation to parents. Similar relationships among the variables were found with males in relation to career commitment. Females with moderate attachment also showed less of a tendency to foreclose on a career choice without exploration.

An investigation specifically the relationship of parental relatedness variables with identity development was conducted by Frank, Pirsch and Wright (1990). The “relatedness” variable assessed the degree to which adolescents felt emotionally close and supported by parents. This study concluded that relatedness to parents was positively correlated with identity statuses of foreclosure and achievement (both reflective of identity commitments). This finding fits with the conceptualization that the foreclosure status (a status descriptive of lack of exploration) is associated with adopting the beliefs and behaviors of others without branching out on one’s own.

Other investigators have evaluated connectedness and facilitation of autonomy in relation to identity has been through family communication. In a study of Himalayan males, Bhusan and Shirali (1992) found differences in family communication between those who were identified as having come to an agreement on issues of identity versus those who had not. The findings of Bhusan and Shirali (1992) study suggest that
participants with more developed identified (as indicated by increased commitment) are more likely to have families that are balanced in the degree of cohesion and adaptability. Whereas Bhusan and Shirali (1992) examined family communication as related to identity commitment, Grotevant and Cooper (1985) using the families of high school seniors as their subjects studied the relationship between family communication and identity exploration. Communication variables were found to be associated with both male and female identity exploration. For male adolescents, greater identity exploration was positively correlated with ability to directly express disagreements with their fathers. Female adolescents presented a different communication picture. Greater identity exploration in daughters was related to having mothers and fathers who frequently disagreed with them. Grotevant and Cooper (1985) suggest that adolescents who have explored their identities may be freer to communicate with their families. They also suggest that family communication characterized by acknowledgement of the position of others, yet allowing expression of self, may facilitate adolescents’ confidence in exploring. This study provides information on how family communication can be linked with specific identity formation process—exploration.

Fullwinder-Bush and Jacobvitz (1993) were interested in how parent-child boundaries affected the degree of identity exploration and commitment. They proposed that problems with boundaries with mothers would limit exploration and create a premature identity commitment. Boundary problem with fathers were believed to create problems in engaging in commitment and exploration. They found that women from close families that encouraged individuation were engaged in greater identity exploration. Adolescents who reported being over involved with either parent were less likely to engage in an active explorative style of identity.

Kroger (1985) studied the relationship of identity status and the nature of parental attachment. The results revealed a positive relationship between secure attachment and identity status of achievement. A continued relationship with parents in which the adolescent can cope with separateness while maintaining a relationship was linked with an identity characterized by commitment and exploration. Campbell et al. (1984) also reported that psychological foundation provided by a healthy sense of
connectedness is conducive to exploration, resulting in making commitments in one’s life.

Overall, it can be suggested that varying degrees of exploration are seen in the different attachment styles of children. Securely and avoidantly attached ones can be observed exploring their environment and anxiously attached children explore little. In adolescence, identity exploration is inter- and intra-personal and the attachment exploration is inter-personal (Benson, Harris and Rogers, 1992). The security and trust of others help to form the individual identity (Marcia, 1983). Commitment within attachment is also similar to commitment in identity development. Securely attached individuals have larger social support systems and are more committed to these relationships, in that they give and receive from these relationships (Collins and Read, 1990; Hazan and Shaver, 1987, 1994; Kobak and Sceery, 1988). Anxiously attached individuals seek out others, yet are desperate to maintain these relationships. Avoidantly attached ones find few relationships to commit within. Studies have found that secure attachment to mothers is positively associated to identity commitment (Benson, Harris and Rogers, 1992). Thus, in both the development of identity and attachment, security and trust are necessary for healthy development, exploration and commitment.

Adolescents are faced with tasks of establishing an identity and renegotiating relationships with caregivers. The renewed interest in understanding the confluence between identity development and attachment relationships in adolescence has sparked numerous research efforts to further understand those processes as well as gender differences existing in identity and attachment. Some studies have revealed that attachment to parents mediates identity development (Benson et al., 1992; Lapsley et al., 1990), while other studies have found that attachment to parents may hinder normative exploration and commitment processes involved in identity development (Fullwinder-Bush and Jacobvitz, 1993; Schultheiss and Blustein, 1994). Furthermore, the developmental trends have been potentially obscured by the use of overall identity categories (Meeus, 1996) and the failure to assess attachment to mother and attachment to father separately in some studies.

Schultheiss and Blustein (1994) reported that for women, parental attachment may play a more important role in the identity formation process than for men. In
contrast, Quintana and Lapsley (1990) had found that attachment variables and
differentiation variables were positively related for both men and women and that it was
adjustment on individuation indices that predicted advanced identity development.
Lapsley et al. (1990) also reported similarities between men and women attachment-
identity processes. Both men and women’s attachment to parents and peers mediates
personal identity, and parental attachment variables significantly predict social identity
(Lapsley et al., 1990). Both men and women’s attachment to their mothers was
significantly higher than attachment to their fathers (Benson et al., 1992). Yet, in regard
to the relationship between attachment and identity development, an examination of
gender by mother attachment and gender by father attachment failed to show any
significant differences between men and women (Benson et al., 1992). Thus, the
research literature on women’s and men’s attachment relationship with each parent as
they pertain to identity development presents a mixed picture. Gender differences have
emerged in the studies of Benson, Harris, and Rogers, 1992; Samuolis, Layburn, and
Schiaffino, 2001 stating secure attachments to mothers predicts stronger identity
achievement for females, though no relationships were found between attachment to
fathers and identity status.

Whether adolescent-parent attachment relationships differentially affect men
and women’s exploration and commitment processes in identity formation has also
received researchers’ attention and has been studied. Research exploring gender
differences in identity-related domains have suggested that women’s attachment
relationships with parents influence commitment and exploration processes involved in
identity formation. Fullwinder-Bush and Jacobvitz (1993) found that women from
families characterized by closeness and encouragement towards autonomy showed high
levels of exploration in some identity domains, and that some women still tended to
commit prematurely to particular identity areas without considering alternatives.
Women who reported close relationships with their mothers characterized by boundary
dissolution engaged in less identity exploration in the areas of dating and relationships
(Fullwinder-Bush and Jacobvitz, 1993). Similarly, these authors found that overly close
father-daughter relationships correlated with lower exploration in the areas of career.
Males who were found to be high scoring on identity exploration appeared to have
fathers whose interactions were encouraging of and tolerant of assertiveness, whereas for similarly high identity scoring females, father interactions were more apt to include disagreements (Grotevant and Cooper, 1985). For females, mother interaction and father interaction appear to be associated with female identity exploration, whereas only for interactions with fathers, was there an association with identity exploration for males (Grotevant and Cooper, 1985).

Researchers have attempted to identify associations between attachment relationships and overall identity category statuses. Schultheiss and Blustein (1994) found that women’s attachment to both parents is a significant predictor of ego identity status. These authors reported that for some women, attachment to mother and father was associated with foreclosure status, suggesting that closeness to parents may lead to premature commitment. Other studies suggest that attachment relationships are beneficial for identity development status. Attachment to mothers predicted higher levels of identity achievement and lower levels of identity moratorium and identity diffusion for both men and women (Benson et al., 1992). For both men and women, attachment to father predicted higher levels of identity foreclosure. Females were found to be higher than males on identity achievement and lower than males on identity diffusion (Benson et al., 1992). Particular development trends in exploration and commitment processes in overall identity formation have possibly been obscured because of the majority of studies reliance’ on overall identity status on particular identity-related domains as a measure of identity development (Meeus, 1996).

The majority of studies indicate that attachment is more important for women than for men in adolescence, the particular developmental trends in identity development for men and women are less clear. The extent to which attachment to parents facilitate identity development in adolescents is possibly confounded by the experiencing of different attachment relationships with mother and father. Although some studies did measure attachment to mother and father separately, few related such attachment relationships to identity development. Furthermore, most studies relied on overall identity categories based on Marcia’s conceptualization of identity development. These categories are composed of different combinations of levels of exploration and
commitment. Utilization of overall identity status categories may obscure trends in exploration and commitment in identity formation as they relate to parental attachment.

Summarizing, it can be suggested that identity and attachment are two interrelated developmental theories. The review of literature on these two aspects has pointed out the interrelationship of each attachment style with that of identity statuses. Further, the role of peer attachment in an individual’s process of identity formation was highlighted. Towards the end of the review analysis, the gender differences in the attachment and identity formation were discussed revealing the differences in the attachment and identity processes of males and females.

2.2 IDENTITY AND ADJUSTMENT

Identity development is a perplexing period of time, involving a period of identity crisis, in which the individual experiences change, an increase in confusion and a decrease in self-esteem (Schaffer, 2006). Erikson (1950, 1968) defined identity as an integrative intrapsychic structure, where by its successful construction is an expression of mental vitality and is experienced as a sense of adjustment and psychological well being. Several researches like Archer, 1989; Brandtstädter and Baltes-Götz, 1990; Pulkkinen and Ronka, 1994 agree on the basis of literature review and empirical findings that adaptive capacities are associated with a clear sense of identity and personal control over development. Careful planning and elaboration of an individual’s developmental paths is critical for personal development and the attainment of a high quality of life. (Brandtstädter, 2002)

Researchers have tried to relate people’s growth with well-being. In a study by Baver and McAdams (2004), participants whose narratives of major life goals emphasized conceptual exploration were especially likely to have higher levels of maturity whereas those whose goals emphasized intrinsic interest were especially likely to have high levels of well-being.

With regard to anxiety and depression, a number of studies have shown that individuals with a strong sense of identity (i.e., achieved) have been found to report lower levels of a variety of debilitating emotional states (e.g. Constantinople, 1970; Howard and Kubis, 1964; Stark and Traxler, 1974). With respect to specific identity
statuses, individuals in the moratorium status consistently report the highest level of anxiety, while those in the committed identity status, particularly, foreclosure report the least (Waterman, 1992). With regard to interpersonal and ideological identity domains, Johanson (1983) found that in the areas of religion and occupation, moratorium students felt significantly more depression than achieved students and in the areas related to sex, moratorium students reported significantly more depression than achieved and foreclosed students. Bishop et al. (1997) found that identity diffused and foreclosed individuals were relatively high consumers of beer, while moratorium individuals were low consumers and identity achieved individuals reported an intermediate level of beer consumption. These findings support the proposition that individuals who are lower on ego identity scale are likely to use drug/alcohol engagement as a coping strategy.

College males high in identity reported greater self ideal similarity with self than did those low in identity, correspondingly. With regard to self esteem, Rosenfeld (1972) found that identity diffuse high school boys had a greater discrepancy between their self concept and their concept of how others perceived them than did boys who were attaining an identity (Bunt, 1968). According to Brewer (1973), identity achievements and moratoriums obtained a higher self esteem scores than did foreclosures and identity diffusions. Basak and Ghosh (2008) reported in their study that those having high identity achievement status have high self-esteem especially in the areas of occupation and ideological belief for religion. On the other hand, adolescents who are in crisis and not made commitment have low self esteem. It was concluded from this study that ego-identity status enhances one’s positive self-image. Matteson (1974) reported that foreclosures and identity diffusions had lower autonomy scores than did identity achievement and moratoriums. Waterman, Buebel and Waterman (1970) investigating differences among the identity statuses on locus of control found foreclosure and identity diffusions are more externally oriented and identity achievements and moratoriums more internally oriented. Andrews (1973) reported an orientation pattern of independence and active achievement for college males high in identity, while those low in identity, were more passive and affective. Waterman and Waterman (1974) reported that foreclosures and identity diffusions were more impulsive, responded
quickly and made more errors and those identity achievements and moratoriums were more reflective.

Identity formation and adjustment are considered to be parallel and mutually influential growth processes in emerging adulthood (Grotevant, 1987; Schwartz, 2005). In a number of cross-sectional and longitudinal studies, these four statuses have been associated with distinct sets of personality, adjustment, and cognitive variables (Kroger and Marcia, 2011). Achievement has been related to the balanced thinking (Krettenauer, 2005) and mature interpersonal relationships (Beyers and Seiffge-Krenke, 2010). Moratorium has been associated with both with openness to experience (Luyckx, Goossens, Soenens, Beyers, and Vansteenkiste, 2005) but also with anxiety, depression, and low self-worth (Meeus, Iedema, Helsen, and Vollebergh, 1999; Schwartz, Zamboanga, Weisskirch, and Rodriguez, 2009). Foreclosure has been associated with rigidity and authoritarianism (Marcia, 1967) but with high degrees of self-esteem, life satisfaction, and psychological well-being (Schwartz, Beyers, et al., in press). Diffusion has been linked with the poorest psychosocial functioning, including lack of meaning and direction (Waterman, 2007), drug and alcohol abuse (Bishop, Weisgram, Holleque, Lund, and Wheeler-Anderson, 2005), and social and academic maladjustment (Luyckx, Goossens, Soenens, Beyers, and Vansteenkiste, 2005). Schwartz, Mason, Pantin, and Szapocznik (2008, 2009) found that increases in identity confusion over time were associated with heightened risk for initiating use of cigarettes, alcohol, marijuana, and hard drugs, as well as for initiating unprotected sexual activity. The detailed description of the research literature of the identity statuses and adjustment indices has been discussed in the forthcoming discussion.

Achievement of a stable identity has been found to be linked to few negative emotions suggesting identity achievement to be healthier status. Across a series of studies, individuals with a strong sense of identity report lower levels of debilitating emotional states and stress (Constantinople, 1970; Oshman and Manoseintz, 1974; Reimanis, 1974; Wessman and Ricks, 1966; Whitbourne, 1986; Phinney, 1989), Goldman et al. (2002) and Berzonsky et al. (2003) found identity achievement to be a significant correlate of well-being. Identity achieved individuals have also been found to be lower
on neuroticism (Clancy and Dollinger, 1993) and possessing stable personality traits (Diener, 1996), high on decision making abilities (Bacanli, 2012).

Identity achieved individuals appear stable, capable of dealing with shifting environmental demands, and can establish and pursue realistic goals (Orlofsky et al., 1973). Adams et al. (1985) noted that achievement identity men (compared to lower status men) were more relaxed, less prone to worry, experienced less social anxiety, demonstrated greater maturity in interpersonal functioning, and did not tend to exhibit extremes of either extraversion or introversion. Achievement identity women appear more adept (compared to lower status women) at social-cognitive functions and analyzing interpersonal social information; Adams et al., 1985, Marcia et al., 1993 studied that identity achieved individuals perform well under stress, reason at high levels of moral development, are relatively resistant to self esteem manipulation and appear to have internalized self-regulatory processes. In comparison to individuals who have not resolved their identity issues, individuals who have made commitments in the achieved and foreclosed identities report higher levels of psychological well-being, adjustment, emotional stability (Crocetti, Rubini, and Meeus, 2008; Kroger, 2007; Luyckx, Goossens, Soenens, Beyers, and Vansteenkiste, 2005; Meeus, 1996; Meeus, Iedema, Helsen, and Vollebergh, 1999; O'Connor, 1995) Thus, the research points out that there is a positive relationship of identity achievement and psychological well-being.

Research on moratorium status shows the negative emotions and unhealthy psychological outcomes associated with it. Podd, Marcia, and Rubin (1970) found behavioral evidence for the hypothesized ambivalence of moratoriums. Those Individuals were less co-operative with authorities than with peers, and they reflect needs for both rebellion and conformity. Moratorium individuals have been found to be high on anxiety (Marcia, 1967; Mahler, 1969) and low on self esteem. Waterman and Waterman (1970) reported that moratorium individuals were most dissatisfied with their college experience (Cramer, 1997) and low on overall levels of well being (Meeus et al; 1999). Marcia et al. (1993) state that individuals in moratorium often appear intense, sometimes active and sometimes internally preoccupied. It has been found that they may alternate between rebellion and conformity. Researchers have found that women
going through an identity conflict phase are more involved in problem drinking (Kornosky and Wilsanck, 1982; Parker, 1975; Scida and Vannicelli, 1979; Wilsnack and Wilsnack, 1975; Phinney (1989) studied that people experience the most stress when they are undergoing changes coincident with a situationally variable identity, and that variability in identity is not conducive to psychological well being. Research suggests that moratorium status can be painful, unrewarding and a maladaptive experience if no social support is available for decision making while undergoing the crisis. It has been found that adolescents who grow up in families that inhibit individuation are more likely to report feeling anxious and depressed (Allen et al., 1994; Pavlidis and McCauley, 1995). Adolescents in the moratorium status show the highest level of conflict over issues of authority, score the highest on measures of anxiety, are the least rigid and are 3, the least authoritarian (Steinberg, 2002). Meeus, Iedema, Helsen, and Vollebergh (1999) concluded that the moratorium status was associated with low levels of psychological well-being. Additionally, individuals in the moratorium status report elevated levels of depression (Luyckx et al., 2008; Meeus, 1996) and anxiety (Marcia 1967; Oshman and Manosevitz, 1974; Sterling and Van Horn, 1989).

Although majority of researchers point out towards moratorium as a status characterized by low well-being, researchers point out towards moratorium as a status characterized by low well-being, researchers have also found moratorium individuals to be most insightful and to be the highest on mental health (Raphael et al., 1987). Thus, the research points towards no specific direction regarding the well-being of adolescents in the moratorium status.

Research on the well-being of individuals in foreclosure status again shows mixed results. Some researchers report foreclosure to be associated with positive mental health. Certain researchers have found foreclosure to be an adaptive status for women. Waterman (1988) pointed out that identity foreclosure could be viewed as adaptive or maladaptive depending on the individual’s goals, values and beliefs. Foreclosure status have been found to be characterized by high mental health, less anxiety and opposition to drug use (Marcia, 1980), high self esteem (Cramer, 1997), self satisfaction (Makros and McCabe, 2001) and increased well-being (Berzonsky et al., 2003). Toder and
Marcia (1973) have reported that foreclosure is a stable and adaptive status for women. Orlofsky et al. (1973) studied that foreclosed individuals tend to be the most authoritarian and rigid in their views. They appear to operate rather well within the bounds of their familiar circumstances, but they quickly find themselves at a loss if faced with an unfamiliar challenge. Individuals who are classified in the foreclosure status are the most authoritarian, most prejudiced, have the highest need for social approval, possess the lowest level of autonomy and display the greatest closeness to parents (Steinberg, 2002). Marcia (1980) found that foreclosure women scored lower than moratorium or identity achievement women on measures of ego strength and that higher status men demonstrated greater psychological maturity compared to lower status men. Foreclosure has not been considered a healthy and adaptive status by many researchers like Wires et al., 1994; Josselson (1973). They also found that foreclosure women show evidence of a fairly infantile ego organization and fewer deeper signs of psychological health.

Review of literature suggests that the identity diffusion status is associated with many indices of poor psychological health and lower well-being. Various debilitating emotions have been found to be linked with identity diffusion. Identity diffused individuals have been reported to be very anxious (Bronson, 1959), emotionally disturbed (Marcia, 1967), confused and doubtful (Archer and Waterman, 1990; Meeus, 1996), most neurotic (Wallace-Broschious et al., 1994) indecisive (Bacanli, 2012). Research on diffused status has also shown problems with psychological well being (Archer, 2008; Jones and Hartmann, 1988; Jones, 1992, 1994; Marcia, Waterman, Matteson, Archer and Orlofsky, 1993; Waterman, 1999; White, 2000). In fact, the diffused identity group is often seen as the most pathological (Hamilton, 1996). Vleioras and Bosma (2005) report that these findings lead one to believe that in terms of well-being, it is more preferable to have identity commitments, rather than not having any at all. Marcia et al. (1993) found that individuals with diffused identities have the most difficulty thinking under stress, they are the most susceptible to self-esteem manipulation, and they have the lowest level of development of moral thought. Additionally, their interpersonal relationships tend to be sparse or extraordinary shallow. Identity diffused individuals are characterized by aimless drifting or by
personal malleability and suggestibility (Orlofsky, Marcia and lesser, 1973) On measures of social behavior, individuals with a diffuse identity status scored the lowest of the identity statuses for conforming behavior to gain from achievement and highest for being influenced by peer pressure (Adams, Ryan, Hoffman, Dobson and Niclson, 1985). Diffused individuals may be seen as less developed in such personality dimensions as self-esteem, locus of control and moral reasoning (Adams and Shea, 1979). Identity confusion is associated with low well-being and with symptoms of anxiety and depression (Schwartz, Zamboanga, Weisskirch, and Rodriguez, 2009).

Subjects high on identity diffusion have been found to be high on self esteem related problems and also marked by problems in their functioning as members of the society. Identity diffusion is related to fragmented, loosely organized self-structure (Berzonsky et al., 1990), low self esteem (Bunt, 1968; Gruen, 1960; Marcia, 1967; Cramer, 1997), alienation and withdrawal (Sandhu and Tung, 2003; Archer and Waterman, 1990), problems in maintaining intimate social relations and other interpersonal problems (Campbell et al., 1984; Adams et al., 1992; Fulton, 1997; Wallace-Broscious et al., 1994; Adams et al., 1994). Behavioral difficulties have also been observed in identity diffused individuals.

Research points out that identity diffusion has been associated with a wide range of psychopathology ranging from depression to suicidal tendencies. However, it is still unclear whether identity diffusion can be considered a pre borderline syndrome. According to Marcia (1964), members of the identity diffusion status range from the playboy type who shuns responsibility and seeks immediate gratification to the schizoid type with disorganized thought processes. It has been reported that identity diffusion is associated with suicidal tendencies in adolescents (Coleman, 1964; Ball and Chandler, 1989; Bar-Joseph and Tzuriel, 1990). Identity disturbances have often been associated to be linked to various forms of psychopathology (American Psychiatric Association, 1987; Materson, 1988; Josselson, 1987; Taylor and Goritsas, 1994). Butman and Arp (1990) proposed that important dimension of adolescent depression are linked to unresolved struggles of identity formation process, Kotesky et al. (1991) also found that identity has inverse relationship with depression. Many researchers have reported adolescents in identity diffusion status to be drug abusers (Marcia, 1976, 1980; Jones et
al., 1992). Christopherson et al. (1988) concluded that adolescents use psychoactive substances for reasons that vary according to identity status. Individuals who remain diffused beyond early or middle adolescence are prone to drug abuse, risky sexual behavior and academic failure (Jones and Hartmann, 1988; Jones, 1992, 1994; White, 2000). Cassell (1990) reports that when the individual fails to achieve identity, a void emerges that often cause persons to turn to cigarettes and drugs. In a similar vein, Jones et al. (1992) reported that identity processing orientations pay a role in alcohol abuse. White and Jones (1996) found that individuals with a diffuse/avoidant style begin drinking earlier. Identity diffusion or a lack of healthy identity has been found to be linked with various forms of antisocial behavior; especially delinquency do so, in many instances, because they are unable to resolve key psychosocial tasks: in particular they lack confidence in their occupational skills, which leads to a poorly formed sense of identity. This has been supported by researchers like Ryan and La Voie (1986), White and Jones (1996).

Research has shown that adolescents in a state of identity diffusion display the greatest level of psychological and interpersonal problems and this status may lead to adolescent’s isolation, difficulties in forming intimate relationships, concerns over sexuality, excessive self-consciousness, problems in work and achievement related activities, Chronic delinquency, or suicide, as well as over identification with the peer group. Adams, Gullota and Montemayor, 1992; Meeus, 1996; Steinberg, 1993, 2002). In one particular study, adolescents who were escaping identity formation through a diffuse identity style were more likely to manifest conduct and hyperactivity disorders, while those who are engaged in an active identity style were less likely to manifest these some difficulties (Gullotta et al., 2002).

Analyzing the relationship between identity domains of commitment and exploration and adjustment, a number of studies have shown that commitment is positively associated with adjustment and psychological well-being (Luyckx, Goossens, Soenens, Beyers, and Vansteenkiste, 2005; Meeus, 1996; Meeus, Iedema, Helsen, and Vollebergh, 1999). Finally, convergent evidence (Meeus, Oosterwegel, Vollebergh, 2002; Samuolis, Layburn, and Schiaffino, 2001) shows that positive adolescent–parent relations foster identity commitments. Forming and adhering to stable identity
commitments is assumed to nurture this feeling of having an integrated sense of self (Côté and Levine, 2002; Dunkel and Anthis, 2003). Possessing a clear-cut, consistent self-concept appears to provide a key foundation for psychological adjustment and well-being, especially in Western cultural contexts (Cross, Gore, and Morris, 2003; Suh, 2002). Integrated goal systems likely lead people to feel good about their goals and to develop a strong sense of self-esteem (Sheldon and Kasser, 1995). According to Erikson (1968), a synthesized sense of identity has beneficial effects on individuals’ adjustment, given that one forms clear commitments that cohere with one another and are integrated in an identity structure. In other words, a well-developed and integrated identity provides a subjective sense of inner unity and continuity over time (Van Hoof, 1999), providing adolescents and emerging adults with a sense of well-being and self-esteem. Many studies have indeed found evidence for a positive association between people’s ability to establish clear identity commitments and psychological well-being (Berzonsky and Adams, 1999; Bosma and Kunnen, 2001). On the contrary, individuals who are unclear about their identity are more likely to experience distress, engage in destructive behavior, and experience difficulties maintaining healthy relationships with others (Schwartz, Beyers, et al., in press; Schwartz, Klimstra, et al., in press; Schwartz, Mason, et al., 2009). Kidwell and Dunham et al. (1995) compared low-exploring adolescents to high exploring adolescents and found that participants actively involved in identity exploration showed greater levels of inner confusion, agitation, dissatisfaction, and depression. Crocetti, Rubini, and Meeus (2008) found that reconsideration of commitment was related to depressive and anxiety symptoms, delinquent behaviors, and poorer family relationships. Additionally, Vleioras and Bosma (2005) reported findings that individuals who were not dealing with identity issues (similar to diffused status) had less psychological well-being and individuals dealing with identity issues, resulting in commitments, had more psychological well-being. People who have more fragmented or inconsistent self-concepts would be expected to suffer more from distress. Substantial negative correlations of identity integration to neuroticism and depressive symptoms and a substantial positive correlation of identity integration to self-esteem have also been reported by Campbell et al., 1996. Thus, research supports Erikson’s view that identity formation is a
challenging process and substantial evidence points to a positive correlation between overall psychological adjustment and progress toward identity formation. Marcia (1966) concluded that the harder adolescents work to resolve their identity crisis, the stronger their overall identity and sense of self will be. Erikson’s stages and Marcia’s identity statuses articulate identity formation and the typical crises that adolescents face, but they assume that the individuals have the skills to move through the challenges. However, if an adolescent has a mental disability, the challenge can be greater and may disrupt the individual’s progress permanently (Lewis, 2003). Based upon these premises, identity development is generally viewed as a core therapeutic issue in counseling late adolescents and emerging adults (Enns, 1991; Hamachek, 1988; Schultheiss and Blustein, 1994).

In summary, typical adolescents face a variety of adjustment difficulties when they have not yet reached identity achievement. There is a consensus regarding the relationship of identity achievement and diffusion with well-being. Identity achievement has been found to be associated with indices of high mental health while diffusion has been reported to accompany lower well being ranging from debilitating emotional states to psychopathology. There are mixed research results about relationship of well being with moratorium and foreclosure. Foreclosure can be adaptive or maladaptive depending upon a person’s goals, values and beliefs. Moratorium can be rewarding if exploration process is given social support. Overall, it can be concluded that adolescents who achieve a lesser degree of ego-identity display a greater amount of behavioral problems and adjustment difficulties than those who achieve a greater degree of identity.

2.3 ATTACHMENT AND ADJUSTMENT

The relationship between parental involvement and adolescent psychological well-being is based on two realities. The first reality, the home environment, is the initial social arena in which adolescents have remained more consistently under the influence and supervision of their parents. Later, these individuals begin to seek an alternate reality, separating from parents and seeking inclusion with peers during adolescence (Santrock and Yussen, 1984). Adolescents begin building their own self-
concept through observing the reactions directed toward them by vital individuals in their lives (Gibson and Jefferson, 2006). Personal experiences that evolve from the parent-adolescent relationship are the initial source that sets in motion the cycle of how adolescents will self-evaluate and interact with others. In other words, the type of relationship they experience with their parents is thought to foreshadow their attitudes toward themselves and the quality of relationships they will have with their peers (Wilkinson, 2004).

The attachment to parents plays an important role in the adolescents’ construction and evaluation of self, identity which in turn influences their psychological well-being (Wilkinson, 2004) and that adolescents with an insecure attachment style are generally most susceptible to mental health problems (Essau, 2004; Shochet, Homel and Montegomery, 2006; Dwairy, 2010). The findings from the literature has also suggested that parent child attachment is significantly correlated with adolescent psychosocial adjustment (Armsden and Greenberg, 1987; Cotterell, 1992; Greenberg, Siegel and Leitch, 1983; Kenny, 1987; Kenny and Donaldson, 1991; Kobak and Sceery, 1988; Patterson, Pryor and Field, 1994; Ryan and Lynch, 1989; Nada Raja, McGee and Stanton, 1992). The most consistent correlations from studies conducted since 1975 are found when investigators use adjustment measure of social competence, interpersonal functioning and general life satisfaction (Rice, 1990). Some of the strongest evidence suggests that father’s rejection and mother’s psychological control are the two most powerful predictors of adolescents’ depressive symptoms (Armsden and Greenberg, 1987; Baron and Mac Gillivray, 1989). Attachment to parents contributes to adolescents’ adjustment and there is continuity in the importance of parent-child relationships into late adolescence (Rice, 1990). Rice (1990) suggests that a stronger association between attachment and adjustment may occur prior to important developmental transitions, such as admission to college or graduation from college.

Greenberg et al. (1983) found that perceived quality of adolescent attachments to parents highly correlated with their self esteem and life satisfaction. Armsden and Greenberg (1987) also found that parent attachments in late adolescence as highly correlated with well being, particularly self esteem and life satisfaction. Nada Raja, McGee and Stanton (1992) found that a lower perceived attachment to parents was
significantly associated with lower scores on measures of adolescent well being including greater problems in conduct, inattention, depression and frequent experiences of negative life events. Paterson, Pryor and Field (1995) explored adolescents’ perceptions of their attachment relationships with parents in relation to self esteem, coping abilities and social competence. They found that the quality of affect towards their parents had a significant effect on overall self esteem and coping abilities of adolescents. Cotterell (1992) found that attachment to parents as measured by adolescent perceptions of acceptance, communication and trust was a powerful force of adolescent mental health. Kobak and Sceery (1988) found that adolescents in the secure group were rated as more ego-resilient, less anxious and less hostile by peers.

High levels of perceived parental involvement do positively affect adolescents’ sense of psychological well-being, especially in the areas of self-esteem and self-evaluation (Flouri and Buchanan, 2003; Gibson and Jefferson, 2006; Roberts and Bengtson, 1993). Furthermore, studies by Dekovic and Meeus (1997) and Wilkinson (2004) support the argument a relationship exists between perceived parental involvement, levels of self-esteem at adolescence, and peer relationships. Dmitrieva and associates (2004) proposed that even the frequency of negative familial life events affected perceived parental involvement and parent-adolescent conflict.

Secure attachment also appears to play an important role in developing effective coping abilities. Mikulincer, Florian and Weller (1993) have found that securely attached young adults seek more emotional and instrumental support from others in times of stress. Adolescents who are more secure with their mothers endorse more constructive coping skills (e.g. problem solving, positive reappraisal and support seeking; Voss, 1999). Secure attachment also buffers the stressful transitions to high school (Papini and Roggman, 1992) and during their first year of college, securely attached individuals see themselves as more socially competent and report less psychological distress than their peers (Kenny and Donaldson, 1991). Research by Barlow et al. (2002) found secure adult attachment to be significantly associated with higher coping resources, while an adolescent study found attachment security to be negatively related to negative coping methods, such as drinking or using drugs (Howard and Medway, 2004). Individuals with negative representations of their parents are likely
to cope less effectively with social changes at times of transitions (Larose et al., 2002). Schmidt et al. (2002) found insecure attachment to be related to less flexible coping and avoidantly attached individuals showing more diverting strategies. A secure attachment is generally seen as the combinations of positive model of self and others (Bartholomew and Shaver, 1998). As a result, adolescent with a secure attachment style have better psychological and cognitive functioning, more satisfying personal relationships and a perception of a stronger family base than insecurely attached adults. Diehl et al. (1998) reported in his study that secure individuals were rated as more self confident, scored higher in scoring functioning and psychological well being, as well as had higher scores on expressive personality measure. These individuals are generally more comfortable with autonomy and intimacy, and more expressive in relations with their significant others (Searle and Meara, 1999). Higher reported levels of secure attachment are also associated with positive reports of current family satisfaction (Diehl et al., 1998). In addition, secure individuals perceived more support from family and friends and were more likely to seek out support from family and friends in times of stress (Ognibene and Collins, 1998).

A good relationship with parents protects them from risk. Adolescents who report close, accepting relationships with their mothers report less involvement in delinquent activities (Aseltine, 1995; Smith and Krohn, 1995). Similarly, time spent and identification with both parents, and preferences to parents over peers, have been negatively associated with teens’ subsequent drug use, both directly and indirectly through adolescents’ adoption of conventional attitudes (Brook, Whiteman and Finch, 1993) and low sensation seeking (Barnea, Teichman and Rahav, 1992). These positive relationship qualities are those typical of secure attachment. Indeed, adolescents’ secure attachment to mother has been linked to less experimentation with drugs (Voss, 1999) and less frequent substance use (Cooper et al., 1998).

In terms of specific insecure attachment style, a **dismissing style** (i.e., poor communication and trust, combined with feelings of alienation and disengagement from the attachment relationship) has been associated with externalizing problem behaviors (e.g. aggression and delinquency, Nada Raja et al., 1992; Voss, 1999) and more experimentation with drugs (Voss, 1999). Adolescents and young adults with a
dismissing style are rated by their peers as more hostile than individuals in all other attachment groups (Bartholomew and Horowitz, 1991; Kobak and Sceery, 1988). In problem solving interactions with mothers, dismissing adolescent boys exhibited more dysfunctional anger than did secure adolescents (Kobak et al., 1993). Dismissing young adults reported less family support and more loneliness as compared to their peers (Kobak and Sceery, 1988).

Like dismissing adolescents, fearful adolescents are avoidant, but they are distressed by their lack of closeness to others and suffer from feelings of inadequacy and anxiety (Griffin and Bartholomew, 1994). Fearful attachment with mother has been linked to delinquency and greater experimentation with drugs (Voss, 1999). In addition, both forms of avoidant attachment (dismissing and fearful) with father are associated with adolescents’ reports of using drugs in response to negative emotions and conflict with others (Voss, 1999).

Adolescents who have a preoccupied attachment style (i.e., have positive view of others and negative view of themselves) see themselves as socially incompetent and are rated by their peers as more anxious than all other attachment groups (Kobak and Sceery, 1988). In a three category system of attachment classification (secure, dismissing and preoccupied), preoccupied adolescents have been found to be most vulnerable to maladjustment (Cooper et al., 1998). Preoccupied attachment is related to a poorly integrative self structure, with little differentiation and difficulty regulating distress (Mikulincer, 1995).

The influence of attachment to both parents is important for adolescents in terms of their social and academic competence, self esteem and engagement in problematic behaviors (Rice et al., 1997; Kenny and Gallagher, 2002; Noom et al., 1999). Kenny and Gallagher (2002) reported that attachment to both parents was positively and significantly associated with scholastic competence. Adolescents with secure relations to parents not only have fewer depressive symptoms (Priel and Shamai, 1995) and fewer negative social expectations (Feeney and Noller, 1990), but also perceive a higher level of social support (Herzberg et al., 1999; Sarason et al., 1991); and express more positive perceptions of self worth and self competency (Arbona and Power, 2003; Armsden and Greenberg, 1987; Kenny et al., 1998; Noom et al., 1999).
There is a linkage between a youngster’s self-esteem, interpersonal conflict, and problem behavior (Yacob, 2006). It has been shown that youngsters with poor relationship with their parents and families are more likely to have poor self-esteem and difficulty in gaining their own identity (Nunley, 1996). Research conducted by Li and Seltzer (2005), found that poor relationship between parent and daughters negatively effects daughters’ level of self-esteem. Past research also indicated that females with good and supportive familial relationships have higher self-esteem compared to males (Colarossi and Eccles, 2000), academic performance of young persons could be influenced by factors within the family such as parenting (Englund, Luckner, Whaley, Egeland, 2004).

*Emotional adjustment* is related to how well adolescents deal with general psychological distress or the somatic consequences of distress (Baker and Siryk, 1984). Kobak and Sceery (1988) view attachment theory as a model of affect regulation. Elgar et al. (2003) explains “insecurely attached children, compared to securely attached children are more likely to feel mistrust and anger towards the caregiver, to fail to internalize the caregiver’s values and to have fewer opportunities to develop the skills needed to regulate affect”. (p. 237). Decades of research supports this inference in adolescence as well, as teenagers who don’t feel secure in their relationships with their families and friends demonstrate compromised socio-emotional development, poorer psychosocial functioning, and higher risk for criminal activity (Allen et al., 2003; Nada Raja, Shyamala, McGee and Stanton, 1992; Simons, Pterine and Shore, 2001; Windle, 1992). Research supports the notion that parent-child attachment relationships are related to emotional adjustment among children and adolescents (Cotterell, 1992; Nada Raja et al., 1992; Wilkinson, 2004; Wilkinson and Walford, 2001). Armsden and Greenberg (1987) found self reported parent attachment to significantly negatively relate to depression/ anxiety and resentment/ alienation scores in a sample of older adolescents and young adults. Likewise, Allen et al., 2004; Noom et al., 1999; Rubin et al., 2004) found that secure parental attachments were associated with fewer internalizing problems among adolescents. Nada Raja et al. (1992) and Wilkinson and Walford (2001) examined adolescent-reported attachment quality and level of emotional distress. Nada Raja et al. (1992) found that adolescents labeled as having low
parent attachment reported more distress compared to those in the high parent attachment group. Similarly, Wilkinson and Walford (2001) reported that adolescents’ self reported levels of parent attachment were significantly negatively correlated with measures of psychological distress (i.e., anxiety and negative affect).

A number of studies have studied the role of self esteem in the relationship between attachment style and adjustment on mental health more generally (Noom et al., 1999; Wilkinson, 2004). Wilkinson (2004) reported that self esteem served as a mediator in the relationship between parent-adolescent attachment and psychological health. He concluded that attachment relationship helps to foster self esteem rather than to affect psychological health directly. Rice (1990) found consistent positive associations between attachment security and self esteem, social competence and emotional adjustment. Lopez (2001) found relationship between preoccupied attachment style and low self-other differentiation, high levels of emotional reactivity, strong expressed needs for social approval and self concealment. The results suggested that these individuals are highly concerned about rejection and approval of others. Such persons are likely to project their own self-traits onto others in order to feel self-other similarity.

Further, there is a convincing body of research linking insecure attachment and depression (Carnelley, Pietromonaco and Jaffe, 1994; Feeney and Noller, 1990; Roberts et al., 1993). The researchers assert that attachment insecurity is associated with dysfunctional attitudes which in turn decrease self-esteem, thus leading to depressive symptoms. Cummings and Cicchetti (1990) noted that “disturbances in attachment may play a role in the development, maintenance and intergenerational transmission of depression” (p.342). The relation between insecure attachment and poor affect regulation is documented in the findings of Sund and Wichstorm (2002) who reported alienation sub scores on a self report measure of attachment to be the strongest predictor of severe depressive symptoms in their longitudinal study of 2,360 young adolescents.

**Social adjustment** and competence defines how well the students deal with social challenges at the university as well as with interpersonal experiences like meeting people, making friends and joining groups. It comprises a broader construct including problem solving, conflict resolution and assertiveness. Rubin and Rose-Krasnor (1992)
defined social competence as “the ability to achieve personal goals in social interaction while maintaining positive relationships with others, over time and across situations” (p.285). Rose-Krasnor, Rubin, Booth and Caplan (1996) concluded from their secure attachment relationships assist children in the development of the confidence needed to explore unfamiliar social situations. There are several studies examining domains of social competence in relation to attachment and it is observed that there is a positive relationship between mother-child attachment and social competence in children (Coleman, 2003; Lieberman, Doyle, Markiewicz, 1999; Wartner et al., 1994). Cohn (1990) found support for the hypothesis that quality of observer rated maternal attachment is associated with social competence, peer sociability and adaptive assertiveness. Coleman (2003) found that ratings of attachment to mother were related differently than father attachment to adjustment. Maternal attachment was significantly positively related to peer attachment. Alternatively, parental attachment was significantly positively related to perceived social self-efficiency.

A number of studies have found significant positive correlations between parent attachment relationships and friendship quality as a measure of social competence (Rubin et al., 2004; Lieberman et al., 1999; Kerns, Klepac and Cole, 1996; Parker and Asher, 1987). A meta-analysis has concurred that there is indeed a relationship between parent-child attachment quality and social adjustment (Schneider, Atkinson and Tardiff, 2001). This meta-analysis included 63 studies that examined the relationship between parent-child attachment and peer relations. Schneider et al. (2001) reported a significant relationship between secure attachment and positive peer relationships.

The level of aggression and antisocial behavior are usually evaluated to determine behavioral adjustment. Aggression and antisocial behaviors are good measures of behavioral adjustment as research has shown levels of aggression to be stable across various developmental stages (Renken et al., 1989) and antisocial behavior to be strong predictor of maladjustment in adulthood (Kokko and Pulkkinen, 2000). Existing research indicates that aggressive behavior is associated with insecure mother-child attachments in childhood and adolescence (Cohn, 1990; Marcus and Kramer, 2001; Rubin et al., 2004). Cohn (1990) found that boys specified as having an insecure-ambivalent relationship with their mothers were rated as significantly more aggressive.
Similarly, Laible et al. (2000) examined attachment and level of self reported aggression among high school students. They found higher levels of reported parental attachment to be associated with lower levels of aggression. In addition, Noom, Dekovic and Meeus (1999) examined attachment and antisocial behavior in a sample of 400 Dutch adolescents (age 12-18 years) and found mother attachment to be significantly negatively correlated with antisocial behavior.

The research studying the association of father attachment and antisocial behavior revealed that paternal attachment is associated with fewer externalizing behavioral problems (Leiberman et al., 1999; Rubin et al., 2004; Simons et al., 2001).

**Academic adjustment** is a broad concept that involves the actual academic performance of a student and a number of other factors that relate to how well students manage the educational demands of the academic experiences in a particular setting. Attachment theory predicts that perceived supports affect school adjustment. Kerns et al. (2000) hypothesized and proved that a secure attachment should foster exploration of the environment (Ainsworth et al., 1978), including the school setting. Securely attached children are expected to have fewer school adjustment problems and they are able to regulate their emotions better than insecurely attached children (Kerns et al., 2000). Lack of parental attachment has been found to be associated with even suicide ideations in the studies conducted by Peltzer and Pengpid (2012) in Thailand.

Research involving both children and adolescents confirms that as students who feel supported in their relationships show more positive academic adjustment and motivation (Kerns et al., 2000; Learner and Kruger, 1997; Wentzel, 1998), and greater academic, social and emotional adjustment (Cauce, 1986; DuBois, Felnner, Sherman and Bull, 1994; Muris, Meesters, Van Melick and Zwambag, 2001; Soucy and Larose, 2000). Berndt and Keefe (1996) also posit a relationship between friendship and school adjustment in terms of appropriate classroom behavior, academic achievement, and positive attitudes towards classes, teachers and other school experiences. Carlivati (2001), as well, found perception of high peer support to be predictive of scholastic competence while perceived high maternal support is related to students having strong connections to school and less likelihood of being suspended, expelled, or dropping out of school. Many researchers have provided support for the association of positive
parent-adolescent relationship to the personal-emotional and social adjustment of college students (Bartholomew and Horowitz, 1991; Holmbeck and Wandrei, 1993; Kenny and Donaldson, 1991). Bartholomew and Horowitz (1991) compared securely attached individuals who view their parents as supportive with insecure individuals, and found that college students who view their parents as supportive were better socially, and personally-emotionally adjusted to college.

Studies have revealed that academic performance of young persons is influenced by factors within the family such as parenting (Englund, Luckner, Whaley, Egeland, 2004). Several studies found that family factors including parental monitoring, involvement in youngsters’ education as well as a good quality relationship with parents, are indeed social capital resources that encourages positive outcomes such as academic success (Israel, Beaulieu, and Harteless, 2001; Herbert and Stipek, 2005; Sandefur, Meier and Campbell, 2006; Spera, 2005). High self-esteem would facilitate academic achievement. However, recent studies have shown that the association between these two variables was just modest (Pullmann and Allik, 2008; Nagar, Sharma and Chopra, 2008). Peers and parents play an important role in shaping adolescents’ educational aspirations and attitudes toward schooling (Buchmann and Dalton, 2002). Parents, peers, and teachers mediate the effects of educational and occupational attainment.

By contrast, adolescents who report a lack of supportive relationships are at greater risk of having academic problems (DuBois, Felner, Meares and Krier, 1994; Midgley, Feldlaufer and Eccles, 1989; Phelan, Davidson and Cao, 1991). Goodenow (1993) e.g. found middle adolescents’ sense of classroom belonging to be directly associated with their academic expectancies and values, two key components of academic motivation. Importantly, the presence of secure and satisfying connections with others, or relatedness, fosters internalizations of their important values (Goodenow, 1993). Rice, FitzGerald, Whaley and Gibbs (1995) tested the hypothesis that secure attachment fostered successful adaptation and adjustment to college. Rice et al. (1995) also suggested that secure attachment in the first year of college led to greater academic and emotional adjustment of students.
In summary, the literature relating parental attachment and adjustment to college has reported to be related with relative consistency (Kenny and Donaldson, 1992; Rice et al., 1995; Adedokun and Balschweid, 2008) that college students tend to report positive relationships with their parents and that positive parental relationships were related to successful college adjustment.

Attachment theory has increasingly been applied to understanding disease and chronic illness and the influence of attachments on the health adjustment of adolescents. Researchers like Clark, Watson, and Mineka, 1994 have suggested that insecure attachment influences the expression or course of a disorder. Ciechanowski et al. (2004) found evidence that self-reports of insecure attachment were associated with poorer diabetes self-management (e.g. lower adherence to recommendations related to diet, exercise, foot care, oral hypoglycemic medications, and smoking) and negative outcomes (e.g. elevated glycosylated hemoglobin levels). Similarly, in the context of chronic pain, ratings of insecure adult attachment have been found to be positively associated with disability levels (McWilliams, Cox, and Enns, 2000) and with depressive symptoms (Ciechanowski, Sullivan, Jensen, Romano, and Summers, 2004; Meredith, Strong, and Feeney, 2007).

Predisposition models posit that vulnerability factors play a causal role in the development of a disorder (Clark et al., 1994). Related to this model, Maunder and Hunter (2001) delineated three mechanisms that could lead those with insecure attachment to have elevated rates of disease. First, those with insecure attachment have an increased susceptibility to stress, such as the tendency to perceive more stress and have more extreme physiological responses to stress. Second, those with insecure attachment have a greater tendency to use external methods of regulating affect, such as substance use and food consumption, which could lead to health problems. Finally, those with insecure attachment have less effective help-seeking behavior, such as the underuse of social support and difficulties using medical assistance effectively. This model has growing support. For example, self-reports of attachment avoidance have been found to be associated with altered autonomic functioning (Maunder, Lancee, Nolan, Hunter, and Tannenbaum, 2006). However, it is important to note that these mechanisms could play a role in both the development of a disorder and adjustment to
that disorder. For example, an unwillingness to follow medical recommendations regarding diet and exercise would be expected to influence the development of conditions, such as heart disease and diabetes, and adjustment to these conditions. Although a growing body of research clearly supports the possibility that insecure attachment could be a risk factor for a variety of health conditions, a paucity of research has investigated the hypothesis that those with insecure attachment actually experience more disease or illness. In this study, we used data from the National Comorbidity Survey Replication (NCS–R; Kessler and Merikangas, 2004) to investigate associations between attachment and 15 health conditions. The NCS–R was a large investigation of the prevalence and correlates of psychiatric disorders in the general U.S. civilian population. Most of the NCS–R interview involved the administration of a comprehensive diagnostic interview based on criteria of the fourth edition of the Diagnostic and Statistical Manual of Mental Disorders (DSM–IV; American Psychiatric Association, 1994). However, a large subsample used in the present study (N =5,692) was also administered a series of questions regarding lifetime histories of health problems and completed ratings of attachment. The attachment measure was based on Hazan and Shaver’s (1987) original self-report measure of adult attachment that includes single-item ratings of secure, avoidant, and anxious attachment.

Research with nonclinical samples has suggested that both attachment anxiety and avoidance may influence physiological responses to stress that could determine later health outcomes. For example, Gallo and Matthews (2006) found that in conjunction with particular social interactions, both forms of insecurity were associated with ambulatory blood pressure readings obtained from adolescents. During blood pressure monitoring periods involving recent or current interactions with friends, attachment anxiety was associated with augmented diastolic and systolic blood pressure. During periods involving social conflict, avoidance was associated with augmented diastolic blood pressure. However, some studies have found only one type of insecure attachment to be related to health-relevant variables. Numerous studies have thus, demonstrated that psychopathology is positively associated with both ratings of insecure attachment (e.g. Mickelson, Kessler, and Shaver, 1997) and a wide range of health conditions (Scott et al., 2007).
The concept that belonging and support enhance context specific motivation and engagement applies to peer relatedness as well. Since students at risk for school dropout report relatively low feelings of relatedness to teachers and peers in the context (Catterall, 1998; Croninger and Lee, 2001), they might feel more supported by and affiliated with others who are similarly at risk, or who have already dropped out of school. Hymel et al. (1996) suggest that students at risk for school dropout not necessarily lack social integration, but may affiliate with “peers who do not identify with or participate in the school context and who do not encourage school completion” (p.327). While perceptions of high affiliation with highly motivated peers who participate in the school community have a positive effect on socialization, expectation, perceptions of high affiliation with disaffected peers have negative effect (Kindermann, Mc Collam and Gibson, 1996). Problems in adjustment are likely when the sources of social support and self esteem are not reasonably balanced between adult and peer oriented domains. Greater levels of externalizing problems are associated with stronger peer-oriented sources than sources within family or school (DuBois, Burk-Braxton, Swenson, Tevendale, Lockerd and Moran 2002; Goodenow, 1993). Externalizing problems, in turn, are predictive of greater risk of school dropout.

Analyzing the interaction effects of parent and peer attachment and adjustment, it has been found in the research studies that both parent-child relationships and friendship in early adolescence interact in meaningful ways to predict adjustment. Parent-adolescent relationship and peer relationships may be associated with psychosocial functioning in at least three ways. First, each may make an independent, unique contribution to predicting adjustment outcomes. Second, the parent-adolescent relationships may provide the basis for the formation of friendships, which in turn are related to psychosocial adjustment. Third, the relation between parent-adolescent relationships and functioning may be moderated by friendship quality. According to Bowlby (1973), adjustment at any particular stage is the result of the interaction of the individual’s past experiences with current relationships in the larger social environment. Therefore, the early parent-adolescent relationships and friendship experiences may interact with each other to influence psychosocial functioning. Specifically, a high-
quality may buffer the impact of a qualitatively poor parent-adolescent relationship (Booth, Rubin and Rose-Krasnor, 1998).

There are several researchers who attempted to examine the interaction between early home environment and friendships. Laible, Carlo and Raffaelli (2000) investigated the differential and interactive relations between parent and peer attachment and adolescent adjustment. Middle school and high school children reported the degree of trust, communication and alienation perceived in their relationships with their parents and friends. Adolescents who perceived their relationships with both parents and peers to be more secure were the best adjusted, reporting lower levels of aggression and depression and more sympathy. Those who perceived their parent and peer relationships to be less secure were the least adjusted. It was found that adolescents with a secure attachment to peers but an insecure attachment to their parents were significantly better adjusted than those with an insecure attachment to peers but a secure attachment to parents. Although both attachments served similar functions for adjustment, the findings suggest that peer attachments may become more influential than parent attachment during adolescence.

Overall, it can be concluded that a plethora of research has pointing the crucial relationship of attachment and adjustment suggests that supportive relationships with parents and peers plays a vital role in fostering an adolescent’s adaptive adjustment. The review has further highlighted that secure relationships with both parents and peers lead to positive adjustment whereas, those with less secure relationships have least positive adjustment.

### 2.4 IDENTITY FORMATION: ROLE OF GENDER AND AGE

While some research suggests that men may develop their identities at a faster rate than women (Adams and Fitch, 1982; McIntosh, 2005), other studies have found no difference in the rate of identity development (Shaw et al., 1995). Similarly, some studies indicate that men and women follow the same pattern of identity development (Streitmatter, 1993), while others suggest that this developmental pattern may differ for women (Adams and Fitch, 1982). Some academics suggest that females and males may in fact develop their identity at the same rate, however argue that the tools currently
used to measure identity do not accurately assess the ways in which female identity development occurs (Gilligan, 1982). Gilligan (1982) suggests that the identity formation of women relies more on relationships with others than that of men. Many inconsistent conclusions still exist regarding gender and identity. Considering the societal changes, gender differences in identity formation might have disappeared as well. In fact, several researchers (e.g. Kroger, 1997; Waterman, 1982, 1993, 1999) concluded in overviews that there were no general differences in the prevalence of identity statuses among men and women, a conclusion that has been reconfirmed in an extensive empirical study by Meeus et al. (1999). Notwithstanding a lack of evidence for gender differences in the prevalence of identity statuses, it is still possible that there are gender differences in the identity dimensions underlying the statuses (i.e., exploration and commitment). Recent longitudinal studies on identity dimensions have mainly been conducted by Luyckx and colleagues (Luyckx et al., 2006a, 2008). They employed samples predominantly comprised of females, and were therefore unable to test for gender differences.

In a review of identity status studies between 1966-1995, Kroger, (1997) discussed gender differences in overall interpersonal and ideological identity. As is common in the identity status literature, she defined overall identity as ego strength and ego synthesis that individuals derive from commitments in a combination of life domains, and interpersonal and ideological identity as ego strength and synthesis that individuals derive from interpersonal and Identity transitions, educational or work or political commitments, respectively. Kroger reported no gender differences in overall identity, but she did find that females were more often in achievement in interpersonal identity than males, and that in high school samples males seemed to move into the direction of achievement later than females (Kroger, 1997, p.752 and p.754, respectively). Studies conducted since 1995 have replicated these findings with regard to interpersonal identity domains such as friendships (Lewis, 2003) and also have found a higher prevalence of females in achievement, along with a higher number of males in diffusion both in overall identity (Guerra and Braungart-Rieker, 1999; Sandhu and Tung, 2006) and in ideological identity domains (Schwartz and Montgomery, 2002). This pattern of findings suggests that, since the 1960s, gender differences appear more
often in interpersonal identity than in overall and ideological identity, and more often in high school samples than in college/university samples. Moreover, the more recent findings suggest that gender differences also may be more likely to appear in overall and ideological identity from the late 1990s on.

From the review of literature, it is clear that notable gender differences have been found in most of the identity research. On the one hand, there is support for new points which suggests that females are further along than males on identity issues during adolescence. On the other hand, there are dearth of studies pointing in favor of males.

Debates relating to gender differences in identity formation can be traced back to Erikson (1974) who claimed that women would have to keep their identities open, to adjust to the peculiarities of the men they would eventually meet and to the children they would raise. Erik Erikson, the pioneer of identity research, was the first one to discriminate against women on identity. He didn’t include female subjects in his initial construction of the ego-identity. Later, in response to criticism, Erikson (1968) wrote a separate chapter addressing female’s identity in terms of “Inner space”. Erikson referred to the “Inner space” or womb as the basis for a positive potential for the girls identity, suggesting that males project themselves into ‘Outer Space’ to become accomplished in ‘the conquest of geographic space and scientific fields or in the dissemination of ideas’. Erikson (1968) argued that a women’s identity will remain diffused and will not be fully achieved until her reproductive power is fulfilled. Her pursuit of an occupation and ideology becomes peripheral since all her psychic energy will be directed to finding a mate and subsequently, to be a mother. In other words, while Erikson portrayed a man’s identity in terms of occupation and ideology, he primarily described a woman’s identity in relational terms, names, as a wife and/or mother. In a somewhat similar vein to Erikson’s earlier works, Miller (1991) suggests that for girls, adolescence is a period of shutting down rather than opening up. Boys expand their horizons during this period but girls ‘contract’ rather than expanding. Boys are much more preoccupied with the development of their independent identity in comparison to girls. Nowadays, such a statement should be considered as outdated in Western countries, since both men and women pursue occupational careers and childrearing has become much more of a
mutual process with men and women sharing such tasks. Considering these societal changes, gender differences in identity formation might have disappeared as well. In earlier studies, ego-identity construction was exclusively descriptive of male development.

Research has investigated gender differences in both the content and processes involved in identity formation. (Thorbecke and Groterant, 1982; Bilsker, Saliedel and Marcia, 1988; Archer, 1989; Waterman, 1985; Basak and Ghosh, 2008). Studies assessing identity content investigated how males and females compared across various domains of identity (e.g. occupation, religion, sexual roles), as well as broader areas of intrapersonal style (e.g. achievement, motivation, competitiveness, femininity).

Identity processes assessed were those defined by the Identity Status Paradigm (exploration and commitment) to observe whether the presence/absence of these processes were different between genders. A review of literature concerning gender differences in identity content areas suggests that males focus on intrapersonal aspects of identity and females on interpersonal aspects. Literature also suggests that ideological domain is more relevant for males, while females develop their identity in interpersonal domain and relationships. Research shows that male identity development has been described as focusing on such issues as individual competence, knowledge acquisition, and occupational choice, while female identity revolves around issues of interpersonal processes and relations to others and that establishing an occupational identity is a more complex matter for females than for males (Douvan and Adelson, 1966; Gilligan, 1982; Hodgson and Fischer, 1979; Thorbecke and Grotevant, 1982; Dellas and Gaier, 1975; Psathas, 1968; Matteson, 1993). Bilsker, Schiedel and Marcia (1988) found while there were no differences between genders in level of overall identity status, interpersonal exploration and commitment were more predictive of identity status for women, while exploration and commitment in the ideology area (religion and politics) were more predictive of identity status in men. Research findings by Adams and Fitch, 1982; Hodgeson and Fisher, 1979 conclude that ideological domains such as occupation and politics might be salient in male identity formation, while sexual role attitudes might be more salient for female identity formation.
Various researchers have found female identity to be focused on interpersonal relationships. (Josselson, 1980; Bilsker et al., 1988; Archer, 1985; Grotevant et al., 1982; Jensen et al., 1998; Branch 2001; Meeus and Dekovic, 1995; Waterman 1993; Meeus et al., 1999; Craig Bray et al., 1988, Kacerguis and Adams, 1980; Gilligan, 1982, Miller, 1991; Surrey, 1991). Researchers (Frantz and white, 1985; Josselson, 1988) have also pointed out that relative to men, relationship variables are more closely tied to female psychological functioning and identity development, and gender moderates the type of life experiences which promote individuation and identity formation. Pastorino et al. (1997) reported that as compared to females, males were likely to explore and commit in politics. Archer (1985, 1989) studied that the task of identity formation is more complex of females than males in that they endeavor to work out for themselves their goals, values, and beliefs in more domains than do males. Females not only experience the desire to establish their sense of identity in vocational choice, religious beliefs, political ideology, and gender-role attitudes in the same manner as males, but they engage in more active reflective and decision-making regarding identity in a relational context than do their male counterparts.

Bartle-Haring and Strimple (1996) studied that women find less salience in their work role and other ideological issues were more salience in interpersonal issues. They further found that scores on ideological identity achievement and intimacy in dating relationship were positively associated for men, while there was no relationship between these two variables for women. For women, interpersonal identity achievement scores were associated with intimacy in dating relationships. This relationship was not significant for men.

The salience of relationship in female development has led theorists to believe establishing and maintaining relationships may be super ordinate to establishing an identity for females. Some research supports the idea that intimacy development in females is related to identity formation (e.g. Craig-Bray et al., 1988; Freilino and Hummel, 1985; Mellor, 1989; Bilsker, Schidel and Marcia, 1988). If connectedness is the root of female socialization vs. Autonomy for males, it follows, as suggested by Gilligan (1982), Miller (1991), and Surrey (1991), that there may be gender differences in prioritizing identity and intimacy with intimacy being a priority for females and
identity a priority for males. Females have advanced capacities for intimacy, independent of identity.

There seems to be various factors that are responsible for gender differences, such as upbringing and values. A body of literature seems to suggest that cultural and social environments determine to a large extent gender roles (Chae, 2001; Louw, 1991; Sandhu and Tung, 2006). Louw (1991) reported that the gender-role behavior that a child learns depends on his/her immediate environment and on the broader cultural environment. The social learning theory emphasizes that children observe the behaviors of adult models, remember it and then imitate the behavior of the parent of the same sex. This is also highlighted by Chae (2001) that the impact of differential socialization by parents influences the way boys and girls perceive themselves as well as their external realities. This is referred to as identity reflexivity, whereby one sees one’s self through the eyes of those around them (Stocker, 2007). According to Marcia (1980) this is a “less developed” structure of identity, whereas a “better developed” structure of identity encompasses “developmental assets” which refer to the perception of one’s self through internal processes. In addition, differences in gender roles occur largely in societies and cultures which encourage separateness in men, and where women are reared towards conformity and embeddedness. The influence of upbringing and values that are held by different groups seem to contribute to a considerable degree on the process of career decision-making in females. This could be explained by the fact that girls today are encouraged to consider both stereotypically female plus male paths of development (Cramer, 2000).

Thus the range of possibilities for establishing an identity is broader for females than males. In addition, the modern day set-up has opened entry to girls in various careers, and politics, which attract them to establish their identity in areas which were once not welcoming for girls. Also emerging female heroes in Indian society in different spheres of life may be an additional source of inspiration to the adolescent Indian girls (Sandhu and Tung, 2007). These contrasting results in research studies may be due to the fact that different cultures value different domains in the identity formation of adolescents. Thus these cultures would emphasize the development of favored domains over others.
There are, however, some contextual factors that may pose as potential barriers to a healthy psychosocial development. According to Meeus et al. (1999) disillusionment with factors such as the socio-economic set-up, political apathy, and the changing pace of life or the lack of role models may encourage diffusion especially in males. Unlike their female counterparts who have female heroes as role models, especially since the rise of the movement for gender equality, boys seem to lack role models that can serve as a source of inspiration. In addition, Fitch and Adams (1983) state that academic institutions of males are not pro-active in the identity process, whereas female institutions are catering to the all-round development. This could also be contributing to more boys being in the diffusion status.

Also, there are domestic, institutional, and social customs that keep women in the home which are characterized in the “motherhood mandate”. Traditionally, women are required to have children. Historically, it has been unthinkable for a woman to be less than a mother and wife (Bem and Bem, 1970). Women’s lack of success in the public sphere has been found to be associated with the mandate to produce large families (Russo, 1976). Rao and Rao (1982) report that in India, women are encouraged to believe that they have no needs of their own and no identity outside of marriage or without reference to a man. Kakar (1978) suggests that in Asian Indian families, females are expected to maintain a subordinate role and not assume decision-making power. Vagrecha (1999) reported that a woman’s identity shapes according to such issues as menstruation process, bearing and feeding a child. Bem (1993) explained that while societies differ in the specific tasks they appoint to the two sexes, all societies allocate adult roles on the basis of sex and anticipate this allocation in the socialization of their children. Boys and girls are not only expected to acquire sex-specific skills, they are also expected to have or to acquire sex-specific self-concepts and personality attributes: to be feminine or masculine as defined by that particular culture. Gilligan (1982), Miller (1991), and Surrey (1991) suggest that female development follows a different course, a relational pathway. According to these theorists, girls identify with the same sexed caregiver and are socialized in a mutual sharing process with their mothers, which fosters a sense of emotional connection. Their sense of effectiveness, as well as their self-esteem, is based on feeling involved in relationships. For boys,
however, self concept continues to be fostered by psychological separation from others. By adolescence, boys focus on developing an independent identity. In contrast, for females, the self is organized and developed in the context of important relationships, serving as the basis of their identity process (Gilligan, 1982; Miller, 1991; Surrey, 1991). Thus, differing socialization experiences lead males and females to approach the world differently, with males operating primarily from a stance of autonomy, and females, from a relational perspective.

Witt (1997) proposed that the strongest influence on gender role development appears to occur within the family setting, with parents passing on both overtly and covertly—their own beliefs about gender. Martin, Wood and Little (1990) explained that as children grow and develop, the gender stereotypes which they are exposed to be at home are reinforced by other elements in their environment and are thus perpetuated through childhood and adolescence. The multitude of ideas, attitudes, behaviors, and beliefs to which a child is exposed results in a child’s burgeoning sense of self, or self-concept. This information is internalized through parent-child interactions, role modeling, reinforcement for desired behaviors and parental approval or disapproval (Santrock, 1994). As children progress into the larger world of school and friends, many of their ideas and beliefs are reinforced by those around them. Furthermore, reinforcement of acceptable and appropriate behavior is shown to children through media, particularly television. Children learn gender stereotyped behavior through all of these socializing agents. As children develop, these stereotypes become firmly entrenched beliefs and consequently, are a part of person’s self concept (Witt, 1997). Chodorow (1974), Gilligan and Wiggins (1987) described that girls, being the same gender, identity with their mothers and remain longer in close proximity to them than do boys. Consequently, creating and maintaining connections with others become more central to girls’ self concept and self esteem. In adolescence, girls are “more apt to focus their attention on the nature of the strength of connection, especially when norms of feminine behavior impede striving towards equality” (Gilligan and Wiggins, 1987, p. 282). Cultural and societal pressures may place more expectations on women to be self sacrificing and concerned with other’s needs and feelings. Thus, it may be necessary for women in particular to relinquish the stereotyped gender role definition in order to.
achieve a self-structured identity as well as a balanced concern for the welfare of others and self (Skoe, 1995).

Apart from the literature highlighting gender differences in identity formation, abundant support is available to the contrary. Far more similarities or no gender differences in patterns of identity development have been reported by Archer (1980), Waterman (1982), Kroger (1988, 1997), Marcia (1993), Meeus et al. (1999), Stephen et al. (1992), Whitbourne and Van Manen (1996), Pulkinnen and Ronka (1994). No significant gender differences in identity have also been reported by Abraham (1983), Adams et al. (1985), Bennion and Adams (1986), Clancy (1984), O’Neil (1986), Rodman (1983), Streitmatter (1993). The reason suggested for more of similarities across genders may be that the current socialization pressures require females to balance separation tasks while concurrently fostering connectedness tasks.

Also, there are studies that suggest that females perform better than males on identity development and display higher identity achievement and moratorium than boys’, even in male dominated areas. Stark and Traxler (1974) found that college female students revealed less ego diffusion than males. These results are consistent with Wagner (1976), Abraham (1984), Grotevant and Adams (1984), Imbimbo (1995), Cramer (2000), Branch (2001), Markstrom-Adams and Adams (1995). Though interpersonal issues have been found more prominent in women’s identity than in men’s identity in most of the research studies, however, there were also some studies presenting different results. Willemsen and Waterman (1991) found females were more diffused in the interpersonal domain, while males were more identity achieved in both the ideological and interpersonal domains. Females have also been found to be higher than males on identity achievement status (Abraham, 1984; Streitmatter, 1987; Grotevant and Adams, 1984; Mead, 1983; Lacombe and Gay, 1998; Bartle-Haring et al., 2002; Jones and Hartmann, 1988, Jones and Streitmatter, 1987; Imbimbo, 1995; Schwartz and Montegomery, 2002). Higher moratorium in women as compared to men has been reported by Cramer, 2000; Meeus, 1996; Samuolis et al., 2001; Jones and Hartman, 1988). Research also points out to lesser foreclosure in girls as compared to boys (Graf, 2003; Bartle- Haring et al., 2002; Cramer, 2000). Thus, all these studies suggest that females are somewhat further along the males in the identity formation.
process. Researchers have tried to give explanations for the girls outshining the boys in identity formation. Lytle et al. (1997) have concluded the females blend interpersonal and intrapersonal identity development, whereas males appear to develop only intrapersonal identity. Cramer (2000) reported that boys are encouraged to model themselves after their fathers to model their identity on that of their mothers. Girls, however, are today encouraged to consider both stereotypically female and male paths of development. The range of possibilities for establishing an identity is thus broader for females than for males.

To summarize, it can be concluded that the research on gender differences in identity formation has shown contradictory results. Many researchers point to differences in relevance of ideological and interpersonal domains of identity for the two genders, while there are many researchers who report no gender differences. The differences found across gender appear to be minimal in the content area of identity (e.g. vocation, religion, family roles), and virtually nonexistent in the proportion of males and females found in the four identity statuses. When differences do occur, they are not in the vocation domain (which has been traditionally associated with male development), but rather have been in political ideology (with males showing advanced development) and in the interpersonal area of family and sex roles (with females indicating more advancement). An explanation for this finding is that the stereotyped male versus female developmental paths are exaggerated, with females giving a slight developmental advantage in interpersonal areas and males being more advanced in some intrapersonal issues. At the same time, there are studies which indicate that females in fact have better developed identity and seem to be tackling both domains effectively.

Regarding identity and age, the review of literature on identity suggests that identity formation is a lifelong process, though adolescence has been considered a main time period for identity formation. Psychologists have ascribed various changes accompanying adolescence to play some role in identity questioning during this age period. Various physical, psychological, and social changes may initiate identity search during adolescence. Erikson (1968) has considered adolescence as a distinct life stage in which the complex interplay of psychological, social, historical, and developmental
forces propel the individual to search for and consolidate a powerful sense of self; and not until adolescence does the individual develops prerequisites in psychological growth, mental maturation and social responsibility to experience and pass through the crisis of identity. Erikson (1968) also states that when an individual reaches adolescence, the usefulness of identification as a mode of adjustment ends and identity formation process begins. Also, a combination of intrapsychic and cultural forces acts to initiate and aid identity formation process. Experiences of heterosexual intimacy reanimate those latent aspects of the self which are products of intimacy experiences of early childhood. A heightened sense of personal independence leads to new relationships in an enlarged social environment giving new perspectives on past relationships. Blos (1962) describes adolescence as a second individuation process. Restructuring at this time however involves relinquishing that internalized parent that has allowed the child some independence from the external object so that higher levels of differentiation can be achieved and new extra familial love relationships can be formed. Thus, Blos views identity to be associated with adolescent years’ greater striving towards individuation. Similarly, empirical studies of the identity statuses have suggested that greater individuation and personality differentiation during adolescence are associated with the experiences of a crisis or exploration period (Chapman and Nicholis, 1976; Ginsburg and Orlofsky, 1981; Orlofsky et al., 1973). Also, Pomerantz (1979) considers psycho-social development during adolescence to be triggered by various biological, social, and psychological changes. Newman and Newman (1988) suggest that following the narrow socialization of childhood, adolescents gradually become aware of the variety of roles, values and lifestyles in their culture. Their intellectual growth provides a new level of hypothetical reasoning through which they can symbolize alternative solutions to problems and the likely consequences of each solution.

Psychologists also suggest that changing familial relations during adolescence may also contribute to one’s identity. Steinberg (1981) and Steinberg and Hill’s (1978) biosocial studies reveal a pattern of increasing conflict between adolescents and their parents during the apex of the pubertal growth spurt. These conflicts redefine parent-adolescent relationships, leading to psychosocial development of individuals.
Seemingly, adolescence appears to be the most important period of identity formation and the review of literature suggest that the greatest change and consolidation of identity takes place around late adolescent years. Erikson (1968) and Marcia (1964, 1966) see late adolescence as the optimal period for identity formation. Erikson (1963) suggests that in late adolescence, facing such imminent adult tasks as getting a job and becoming a citizen, the individual is required to synthesize childhood identifications in such a way that he can both establish and maintain a feeling of continuity within himself. Erikson (1953) also suggests that late adolescence assumes more important because during these years the college atmosphere could be, or is, highly favorable to the stabilization of identity formation. In such an environment, the student is presented with a continuous opportunity to examine himself within various spheres of activity without various spheres of activity without catastrophic failure or premature commitment. Similarly, Waterman and Waterman (1971) report that identity achievers have been found among entering college freshman. Howard and Kubis (1964) report a greater degree of identity has been found in college senior females. Protinsky (1975) has also found that older adolescents (aged 19 to 24 years) had a higher degree of identity than younger ones (ages 13-14 years). Many researchers (La Voie, 1976; Munro and Adams, 1977) have concluded that the critical period for identity formation is in the age range of 18-21 years old. Similar results have been reported by Pomerantz (1979), Cote and Levine (1989). Adams et al. (1987) reported that cognitive development and related socio-cognitive process may underpin identity formation during middle and late adolescence.

Age comparisons during early, middle and late adolescence demonstrate a significant decrease in higher statuses as the adolescents grew in age. Meilman (1979) in a cross-sectional study from 12 to 24 years olds found that achievement and moratorium increased, while foreclosure and diffusion decreased. Wagner (1987) also found that both males and females increased significantly in degree of identity between early and late adolescence. Similar results were reported by Fregeau and Barker (1986), Streitmatter (1993), Jones and Hartmann (1988), Wires et al. (1994), Skorikov and Vondracek (1998), Markstorm-Adams and Adams (1995). Also, increase in identity achievement from early to late adolescence years has been studied by Meeus (1996),
Archer (1994), Branch et al. (2000); Kumru and Thompson (2003); Skorikov and Vondracek (1998). A decrease in diffusion from early to late adolescence years has also been reported by Meeus (1996), Bartle-Haring et al. (2002), Meeus et al. (1999). Also, lesser foreclosure in older sample has been found by Markstrom-Adams and Adams (1995), Branch (2001). Graf (2003) also found that younger Asian Indian adolescents are more foreclosed than older adolescents. Meeus and Dekovic (1995) suggest that as age increases, youngsters derive more self-confidence and security from their close relationships and tend to be more engaged in exploring these relationships.

Researchers have also tried to study how transitions from one identity status to another occur across age from early to late adolescence. While some have considered late adolescence period to be of greatest change, others also believe that different contents of identity assume importance at different ages and even school years may also show a large change in some specific areas of identity formation. Waterman (1985) and Waterman (1999) reported an overview of age specific pattern of identity development. This overview shows that the transition from diffusion to foreclosure has already been made by some early adolescents (ages 10-13) and the stats moratorium is only reached by many adolescents at the age of 17-19. Strongest increase in achievement takes place in the college upper class years (ages 19-21). Waterman (1999) also concludes that there are individual differences in the age of initial movement out of the identity diffusion status. Such differences may be a function of both personal variables (e.g. readiness) and social-contextual factors (e.g. parental expectations for commitment or exploration, availability of models for commitment or exploration).

Meeus et al. (1999), on transitions from one status to another, suggest that with religious identity, the strongest increase in identity achievement is in the high school upper-class years (ages 16-18) i.e. 13.9% versus only 6.9% in the college upper-class years (ages 19-21). With vocational identity in addition to increase of 16.9% in the college upper-class years, there is an increase of 12.3% in the high school upper-class years. And with political identity, there is an increase of 6.1% in the college upper-class years versus 5.4% in the college under class years (ages 17-19). Kumru and Thompson (2003) report that the most significant transitions with age was between the 15 and 17 years olds (the high school samples) and 19 and 22 years olds (the college sample).
Adams and Fitch (1983) suggest that during college years, societal awareness, whether it is encouraged by peers or faculty, creates one necessary condition for exploring and broadening one’s perspective, and this condition appears to facilitate identity achievement status or stability for males and females respectively.

Though majority of researchers have suggested a significant increase of high identity statuses and decrease of lower identity statuses across age, Meeus (1999) has also suggested that reverse trend in identity may also be possible. Though Marcia’s approach has given a unidirectional interpretation of identity development but individuals may not follow the same developmental pattern across years.

Research indicates that maximum increase in identity takes place in adolescent years yet there are studies which suggest that identity formation is a lifelong process. Erikson (1959) suggests that though individuals start thinking about their identity in high school and college years, but the formation of ego identity occurs throughout life. Marcia (1980, 1993) also reports that identity development is a process which neither begins nor ends in adolescence. Similarly, Freilino and Hummel (1985) found that higher proportions of mature women were identity achieved and less diffused than college-age women students. Similar results have been reported by Whitbourne and Tesch (1985). Grotevant, Thorbecke and Meyer (1982) also views identity formation as a lifelong process. Cross-sectional studies by Meilman (1979), Whitbourne and Tesch (1985) and a retrospective study Kroger and Haslett (1987, 1991) showed low percentage of individuals rated as identity achieved in late adolescence and early adulthood. That such a large proportion of those entering young adulthood do not appear to have achieved a sense of ego identity suggests a considerable scope for development during the years of young adulthood. Cote and Levine (1989) also suggest individuals well into their twenties to be experiencing the identity crisis. They reason that adolescence appears to be becoming increasingly prolonged in step with increasingly complex educational requirements for entrance into adulthood, which may delay identity achievement. Bosma et al. (1994) suggest that the possibility of reformulation of identity exists across the life span whenever individual or contextual changes occur. Similar views have been expressed by Waterman and Archer (1990), Stephen et al. (1992). A cross-sectional investigation of identity status by Whitbourne
and Van Mannen (1996) also found men and women in their 30s to show more identity achievement and less diffusion than college age students.

Overall, the review suggests that identity formation is a lifelong process, but adolescence is the major age period for identity formation because of various biological, psychological and social changes associated with adolescence. Though individuals start questioning their identity in early adolescence, greatest consolidation of identity takes place during late adolescence. Also, different areas of identity assume importance at different age during the adolescent period. Research suggests increase in identity achievement and moratorium and a decrease in foreclosure and diffusion across age, yet reverse developmental trends across age may also be possible. Also, individuals may keep questioning their identity throughout life whenever any contextual changes occur.

2.5 ATTACHMENT: ROLE OF GENDER AND AGE

Researchers have consistently found differences between male and female behaviors in the context of interpersonal relationships (Belenky, Clinchy, Goldberger and Tarule, 1986; Gilligan, 1982). Despite these findings, attachment research has reported mixed results concerning gender differences in the attachment behavioral system.

Schultheiss and Blustein (1994) indicated that it was more important for women than men to share emotional closeness, similarity in beliefs and attitudes and relatedness to both parents. These authors also found that females who were both attitudinally and emotionally dependent on both parents were more likely to experience academic autonomy and purpose, whereas, for men, attachment to parents was unrelated to college student development. Attachment to mother and father was also found to be more relevant for women than men in the areas of academic, interpersonal and emotional well-being (Rice and Whaley, 1994). Greenberger and McLaughlin (1998) found that for men, security of attachment to fathers was significantly related to their willingness to seek out others for support.

Gilligan (1982) indicated that females’ psychosocial development involves attachment and connectedness in contrast to male theme of separation and suggested that females’ concern for relationships was partly due to socialization and different
maternal experiences. Research suggests that the quality and amount of attachment is more important for females during adolescence, males may also have particular attachment needs. Holmbeck and Wandrei (1993) indicated that maladjustment may result when levels of independence and connectedness are extreme for males and females. Collins and Read (1990) suggested that for men, secure attachment was more predictive of positive relations than was their level of anxious attachment. However, the more anxious the women, the less satisfied and less trusting she were. There are dearth of studies which report that girls have higher quantities of and greater satisfaction with peer support than boys do, although this difference has not been found for support from family members (Furman and Burhmester, 1992; Slavin and Rainer, 1990). Support from family members does seem to have a greater impact and females’ levels of depression and self esteem than that of males (Cooper and Grotevant, 1987; Slavin and Rainer, 1990; Windle, 1992). Thus, when gender differences between males and females concerning attachment to their parents were found, female subjects indicated a higher quality of attachment to parents than male subjects did (Benson, Harris and Rogers, 1992; Papini, Roggman and Anderson, 1991).

A related issue in the study of attachment is the stability of attachment between attachment figures (i.e. mother, father, peer, and sibling). Research on the concordance of children’s’ attachment to mother and father focuses primarily on relationships during infancy. Such studies show mixed findings. Several point toward strong concordance between attachment to mother and father (Easterbrooks, 1989) and others suggest that the mother-infant and father-infant attachment relationships are independent (Main and Weston, 1981). Easterbrooks (1989) found a rate of 70% concordance between the attachment relationships that 20 month-old infants had with their mothers and fathers, which strongly supports the notion of concordance. One explanation for the strong rate of concordance is that parents who are more similar in childrearing approaches, such as sensitivity and availability, will have children who are attached similarly to both parents. More importantly, in an analysis of 11 studies of attachment that measure classification with Ainsworth’s Strange Situation, Fox, Kimmerly, and Schafer (1991) found overall support for concordance of attachment to mother and father; those infants who were securely attached to their mother were more likely to be securely attached to
their father (the same patterns were found for insecurity). Kenny and Gallagher (2002) found that for both girls and boys, there were similar relationships between paternal and maternal attachment and instrumental and social/relational competence. These findings suggest that children do internalize representations of relationships and attachments and form expectations for other close relationships.

On the other hand, some of the studies examined suggested a lack of concordance of attachment between caregivers (Fox, Kimmerly, and Shafer, 1991). For example, Main and Weston (1981) found that mother-infant and father-infant attachment was not dependent on one another. They argue that all relationships are different. Although mother-infant and father-infant relationships do interact with one another, mothers and fathers each have specific ways of raising and relating to their children. There are number of studies regarding differences in maternal and paternal attachments. Kerns and Barth (1995) report that maternal and paternal attachments foster different com potencies in childhood and they argue that gender differences in attachment related behaviors are to be expected. Newman (1989) found that mothers and daughters become increasingly close while mothers and sons become increasingly distant. Rice and Mulkeen (1995) found that while there were similar levels of mother and father attachment with adolescents, overall, different patterns of intimacy in maternal and paternal relationships developed over time. Allen, Hauser, Bell and O’Connor (1994) reported that fathers have a greater impact on adolescent well being than mothers. Rice et al. (1997) found that attachment to fathers was a better predictor than maternal attachment of social adjustment and self-efficacy for adolescent males. However, for females, both parental attachments were strong predictors. Kenny, Lomax and Brabeck and File (1998) found that both maternal and paternal attachment at eighth grade contributed to longitudinal changes in psychological well-being for males, but not for females. Concordance has only been examined in infancy and early childhood, leaving concordance of attachment in adolescence as yet unexplored. Because of the developmental changes that occur in adolescence, this period seems to be one in which it is important to look at how attachment to each figure is related.

The attachment literature has also highlighted the importance of gender in considering adolescents’ perceived attachment to peers. Numerous studies have found
gender to be a significant factor in relation to peer attachment (Armsden and Greenberg, 1987; Coleman, 2003; Gullone and Robinson, 2005; Laible et al., 2000; Nada Raja, McGee and Stanton, 1992; Rubin, Dwyer, Booth-LaForce, Kim, Burgess and Rose-Krasnor, 2004; Wilkinson, 2004). Among the studies reporting specific gender discrepancies, girls’ rating of peer attachment was found to be significantly higher compared to boys’ ratings of peers’ attachment (Armsden and Greenberg, 1987; Gullone and Robinson, 2005; Rubin et al., 2004; Wilkinson, 2004). Rice and Whaley (1994) found that in general, attachment to both parents was more predictable of adjustment. Attachment to the father was a predictor of adjustment only during highly stressful times. Using the IPPA (Inventory of Parent and Peer Attachment; Armsden and Greenberg, 1987), some researchers have found that females in both adolescent (Raja, McGee and Stanton, 1992) and college samples (Lapsley, Rice and FitzGerald, 1990) scored higher on attachment to peers, trust and communication scales. However, males and females did not differ on several other scales such as attachment to parents. Nada Raja et al. (1992) concluded that perhaps gender differences found in developmental processes of males and females may not be generalized to every area of functioning; e.g. Steinberg and Silverberg, 1986; Williams and McGee, 1991 findings reported that girls viewed themselves as more autonomous and independent than boys.

Papini and colleagues (1990) found females to have significantly greater emotional self disclosure than do males with their parents (Papini et al., 1990). Sneed and colleagues (2006) reported that males, over the course of adolescence, decreased in the amount of family contact more rapidly than did females. Steinberg (1981) indicated significant differences in the relationship patterns in mother/son dyads as compared to father/son dyads. Steinberg found that the maturity of son impacted the parent/child relationship in that as sons matured their level of deference to mothers decreased and level of assertiveness with their fathers decreased (Steinberg, 1981). Youniss and Smoller (1985) found that females had better relationships with their mothers whereas males viewed their relationships with their mothers and their fathers with similar levels of satisfaction. There are number of studies regarding the relationship between adolescents and their parents supporting the importance of parent/child relationship (Grotevant and Adams, 1984; Grotevant and Cooper, 1986; Grotevant and Cooper,
Attachment is a theory of social development “from the cradle to the grave” (Bowlby, 1979, p.129). While studying the impact of age influences on attachment, research literature were studied beginning from the study of formation of attachment styles in infancy to studying the persistence of attachment styles over age. With regard to attachment in infancy, attachment theory distinguishes between secure and insecure attachment styles (Bowlby, 1973; Ainsworth, 1979). In infancy, a secure attachment is presumably promoted by a caregiver who is reliably available and effectively provides care and comfort. Secure infants are believed to form a cognitive representation of the relationship (Internal Working Model) in which caregiver is viewed as available if needed. However, if the caregiver is not responsive, infants may develop insecure attachments by forming working models in which caregiver is viewed as unavailable and unhelpful. The insecure attachment is further of two types: resistant/ ambivalent (excessive clinginess) and avoidant (limited affective engagement with the caregiver). These internal working models (IVM) influence how the children adapt in later social contexts. Bowlby (1988) believed that starting in infancy a child internalizes patterns of relating to people, generally the parents, and forms an idea of how to relate to others based on these representations. Through early interactions with caregivers, children internalize and organize their understanding of relationships (Laursen and Collins, 2004). Each attachment relationship shapes the child’s mental schema and leads to the development of expectations for future relationships and interactions.

Bowlby proposed that individual’s working models of relationships become increasingly stable and unconscious over time. As individuals use these models as the basis for their interpersonal expectations, interpretations, and behaviors, they become reinforced and increasingly resistant to change (Bowlby, 1969). The individual is thus postulated to interpret life events via the working models he has developed through attachment relationships, a process similar to assimilation (Piaget, 1952). In this way, stability of attachment style is maintained by an active process of construction: people process information and elicit feedback that confirms their internal models of themselves and others (Bowlby, 1973, 1980; Fiske and Taylor, 1991; Kirkpatrick and
Hazan, 1994; Scharfe and Bartholomew, 1994). Evidence presented by these attachment researchers suggests that attachment styles are trait-like characteristics which influence the course and outcome of relationships, as opposed to being merely descriptions of the quality of an individual's current relationships.

Research regarding persistence of attachment over age suggests several reasons because of which same attachment patterns are continued over age (Sroufe and Fleeson, 1986; Thompson, 1998). First, there may be continuity in the caregiving environment. Second, children’s IVM may promote expectancy-confirmation process that reinforces the attachment style. Third, social skills may elicit behaviors from interaction partners that help maintain the attachment style. Fourth, attachment security may influence how well the child masters later developmental tasks that have power to challenge earlier IVM.

In order to examine attachment beyond infancy, researchers have studied attachment across life span. A basic tenet of attachment theory is that it is stable over time, however research yields mixed findings. Longitudinal studies (Hamilton, 2000; Waters, Hamilton, and Weinfield, 2000) measured both infant attachment security status using the Strange Situation and later attachment in childhood as well as adulthood. Researchers found strong retention rates in classification of attachment. In other words, for most individuals there was continuity of attachment; however, instability and change in attachment classification for those who did change were explained by significant life events. There was very little change in classification occurring for those who did not have significant life events (Easterbrooks, 1989; Hamilton, 2000; Waters et al., 2000). Thompson (2000) argues that security of attachment will remain stable only if other aspects of life that are related to attachment remain stable across transitions. He states, specifically, that if quality of parental care is stable and development of solid self-concept and self-esteem occur, one is likely to remain securely attached to others.

Several longitudinal studies have demonstrated moderate stability of childhood attachment patterns over periods ranging from weeks to months (Hammond and Fletcher, 1991; Shaver and Brennan, 1992). Studies using strange Situation procedure developed by Mary Ainsworth and her colleagues (Ainsworth, 1969, 1985; Ainsworth,
Blehar, Waters, and Wall, 1978) have confirmed that the quality of an infant’s attachment to a particular caregiver is moderately stable. For example, Waters (1978) reported that 96% of upper-middle-class infants were classified in the same attachment category at 12 and 18 months of age, whereas Thompson, Lamb, and Estes (1982) reported 53% of infants from adequate middle-class homes were assigned to the same category at 12.5 and 19.5 months of age. Egeland and Sroufe (1981) reported high stability of attachment categories between 12 to 18 months.

Research review on adolescence suggests that it is a time of continued growth, development, and reorganization as shown by ongoing biological maturation of the brain and associated changes in cognition, self regulation, and decision making (Cauffman and Steinberg, 2000; Paus, 2005; Steinberg and Sheffield Morris, 2001). Perhaps, adolescents growing cognitive skills and increasing autonomy allows them to reevaluate their attachment experiences (Kobak, 1999) and leads to changes in attachment representations. Stability in attachment representations across adolescence has been found in a few studies (Allen, McElhaney, Kuperminc, and Jodl, 2004; Ammaniti, van IJzendoorn, Speranza, and Tambelli, 2000; Zimmermann and Becker-Stoll, 2002). In contrast to assertions that attachment is stable, the findings of this study and accumulating evidence suggests that representations of attachment likely show at least some variability over time. Weinfeld et al. (2004) suggest that even those youth who appear to demonstrate stable attachment patterns from infancy through adolescence and adulthood likely experience some shifts along the way.

Research suggesting instability of attachment over time suggests that accompanying increases in parent–child conflict during adolescence (Smetana, Campione-Barr and Metzger, 2006), concurrent relationship functioning may also impact current representations. Findings from the Minnesota longitudinal study support the notion of significant change during adolescence, as Sroufe and colleagues found greater instability from infancy to adolescence (i.e. 19 years; Weinfeld et al., 2000) than infancy to adulthood (i.e. 26 years; Sroufe et al., 2005). This is consistent with Main and Sroufe’s findings that disorganization in infancy predicted insecurity in adolescence and adulthood but not necessarily unresolved representations (Main et al., 2005; Sroufe et al., 2005). Although the experience of a negative life event was the most significant
predictor of disorganization, negative interpersonal experiences at stage salient junctures also contributed to this prediction. Overall, adolescents who experienced failures across relationships and development were at the greatest interpersonal risk for the emergence of unresolved representations in adolescence. Failure to establish positive high quality relationships at these developmental phases appeared to undermine the foundation for adolescent development, perhaps thwarting individuals’ ability to build the internal and external resources necessary for managing the stressors encountered during adolescence. As such, the number of secure mother–child attachments in early childhood was predictive of subsequent attachment representations in adolescence. Adolescents with few secure attachments in childhood were at increased risk for later unresolved representations. Yet some youth with histories of security also demonstrated unresolved adolescent representations (35% of those participants secure in infancy). It is possible that the patterns of interaction that contribute to the formation of attachment at earlier developmental periods are not adequate for maintaining these patterns over time. For instance, Egeland and Farber (1984) found that changes in attachment from secure to insecure over 12 to 18 months of age were predicted by mothers who were low on the expression of joy. While the sensitivity of both the pacing and timing of care that these mothers provided their infants did not change across this period, the affective failure undermined the security of the relationship (Egeland and Farber, 1984). Perhaps in adolescence, mother–child relationships that fail to meet the adolescent’s developmental demands (e.g. autonomy and relatedness) lead to unresolved patterns of attachments.

In addition to mother–child security, low quality friendships in early adolescence placed children at increased risk for developing unresolved representations in adolescence. These findings lend support to the view that relationships outside of the family are unique and significant contributors to adolescents’ adaptation (Collins and Steinberg, 2006; Smetana et al., 2006). To this end, Sroufe and colleagues have found that both peer relationships and attachment representations jointly predict a host of outcomes including school success, social competence, and behavioral problems (Sroufe et al., 2005). As friendships take on increasing salience and intimacy during adolescence, they also provide additional sources of support and opportunities for skill development (Hartup, 1989; Sullivan, 1953). Without these positive relationship bases,
adolescents may be at greater risk for the development of unresolved representations. It is also possible that while some adolescents are more apt to evidence unresolved patterns of attachment during the adolescent time period, these shifts are temporary in nature. This is consistent with Bowlby’s (1973) theoretical assertions that development is “homeorhetic” with individuals prone to return to initial trajectories of development following slight deviations. As opposed to research that had identified stability in attachment from 12 months to 6 years (Wartner, Grossman, Fremmer-Bombik, and Suess, 1994), Bar-Haim and colleagues (2000) found deviations in attachment at 12 months, 2 years, and 4½ years. They argued that these more frequent measures allowed for a truer picture of the normative variability and patterns of parent–child relationship challenges that are characteristic of development. There is also evidence that temporary shifts in attachment representations may occur as a result of changing environmental stressors, such as entry into daycare (Blanchard and Main, 1979) or the birth of a sibling (Touris, Kromelow, and Harding, 1995). These temporary attachment shifts were hypothesized to reflect transient conditions in which waning maternal availability and sensitivity impacted the child’s current attachment organization rather than enduring attachment patterns. Similarly, normative adolescent developmental challenges or transitory shifts in the nature of the parent–child relationship may be the basis for temporary changes reflected in the discontinuity of attachment and emergence of high rates of unresolved representation in this sample. For instance, mothers’ sensitivity and support of adolescents’ autonomy strivings have important influences on the quality of the parent–child relationship (Allen, Hauser, Bell, and O’Connor, 1994). Mothers’ inability to flexibly respond to this challenge may be reflective of a particular failure rather than a more global indicator of the quality of the parent–child relationship. While the mother may have met her child’s earlier developmental needs, this particular challenge may be overwhelming leading to emerging parent–child difficulties and the re-organization of attachment representations. It is possible that, once the challenge of autonomy strivings has resolved, the parent–child relationship will return to its earlier quality and that youth’s representation of attachment will also return to its original organization.

Research supporting *stability of attachment over age* suggests that attachment relationships continue to be important throughout the life span (Ainsworth, 1982,1989; Bowlby, 1973,1980,1982). Researchers have taken various approaches to assessing
adult attachment. First, Main and her colleagues developed an interview measure of individuals’ internal representations of their families of origin (Adult Attachment Interview, AAE; Main et al., 1985). Subsequently, social and personality theorists expanded the definition of internal working models to include representations of friendships and romantic relationships. To assess these representations, several self-report (e.g., Collins and Read, 1990; Hazan and Shaver, 1987) and interview (Bartholomew and Horowitz, 1991) measures have been developed. Although there is no published stability data for the AAI, recent studies have used this interview to examine the intergenerational transmission of attachment patterns. Theoretically, evidence of intergenerational transmission supports the hypothesis of stability of attachment patterns. Fonagy, Steele, and Steele (1991) found 75% agreement between mothers’ attachment classifications during pregnancy and their infant’s attachment classifications at 1 year of age, suggesting that the mothers’ interpersonal behavior had been consistent for at least a year (Benoit, Vidovic, and Roman, 1991, and Ward and Carlson, in press). These results are consistent with the hypothesis of stability over the life span, but these studies have not directly assessed stability. Moreover, the mechanisms of stability and change in adult attachment patterns have yet to be examined.

The literature review addressing the degree of stability of attachment styles also lends support to the claim that attachment styles are stable over time. For example, Waters (1978) reported that 96% of upper-middle-class infants were classified in the same attachment category at 12 and 18 months of age. Further, some evidence suggests that stability of attachment style in infancy is related to the quality and stability of the child’s environment. For example, Egeland and Sroufe (1981) reported high stability of attachment categories (from 12 to 18 months) of children in a high-quality care group and 48% stability of children in a maltreated group. Attachment patterns tend to be quite stable over time in adulthood as well. In the longest longitudinal study examining adult attachment stability published to date, Kirkpatrick and Hazan (1994) reported that after 4 years, 70% of their sample endorsed the same attachment style. More recently, Baldwin and Fehr (1995) reviewed the results of their own studies and concluded that approximately 70% of people maintain their attachment styles over various time periods. These findings reveal that attachment styles tend to be stable over time, but that
this stability is not absolute. That is, a substantial proportion of people report changes in their attachment styles over time.

However, Bowlby also theorized that internal working models may be flexible and open to some degree of modification in the context of disconcordant interpersonal or attachment-related experiences (Bowlby, 1991). Significant changes in the caregiving environment might necessitate modifications in attachment representations. While research has identified interpersonal and environmental contexts that lawfully predict change in attachment patterns, the contributions of these factors to the stability of or the emergence of disorganization has received limited attention. To date, studies regarding the antecedents of disorganization have primarily focused on early childhood. Longitudinal studies examining attachment stability from infancy to adolescence and to adulthood have evidenced mixed findings. From infancy to adolescence, moderate stability was found in two low risk samples (63 and 64%; Hamilton, 2000; Waters, Merrick, Treboux, Crowell, and Albersheim, 2000); however, lower rates of stability were found among two higher risk samples (48 and 39%; Lewis, Feiring, and Rosenthal, 2000; Weinfeld, Sroufe, and Egeland, 2000). Within these high risk samples, divorce, single parenthood, life threatening illnesses within the family, serious parental drug or alcohol use, child maltreatment, or parental death were all predictive of attachment change (Lewis et al., 2000; Weinfeld et al., 2000). Notably, Waters and his colleagues (2000) found that even in their low risk sample, experiencing a stressful life event was predictive of change in attachment representations over time. Between infancy and adulthood, Sroufe and colleagues found significant stability due primarily to the continuity in secure representations (53%; Sroufe, Egeland, Carlson, and Collins, 2005). Instability (i.e. movement from security in infancy to insecurity in adulthood) was predicted by maltreatment, the experience of more life stress for boys, and low parental support during early adolescence (Sroufe et al., 2005). Becker-Stoll, Fremmer-Bombick, Wartner, Zimmermann, and Grossmann, 2008; Grossmann, Grossmann, Fremmer-Bombik, Kindler, Scheuerer-Englisch, and Zimmermann, 2002; Grossmann, Grossmann, and Kindler, 2005 found that attachment representations in infancy did not predict attachment beyond childhood in either the Bielefeld or the Regensburg samples. Only fathers’ sensitivity during father–child play was predictive of adolescent attachment representations (Grossmann et al., 2002).
Together, these longitudinal studies suggest that attachment representations may be stable over time in particular contexts, that under certain circumstances change is expectable and lawful, and that non-attachment related parent–child experiences may also contribute to attachment patterns over time.

Highlighting the **discontinuation of attachment styles over age**, two main viewpoints exist on the causes of change. First, some researchers postulate that attachment style change occurs in response to external factors, such as life events (Scharfe and Bartholomew, 1994). For example, Epstein (1980) suggests that insecure attachment styles can be modified by means of compelling emotional experiences which are inconsistent with existing models, such as experiences arising within the context of significant relationships - with a spouse, for example, or a therapist. Second, major life transitions, such as leaving for college, getting married, having children, may be times particularly conducive to a re-evaluation and re-organization of previous internal working models in the light of new experiences (Kirkpatrick and Hazan, 1994; Baldwin and Fehr, 1995; Scharfe and Bartholomew, 1994).

Negative events could affect attachment security through a number of routes. From the point of view of attachment theory, working models are most likely to change in response to actual changes in caregiver availability and responsiveness. For example, marital problems could produce mood effects or cognitive demands that interfere with the caregiver's availability and responsiveness. Over time attachment representations might change in response to changes in caregiver behavior. Of course, negative events do not have to act directly on the caregiver. They might instead have a direct impact on another family member and then spread throughout the family system, thereby interfering secondarily with caregiving. Negative events might, also change a child's expectations of a caregiver's availability and responsiveness directly. This might happen, for example, if a caregiver becomes chronically ill and the child infers that he or she is now less available. Attachment representations might then change before (or without) actual caregiving failures. Marital discord could have a similar effect (Cummings and Davies, 1996).

For many theorists, attachment style change - insecure to secure, or secure to insecure-is mainly a result of internal factors. Davila, Burge, and Hammen (1997) postulate that some people are more prone to attachment style changes than others, more specifically that there may be certain intrapersonal traits rather than changing
circumstances that render people vulnerable to fluctuations in attachment style. The authors also suggest that attachment style instability may be a manifestation of incoherent working models. That is, people who exhibit changes in attachment style may hold tentative views of self and others, views that can fluctuate easily. They further found that the individuals who experienced fluctuations in attachment style had much more in common with participants who were stably insecure, than with participants who were stably secure. The authors concluded that for certain individuals, attachment insecure may manifest itself in the form of attachment instability.

On the other hand, yet still supporting Thompson’s argument, some researchers found that attachment is not stable. For example, Lewis, Feirin, and Rosenthal (2000) found no relationship between attachment security status in infancy and adolescence. In the study, classification changed for about half of the participants. In addition, divorce was a huge mediating factor for change in attachment status, showing that the internal working model of attachment can be changed due to attachment related experiences. Thompson’s (2000) argument supports these findings because of his belief that security can remain stable if there is stability in relationships and quality of care, but intervening occurrences that change these factors can cause security to shift. These findings suggest that new experience builds upon previous experiences to create flexible representations of how relationships are expected to be.

Thus, research review suggests that attachment representations may be stable over time in particular contexts, that under certain circumstances change is expectable and lawful, and that non-attachment related parent–child experiences may also contribute to attachment pattern change over time.

Summarizing, it can be stated that the stability and change of attachment organization from infancy to late adolescence/early adulthood takes place in a variety of developmental contexts. This review has also provided information about the relation between negative life events and changes in attachment classifications. The research studies included here demonstrate that attachment security can be stable over very long periods of time. However, high intensity, attachment related negative events are associated with changes in attachment security over such intervals. The underlying processes leading to this kind of change yet needs to be explored.