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Early attachment and eating disorders: A comparative study between anorexia nervosa and bulimia nervosa

Francoise Ringer
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: A Comparative Study Between
Anorexia Nervosa And Bulimia Nervosa

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**EARLY ATTACHMENT AND EATING DISORDERS:
A COMPARATIVE STUDY BETWEEN ANOREXIA NERVOSA AND
BULIMIA NERVOSA**

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A dissertation Submitted to the School of Psychology of Edith Cowan University,
Western Australia,
in Partial Fulfilment of the Requirements for the Degree

DOCTOR OF PHILOSOPHY

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2000

ABSTRACT

The purpose of this research was to study the association between adult mental representations of early attachment relationships and eating disorders, and to compare attachment classifications between anorexia nervosa and bulimia nervosa. The sample consisted of 62 women with eating disorders, divided between anorexia nervosa [restricting type (n=20) and binge-eating/purging type (n=16)], and bulimia nervosa (n=26). The measures were (a) a structured interview based on the “Diagnostic Survey for Eating Disorders” (Johnson and Connors, 1987) and the DSM IV criteria for the classification of eating disorders, and (b) the Adult Attachment Interview (AAI) (George, Kaplan and Main, 1985). The AAI was audio-taped, transcribed verbatim, and then scored by two independent scorers, following Crittenden (1998,1999)’s dynamic-maturational model of attachment.

The hypotheses were: (a) women with eating disorders show a high proportion of insecure attachment classifications, (b) the insecure attachment patterns are different (dismissing versus preoccupied) between women with anorexia nervosa and women with bulimia nervosa, and (c) the mental representation of early attachment of women with eating disorders with their fathers is characterised by negativity.

The results showed that: (a) 60 out of 62 participants had an insecure attachment classification; (b) 65.4% of women with bulimia were classified preoccupied; of those with restricting anorexia, 42.1% were classified dismissing and 42.1% were classified combined dismissing/preoccupied; and for women with

bulimic anorexia, 33,3% were dismissing, 46,7% preoccupied, and 20% combined dismissing/preoccupied [χ^2 (4, N=60) = 11.337, $p = .02$]; and (c) concerning the degree of “negativity” in the mental representation of early attachment to the father, bulimic women were slightly more negative (57.7%) than positive (42.3%), restricting anorexics were more positive (70.0%) and bulimic anorexics were more negative (75.0%). These results were significant [χ^2 (2, N = 62) = 7.589, $p = .02$].

The implications are: (a) For research, the application of the Adult Attachment Interview to a clinical population; (b) for treatment, to differentiate appropriate treatments between types of eating disorders; and (c) for prevention, to underline the importance of early support and intervention in families “at risk”.

DECLARATION

I certify that this thesis does not, to the best of my knowledge and belief:

- (i) incorporate without acknowledgement any material previously submitted for a degree or diploma in any institution of higher education;
- (ii) contain any material previously published or written by another person except where due reference is made in the text; or
- (iii) contain any defamatory material.

Signature

Date ...23...03...2001.....

Françoise Ringer

Perth, Western Australia

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Through all the years that I have been a psychotherapist, my patients have generated in me the wish to question and challenge my knowledge and my understanding of their experiences. In particular, my patients with eating disorders have inspired me to undertake this project to study the association between early attachment and eating disorders; For that reason, I wish to thank them.

This research was also made possible with the contribution of all the participants who generously agreed to share with me their personal memories of childhood experiences; I am very grateful to them.

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INTRODUCTION

Over the last three decades the reported incidence of eating disorders within the young female population has increased in industrialised countries (Abraham & Llewellyn-Jones, 1997; Johnson & Connors, 1994). Definitions and diagnosis of eating disorders vary from one source to another, depending on the severity of the pathology and the criteria for diagnosis. However, estimates of people suffering from eating disorders range from 5% to 20% of females in adolescence or adulthood (Johnson and Connors, 1994). Two specific diagnostic categories of eating disorders are defined in the *Diagnostic and Statistical Manual of Mental Disorders – 4th Edition* (1994): anorexia nervosa and bulimia nervosa.

Eating disorders are psychiatric illnesses with physical and psychological features, and mainly affect young women still living with their families. Eating disorders are also amongst the psychiatric illnesses that are potentially fatal. Estimates of the mortality rates vary from 5% (Alexander-Mott & Lumsden, 1994) to 19% (Hsu, Crisp, & Harding, 1979) of people with eating disorders. Moreover, depression is often associated with eating disorders and the risk of suicide is increased, especially amongst women with bulimia nervosa (Johnson & Connors, 1994).

Professionals are confronted with serious difficulties in treatment because patients with eating disorders seem to present ambivalent feelings towards their symptoms, especially among women with anorexia who often resist therapeutic

interventions. A therapeutic alliance is also difficult to establish and the outcome of treatment is frequently disappointing for both patients and therapists.

Studies of the etiology of eating disorders have covered the physiological predisposition (genetic and biological factors), the psychological features (personality traits), and the familial and socio-cultural determinants of the sufferers. Although there are disagreements between different theoretical models explaining eating disorders, it seems to be generally accepted that eating disorders are multifactorial syndromes in which many determinants interact in the etiology, development, and maintenance of the illness (Elkaim, 1996).

It has also been suggested (Johnson & Connors, 1994) that the *Separation-Individuation* process (Mahler, 1971), manifested in the childhood stages of development, re-emerges at adolescence, and that for some young girls, the difficulties from the Separation-Individuation stage are at the origin of eating disorders.

One impediment to studying early disruptions in developmental stages as potential causes of later disorders lies in the limitations of retrospective investigations. There is a need for empirical research to substantiate the hypothesis that disruption to Separation-Individuation in childhood has replications in adolescence, and more specifically in case of eating disorders. Attachment theory (Bowlby, 1969/1982; 1973; 1980) has attempted to link psychodynamic theory with research, allowing greater possibilities for empirical studies of theoretical concepts. From a developmental perspective based on psychoanalytic concepts, attachment theory has developed an empirical framework in which subjective experiences and

mental representations of attachment-related experiences can be explored. Within the attachment model, the Adult Attachment Interview (AAI) (George, Kaplan, & Main, 1985) is a semi-structured interview that explores childhood experiences and provides a classificatory system of adults' current states of mind with respect to attachment. The scoring system is based on the analysis of the discourse and classifies adults as *Secure* or *Insecure* with regard to attachment.

Using the AAI, the current study aims to determine the attachment classifications of women suffering from eating disorders, and to determine if the attachment classifications are significantly different between women with anorexia nervosa and women with bulimia nervosa. Further investigations of specific questions from the AAI explore some characteristics of early attachment between women with eating disorders and their fathers, examining whether the mental representations of early experiences with fathers are different between women with anorexia nervosa and women with bulimia nervosa.

Chapter I presents an overview of eating disorders, and includes an historical review, the classification and diagnosis, the epidemiology and demographic characteristics, and the personality profile of women with eating disorders. Chapter II is a review of relevant literature on the main theoretical models of the etiology of eating disorders such as the biological and genetic models, the behavioural and cognitive models, the socio-cultural and feminist models, the family model, and the psychodynamic model. Chapter III traces the attachment model from its origins to more recent contributions, including research on attachment and psychopathology and, more specifically, attachment and eating

disorders. The methodology is described in chapter IV and the results are presented in chapter V. The discussion on the results concludes the dissertation in chapter VI with a focus on the theoretical implications for more research and for clinical treatment.

CHAPTER I

EATING DISORDERS

This chapter provides an historical overview and a picture of the evolution of the concepts of eating disorders, and it reflects on the confusion and controversy around the description of the disorders. Since the publication of the *Diagnostic and Statistical Manual of Mental Disorders* (1952, 1980, 1987, 1994), there has been some agreement on the classification and diagnosis of anorexia nervosa and bulimia nervosa. The definitions of eating disorders are provided in section two.

A review of the relevant literature presents recent conclusions on the epidemiology and the demographic characteristics of eating disorders. The chapter concludes with a presentation of the main characteristics and personality profile of people with eating disorders.

1. Historical overview

Apart from records such as that of Budha Bodhisattva Lahore who, in the third century A.D., fasted to starvation in an attempt to reach some enlightenment, or Avicenna, a physician from the eleventh century, who described his treatment of a young prince suffering from eating disturbances (Sours, 1980), the first publication on eating disorders appears to be 1694 with Morton's book on

Phthisiologia: Or, a treatise of consumptions (Morton, 1694). Morton described a “consumption disease of mental origin” with symptoms of lack of appetite, amenorrhea, major loss of weight, and overactivity. Morton gave a clear description of his clinical cases that were almost similar to current description of anorexia nervosa. In the Middle Ages, starvation was associated with religious belief and religious women believed they would gain God’s love by mortification of their body through severe deprivation of food (Bell, 1985). Opposition to patriarchal power and church authority was also expressed through self-starvation as was the case of St. Catherine of Sienna (Rampling, 1985).

A hundred years later, a “mental illness characterised by disgust for food” was described by the French physician Naudeau (1789, p. 197), and the description and treatments for that illness mainly focused on the physiological conditions of the disease. It was not until the beginning of the 19th century however, that eating disturbances started to be considered from a social and cultural perspective (Bidaud, 1997). Pinel (1813) emphasised that food was attached to many rituals, rules, and bans, and that eating disturbances should be understood in their cultural context.

In the second half of the 19th century, Louis-Victor Marcé (1860), a French psychiatrist, studied cases of anorexia nervosa and called the disease a gastric nervous disorder characterised by severe refusal of food which could lead to death (Beumont, 1991). Further study into the search for psychopathological factors appeared in England with the work of William Gull (1868) who, for the first time, called the disturbance *anorexia nervosa*. In France, Lasègue (1873) observed women suffering from eating disorders, and consequently gave a clear clinical

description which remains accurate today. Lasègue's description included small food intake, emaciation, overactivity, and amenorrhea, and suggested psychological origins resulting from emotional disturbances. Both Gull and Lasègue recognised the associated psychological factors in the illness such as morbid mental state (Gull), mental perversity (Gull and Lasègue) and hysterical anorexia (Lasègue) (Russell, 1995).

At the beginning of the 20th century, although the psychological as well as the physiological description of the illness had been accepted through the work of Gull and Lasègue, some confusion in the definition of anorexia nervosa appeared with Simmonds' (1914) theory which limited the disease to a "pituitary failure". Anorexia nervosa was no longer considered as a psychological disorder with physical symptoms and, as a result, the condition lost its distinct clinical identity. However, Ryle (1936) refuted Simmonds' theory and the importance of psychological factors re-emerged in the literature. Ryle (1936) claimed that "... the origins of the disease are, as Gull maintained, to be sought in a disturbance of the mind and a prolonged insufficiency of food and nothing more" (Brumberg, 1988, p. 212).

In the emerging field of psychoanalysis, eating disturbances were often considered as symptoms related to other psychopathologies such as hysteria or depression (Charcot, 1890; Freud, 1895a; Freud, 1895b). Early psychoanalysts explained anorexia nervosa as a symptom of aversion to, and rejection of, sexuality, mainly the repudiation of oral impregnation fantasies. But this view has been challenged and criticised (Bruch, 1973) and the most recent psychoanalytic school

has agreed on broader conceptualisation of the disorder which will be presented in the following chapter on theoretical models. Since Bruch's input in the study of anorexia nervosa, authors have contributed to the understanding of anorexia nervosa as an entity by itself.

The literature on bulimia nervosa at the end of the nineteenth century described the symptoms as belonging to another condition, usually as part of anorexia nervosa. Binge-eating was described as the result of a long fasting episode and vomiting as the result of forced feeding in anorexia nervosa (Gull, 1868; Lasègue, 1873). But bingeing and purging were not associated with weight concern. Surprisingly, the literature on bulimia and its specific features, such as binge-eating, vomiting, and laxative abuse appeared for the first time around 1932 with Wulff's description of clinical cases of women suffering from an uncontrollable urge to overeat followed by a purging episode, irritability, and depression (Beumont, 1991). Concern about body size as a specific feature of bulimia appeared in 1944 with Biswanger's detailed report of a severe case of bulimia (the case of Ellen West) and since then has been a part of the definition of bulimia (Beumont, 1991). Russell (1979) called the syndrome *bulimia nervosa*, in order to underline its parallel with anorexia nervosa and to mark its distinctive specificity as a syndrome. It was classified as bulimia nervosa for the first time in the DSM III (1980). As a result of Russell's nomenclature, the reported incidence of bulimia nervosa increased dramatically after 1980. This was more the result of the access to a clear description of the syndrome in the DSM III rather than a real

increase in the number of cases. Russell (1995) suggested that women were likely not to be diagnosed with bulimia nervosa because therapists did not have access to diagnostic criteria.

Confusion and controversy have characterised the recognition, definition, and explanation of eating disorders. More recently, several theoretical perspectives have attempted to provide definitions and explanation for the etiology, development, and maintenance of eating disorders. However, a major current problem in studying eating disorders is the lack of agreement in the literature regarding classifications based on definitions and diagnosis criteria.

The following section will provide an overview of eating disorders in terms of classifications, epidemiology, and personality profiles.

2. Classification and diagnosis

The symptoms of eating disorders are varied and complex, making classification and diagnosis difficult. In the clinical field, eating disorders can rarely be classified as “clear cut” categories. Over the last three to five decades eating disorders definitions have undergone changes following major transformation in societal values, expectations, and attitudes, especially about thinness in women (Russell, 1995). Nevertheless, research based on empirical studies and clinical observation has tried to establish definitions and classifications.

The following section identifies the classification of eating disorders to be used as a basis for this research.

In the current version of the Diagnostic and Statistical Manual of Mental Disorders, (DSM-IV, 1994), eating disorders are divided into two main categories: *Anorexia Nervosa* and *Bulimia Nervosa*.

Anorexia Nervosa

Anorexia Nervosa is defined by the DSM-IV as following:

The essential features of Anorexia Nervosa are the individual refuses to maintain a minimally normal body weight, is intensely afraid of gaining weight, and exhibits a significant disturbance in the perception of the shape or size of his or her body. In addition, postmenarcheal females with this disorder are amenorrheic (DSM-IV, 1994, p. 539).

Anorexia Nervosa has two subtypes:

1. *Restricting Type*: The low weight is reached or maintained by dieting, fasting and/or excessive exercise. This subtype is not engaged in binge eating or purging.
2. *Binge-Eating/Purging Type*: The individual is engaged in binge-eating and/or purging through self-induced vomiting, laxatives, diuretics, or enemas (DSM-IV)

Diagnostic criteria for Anorexia Nervosa (as defined in DSM IV, p. 544)

A. Refusal to maintain body weight at or above a minimally normal weight for age and height (e.g., weight loss leading to maintenance of body weight less than 85% of that expected; or failure to make expected weight gain during period of growth, leading to body weight less than 85% of that expected).

B. Intense fear of gaining weight or becoming fat, even though underweight.

C. Disturbance in the way in which one's body weight or shape is experienced, undue influence of body weight or shape on self-evaluation, or denial of the seriousness of the current low body weight.

D. In postmenarcheal females, amenorrhea, i.e., the absence of at least three consecutive menstrual cycles. (A woman is considered to have amenorrhea if her periods occur only following hormone, e.g., estrogen, administration.)

Specify type:

Restricting type: during the current episode of Anorexia Nervosa, the person has not regularly engaged in binge-eating or purging behaviour (i.e., self-induced vomiting or the misuse of laxatives, diuretics, or enemas)

Binge-Eating/Purging type: during the current episode of Anorexia Nervosa, the person has regularly engaged on binge-eating or purging behaviour (i.e., self-induced vomiting or the misuse of laxatives, diuretics, or enemas) (DSM IV, 1994, p. 544)

Bulimia Nervosa

The second category of eating disorder described in DSM-IV is *Bulimia Nervosa*:

The essential features of Bulimia Nervosa are binge eating and inappropriate compensatory methods to prevent weight gain. In addition, the self-evaluation of individuals with Bulimia Nervosa is excessively influenced by body shape and weight. To qualify for the diagnosis, the binge eating and the inappropriate compensatory behaviours must occur, on average, at least twice a week for three months (DSM-IV, p. 545).

The Bulimia Nervosa category has two subtypes:

1. *Purging type*: the person is regularly engaged in self-induced vomiting and/or the misuse of laxatives.
2. *Nonpurging Type*: absence of self-induced vomiting or laxatives but sometimes use of other inappropriate compensatory behaviours, such as fasting or excessive exercise. (DSM-IV, p. 545).

Diagnostic criteria for Bulimia Nervosa (as defined in DSM IV, p. 550)

- A. Recurrent episodes of binge eating. An episode of binge eating is characterized by both of the following:
- (1) eating, in a discrete period of time (e.g., within any 2-hour period), an amount of food that is definitely larger than most people would eat during similar period of time and under similar circumstances
 - (2) a sense of lack of control over eating during the episode (e.g., a feeling that one cannot stop eating or control what or how much one is eating)
- B. Recurrent inappropriate compensatory behaviour in order to prevent weight gain, such as self-induced vomiting; misuse of laxatives, diuretics, enemas, or other medications; fasting; or excessive exercise.
- C. The binge eating and inappropriate compensatory behaviours both occur, on average, at least twice a week for 3 months.
- D. Self-evaluation is unduly influenced by body shape and weight.
- E. The disturbance does not occur exclusively during episodes of Anorexia Nervosa.

Specify type:

Purging Type: during the current episode of Bulimia Nervosa, the person has regularly engaged in self-induced vomiting or the misuse of laxatives, diuretics, or enemas.

Nonpurging Type: during the current episode of Bulimia Nervosa, the person has used other inappropriate compensatory behaviours, such as fasting or excessive exercise, but has not regularly engaged in self-induced vomiting or the misuse of laxatives, diuretics, or enemas (DSM IV, 1994, p. 550).

Garfinkel and his colleagues (1995), who actively participated in developing the 3 versions of the Diagnostic and Statistical Manual (DSM), studied the changes in classification and diagnosis of eating disorders since Russell's (1979) original description of the disorders. They subsequently challenged the rigidity of the DSM-IV definitions and concluded that "...while significant advances have been made in understanding and classifying eating disorders during the past 15 years, further empirical work is necessary to clarify areas of uncertainty" (Garfinkel et al., 1995, p. 445). More specifically, they argued that further research needs to be conducted on some of the DSM-IV criteria such as the presence of amenorrhea in anorexia nervosa and the frequency of at least twice a week bingeing for three consecutive months in bulimia nervosa. In the same vein, a study by Dancyger and Garfinkel (1995) investigated the relationship between the partial syndrome of eating

disorders and the full syndrome of anorexia and bulimia nervosa, and demonstrated that the partial syndrome is five times more frequent than the full syndrome. The implication of these findings is that, by applying the strict DSM-IV criteria, many people with partial eating disorders are excluded from the syndrome on the basis of a too narrow definition, for example, when only one criterion is missing from the symptoms.

A further challenge was presented by Johnson and Connors (1994) who pointed out that these criteria are "...behaviourally specific but do not attend to attitudinal factors thought to underlie or motivate the disturbed eating behaviour" (p. 11). Johnson and Connors (1994) also suggested that weight is not of central importance in the definitions and should not be included in the diagnostic criteria. On the contrary, the style of eating behaviour, such as bulimic versus restricting should be emphasised, and the diagnosis should consider the attitudes rather than the weight status. As a result, Johnson and Connors' classifications involved three categories of eating disorders: anorexic with bulimic symptoms (referred to as bulimic anorexic), anorexic without such symptoms (referred to as restricting anorexic) and bulimic. These classifications satisfy the DSM-IV diagnostic criteria for anorexia nervosa when specified types (restricting and binge-eating/purging) are considered as two distinct subcategories, and for bulimia nervosa.

3. Epidemiology

Rates of people diagnosed with eating disorders are difficult to determine because they depend on the diagnostic criteria and the severity of the disorders. Several studies claim that 0.5 to 1% of females in adolescence and early adulthood in industrialised countries suffer from anorexia nervosa and 1 to 3% of females in adolescence or early adulthood in industrialised countries suffer from bulimia nervosa (DSM IV, 1994). However, this is probably an underestimate and recent literature suggests that the eating disordered population ranges from 5% to 20% (Johnson & Connors, 1994). The prevalence can only be estimated because many sufferers do not seek medical support or, if they do, they often present with other symptoms and may not be primarily diagnosed with eating disorders (Abraham & Llewellyn-Jones, 1997). Many women also are reluctant to report their eating disorders, especially bulimia, because they feel ashamed and want to keep it secret. Over the last few years, the reporting of bulimia has increased but it is unclear whether this is the result of a rise in the number of bulimic sufferers or the recent attention from the professional body to recognise bulimia as a serious syndrome (Alexander-Mott & Lumsden, 1994).

4. Demographic characteristics

Reliable demographic information is available through two large scale investigations, one conducted in the United States by Johnson and Connors (1982) and the other in England by Fairburn and Cooper (1982). These studies demonstrated that 90% of the population who suffer from eating disorders are female, between the ages of 15 and 30, predominantly single, and tend to be college educated. The high level of education can be explained by the high level of intelligence (IQ) typically found in eating disordered population and also by their wish to achieve well academically. The onset of anorexia is usually in early to late adolescence, and for bulimia in adolescence or early adulthood. The average duration of eating disorders is 5 years (Aronson, 1993). Although anorexic women are by definition underweight, 70% of the bulimic population are within the normal weight range and 15% are over or under normal weight (de Zwaan & Mitchell, 1993).

The gender distribution, characterised by one male in ten cases of anorexia nervosa, seems to be due to the lower cultural and social pressure on boys to be slim. On the contrary, being strong and powerful requires a large body shape. As a result, the syndrome is often misdiagnosed because anorexia is not expected in males. For males, the disorder usually starts before puberty and clinically they seem to be similar to female anorexics. However, the prognosis is worse for males than for females and "...they (males) are more resistant to treatment, both crisis

intervention, long-term psychotherapy, and analysis” (Sours, 1980, p. 272). Little data is available at this stage for males with bulimia nervosa, but it has been estimated that within the bulimic population, 5 to 10% are males (De Zwaan & Mitchell, 1991; Pyle, Mitchell, & Eckert, 1981). The clinical description of bulimic males is very similar to the description of bulimic females and includes the same features (Johnson & Connors, 1994).

People with eating disorders tend to come from the higher socio-economic background, which implies that their parents are generally more educated and more likely to expect their children to be successful achievers (Sours, 1980).

5. Description, characteristics and personality profile

Psychopathological characteristics of people with eating disorders include low self-esteem, self-regulation deficits, body-image disturbance, separation/individuation fears, mood disorder, cognitive distortions, boundary disturbance, tendency to perfectionism, compliance, and distrustfulness. Body dissatisfaction, sense of ineffectiveness, drive for thinness, and maturity fears also characterise the personality profile of people with eating disorders (Johnson & Connors, 1994). Descriptions of eating disorders often combine anorexia nervosa and bulimia nervosa, however the classifications are different. The following section will describe the specific characteristics of each category of eating disorders

because the differentiation of eating disorders is relevant to the purpose of this research.

Anorexia Nervosa

Anorexia nervosa is characterised by a constant drive for thinness supported by an intense fear of becoming fat which does not lessen even if the person is underweight. A strong determination to restrict food intake (in quantity and/or quality like highly caloric foods) is the main feature for controlling weight (14% to 30%) but other inappropriate behaviours such as self-inducing vomiting (3%), misuse of laxatives or diuretics (1% to 5%), or excessive exercising (25% to 65%) are also observed (Abraham & Llewellyn-Jones, 1997).

Despite a very low weight which sometimes reaches a state of emaciation, the fear of gaining weight is translated for anorexics into the fear of becoming fat (DSM-IV Criterion B) and has no rational basis. The determination for thinness is supported by a refusal to maintain the body weight in a normal range for a specific age and height (DSM-IV Criterion A). Different ways of determining the normal weight have been used, such as the Metropolitan Life Insurance tables using the Average Body Weight (ABW) (Appendix A, figure1), or the Body Mass Index (BMI) devised in 1871 by the Belgian astronomer and mathematician Dr. Quetelet (Appendix A, figure 2). The Body Mass Index (BMI) is obtained by a simple formula which divides the weight in kilograms by the square of the height in metres, and people diagnosed with anorexia nervosa show a BMI<17.5

The fear of becoming fat, as well as the refusal to maintain a normal body weight even though underweight, are linked with the third criterion of the DSM-IV classification, disturbance in perception of body weight or shape. The body is perceived to be larger or fatter than it really is or not compatible with the expected “fat-free beauty” model exhibited in the media. Moreover, the body is perceived part by part rather than as a whole entity and there are always parts that individuals perceive as not conforming to the ideal body shape. This disturbance of perception of body image explains why anorexic women deny the severity of their thinness, even if they are emaciated. Nevertheless, some disturbance in the perception of the body can exist in a population without eating disorders. Conclusions of an American study in 1991 (see Abraham & Llewellyn-Jones, 1997) showed that 80% of teenage females (aged 15 to 18) felt they were above the weight they wished to be, and 75% wanted to lose weight. The same findings are reported from most Western countries. The main difference is that, for the anorexic population, the disturbed perception seems to be maintained despite very low weight or emaciation (Abraham & Llewellyn-Jones, 1997).

The fourth criterion, amenorrhea, is often the result of severe weight loss which reduces estrogen to a very low level and menstruation stops or may be delayed for prepubertal girls. Women with a Body Mass Index (BMI) between 17 and 19 or lower cease to menstruate (Abraham & Llewellyn-Jones, 1997). The lack of menstruation usually does not worry anorexic women; on the contrary, amenorrhea is experienced as a relief because it reinforces the perception of control

over the body. By maintaining their body in a childish way of functioning, they can also avoid the psycho-biological changes and demands of puberty (Crisp, 1980).

Although anorexia derives from the Greek “orexis” which means “appetite” and the prefix “an” which means “absence of”, anorexia is not synonymous to an absence of appetite; the hunger sensation is present and, in most cases, is very acute. This may explain the bulimic episodes in some cases of anorexia as a “lapse” after a long period of self-starvation (Dolan & Gitzinger, 1994). This is one of the paradoxes of eating disorders because, in an attempt to lose weight, women will diet frantically and feel so hungry that they may binge and gorge themselves and, as a result, they will put on weight. In that sense, dieting and restricting food often lead to bulimia because excessive restraint tends to trigger binge eating. However, some anorexic women will describe the hunger sensation as pleasurable. The victory against appetite seems to be a satisfaction in itself, a reassurance that the person is in control over her body and its needs (Brusset, 1998).

Another paradox of anorexia nervosa is that, despite their aversion for food intake, sufferers often have a strong interest in food business, recipes, elaborated menus, and even feeding others (Sours, 1980). It reinforces the hypothesis that anorexia is not characterised by a lack of appetite or interest in food but rather by a disturbed attitude towards food. The difference between people with anorexia nervosa and girls concerned about their weight is that non-anorexic girls do not like restricting their food intake; they quickly feel frustrated by the huge effort to lose weight and they get no pleasure in the process of dieting. People with anorexia also

demonstrate much higher willpower and determination that has been described as stubbornness (Sours, 1980).

In parallel to other severe disturbances in eating behaviour, anorexia includes low self-esteem, a sense of ineffectiveness, perfectionism, distrustfulness, and hyperactivity that may give an illusion of adaptation. Self-esteem is highly dependent on the perception of body shape and weight and, for anorexic people, losing weight is perceived as a victory or a high achievement, while gaining weight is perceived as a failure. Hyperactivity is mainly physical (long walks, swimming, gymnastics, dance, sport) in an attempt to keep the body free of fat, but is also encountered at school or in professional activities where the anorexic likes to excel and get good results (Brusset, 1998; Sours, 1980). Unfortunately, this hyperactivity is more constraining than creative. Physical activities are usually solitary with the only purpose being to lose weight, and the compulsive need to be overzealous does not leave any space for enjoyment and fun. Passivity seems to be an enemy and rest is experienced as shameful. Within this frame of mind, some anorexic people reach dangerous levels of intellectual and physical exhaustion in which they put their health and their lives at risk (Brusset, 1998; Sours, 1980).

Generally young people with anorexia do not initiate seeking help because they strongly deny the problem even if they sometimes admit they are very thin. Moreover, hyperactivity and good achievement at school or at work often give the illusion of a normal adaptation in the external world. But despite their multiplicity,

social contacts and external activities are most of the time of poor quality, characterised by superficiality and a lack of engagement (Brusset, 1998).

Distrustfulness, which reflects a fear of intrusiveness from others, is often observed with anorexic people and in treatment seems to serve the purpose of resistance and distancing (Johnson & Connors, 1994). Committing suicide is rarely encountered in anorexic people unless they become very depressed, mainly in cases of severe bingeing-vomiting episodes followed by feelings of despair. Moreover their belief in omnipotence and the denial of the severity of the illness indicate that death is not a real preoccupation (Sours, 1980).

Anorexic women are often not interested in sexuality or in forming a relationship with a partner. Where they have engaged in a sexual relationship, they report their experience as being unpleasurable and unsatisfactory. Hence, thinness and amenorrhea, which are attempts to maintain a childish pre-pubertal body with no sign of maturity, exacerbate this lack of sexual interest (Brusset, 1998).

Bulimia Nervosa

Although there are major differences in attitude and behaviour, bulimia and anorexia have often been considered as two alternating manifestations of the same pathology (Brusset, 1998). Some features are similar, such as the constant preoccupation about weight or the influence of body shape and weight on mood, but it is now accepted that bulimia nervosa is a separate syndrome in itself (Abraham,

Mira, & Llewellyn-Jones, 1983). The diagnostic criteria include recurrent episodes of binge-eating followed by inappropriate measures to prevent gaining weight such as self-induced vomiting (81-94%), misuse of laxatives (50%), and fasting or excessive exercising (Fairburn & Cooper, 1982). The body shape and weight are of constant concern and affect very much the feeling of the sufferer (DSM-IV). The binge-purging behaviour has to occur at least twice a week for three months and not only during an episode of anorexia. Therefore, bulimia nervosa should not be confounded with the binge-eating episodes in anorexia and is also distinct from overeating that characterises people who constantly eat too much, during and between meals. Bulimic episodes are, on the contrary, characterised as episodes during which the person experiences an uncontrollable urge to eat a lot of food (more than people would normally eat in the same circumstances) in a short period of time (less than 2 hours).

Bulimia nervosa may appear after a period of severe restrictive dieting which sometimes has been diagnosed as anorexia (Pyle et al., 1981). The onset of bulimia is usually after 18 years of age and occurs as the result of a long period of fasting and failed dieting (Abraham et al., 1983).

A binge-eating episode, most of the time, occurs in a solitary setting where the person cannot be seen. The duration of an episode is usually less than two hours, but in some cases can last for longer. However, binge eating is not equivalent to “snacking” all through the day. Bulimic persons eat very quickly,

frantically stuffing themselves, with no selection of food and no pleasure associated with eating. The food is usually high caloric, does not require preparation, and is the kind of food which is “forbidden” from their normal diet (Abraham & Beumont, 1982). A binge-eating episode is usually described by the patient as inevitable, terrifying, out of control, and a source of shame. Bingeing-fasting-starving often becomes a cyclic phenomenon. Bulimic women feel guilty after a binge and concerned about weight gain, therefore they frequently fast for an extended period of time after the binge. Fasting makes them in turn feel hungry and they enter the next binge episode. The fear of gaining weight is directly linked with the lack of control of eating behaviour and therefore leads to inappropriate compensatory behaviour such as self-induced vomiting, strict dieting between binges, and misuse of laxatives and diuretics (Abraham & Llewellyn-Jones, 1997).

Depression as well as tension, anxiety, and agitation are common in bulimia nervosa but it is unclear if they are the cause or the result of the bulimic syndrome (Abraham & Beumont, 1982). Research shows that binge-eating does not help negative feelings or, if it does, it is only temporary. Abraham and Beumont (1982) reported that 66% of their sample felt less anxious after a binge but only for a short period of time. Anger, disgust, and guilt are the feelings most frequently reported by women with bulimia (Johnson & Larson, 1982; Katzman & Wolchick, 1984). Using the DSM III criteria for depression, Herzog (1982) concluded that 75% of his sample of women with bulimia showed severe depression symptoms. Self-acceptance, love, and protection are lower for bulimic people, and their own needs

and wishes are secondary to others because they experience a strong belief that they are responsible for others' happiness (Johnson & Connors, 1994). Moreover, their need to satisfy the "prescribed ideals for beauty" has been described as an over-compliance to cultural and social demands (Boskind-Lodhal, 1976, p. 77). Their fear of rejection is supported by a sense of self-doubt, low self-esteem, uncertainty and ineffectiveness (Katzman & Wolchick, 1984). Therefore, perfectionism and the need to excel are also observed in bulimia as an attempt to satisfy other people and to feel accepted by them. If bulimic patients present sometimes with some kind of distrust, it does not reflect a fear of intrusiveness as in anorexia but, on the contrary, a fear of rejection (Johnson & Connors, 1994).

There is no significant difference in terms of sexuality between people with bulimia and those without bulimia but their sexual activities are described as less satisfying and less responsive (Abraham et al., 1985; Abraham & Beumont, 1982).

The binge-purge cycle influences all aspects of the bulimic woman's life such as her work, her relationships, her health, and her mood. Her social life becomes gradually poorer because her preoccupation is around food and she wants to be alone for bingeing and purging because she feels ashamed and guilty. People with bulimia may reduce their social contacts because they are tired and exhausted by the binge and purge episodes (Johnson & Connors, 1994).

Summary of chapter 1

This chapter provided a background for eating disorders based on a review of the literature focusing on the definitions, descriptions, and characteristics of anorexia nervosa and bulimia nervosa. Definitions and diagnostic criteria suggest that anorexia nervosa needs to be divided into two subcategories, restricting anorexia (the low weight is maintain mainly by fasting) and bulimic anorexia (with binge-eating and/or purging features). Bulimia nervosa is characterised with binge-eating episodes followed by inappropriate compensatory methods.

There are difficulties inherent in identifying the rates of eating disorders because the prevalence can only be estimated and many sufferers are reluctant to report their symptoms to medical professionals. However, there is a consistent agreement between investigations regarding demographic characteristics which have shown that the eating disordered population is mainly female, from industrialised countries, well educated, young, and predominantly single.

The personality profile of women with eating disorders emphasised psychopathological characteristics such as low self-esteem, body-image disturbance, tendency to perfectionism and separation-individuation fears. Descriptions of anorexia and bulimia have identified specific features for each category of eating disorders.

CHAPTER II:

THEORETICAL MODELS OF THE ETIOLOGY OF EATING DISORDERS

There have been attempts to explain the etiology, development, and maintenance of eating disorders from several theoretical perspectives. A number of issues addressed by the main theoretical models are relevant to this study including: Why do some people suffer from eating disorders? What are the causes of the illness? What triggers the development of eating disorders, and what are the factors and conditions that maintain the disorders? Models of etiology, development, and maintenance of eating disorders are based on a range of perspectives that stress the importance of different factors such as biological and genetic factors, socio-cultural pressure, family and environment influence, and personality factors. This chapter presents the main theoretical models and identifies their underlying assumptions. Research conclusions and a summary of the therapeutic systems derived from each model are also discussed.

1. The biological and genetic models

The potential influence of specific genetic factors in eating disorders was mentioned in the first scientific reports as a “familial predisposition” (Gull, 1873; Marce, 1860). Ryle (1936), from his clinical experience with a large number of

sufferers, emphasised the role of the emotional vulnerability of the subjects and the neurotic tendencies in the families. Recently empirical research has been conducted on genetic factors relating to patterns of eating disorders in families, looking at several generations and involving each family member (Halmi et al., 1991; Rastam, 1992; Strober, Lamper, Morrell, Burroughs, & Jacobs, 1990; Strober, Morrell, Burroughs, Salkin, & Jacobs, 1985). The conclusions from these studies showed similarity in terms of numbers of people affected by eating disorders within their families, especially between sisters. Treasure and Holland (1989) conducted research in families where twins had developed an eating disorder. They found that in cases where one twin had an eating disorder, 55% of monozygotic twins had also developed anorexia nervosa compared with only 7% of dizygotic twins. Treasure and Holland (1989) concluded that genetic factors were present in anorexia nervosa, but with a bulimic population, this could not be demonstrated (Kendler et al., 1991). Despite these research findings, it is not clear which genetic characteristics influence the etiology of eating disorders, and the results obtained from these studies did not discriminate between genetic factors and environmental factors. The role of genetic and biological factors in the etiology of eating disorders has to be considered with caution as there is no conclusive evidence that biological factors are causes or consequences of eating disorders.

2. The behavioural and cognitive models

According to the behavioural model, anorexia nervosa is a learned behaviour which, through the reinforcement system (positive feedback from others when losing weight and negative feedback when gaining weight), has been maintained beyond the reasonable limit based on health and aesthetic norms.

Supported by concepts derived from learning theory, Lang (1965) considered eating disorders as a phobia for food associated with fear of becoming fat, and suggested that one way to reduce the anxiety attached to food would be by systematic desensitisation (Simon, 1996; Simon, Bellisle, Monneuse, Samuel-Lajeunesse, & Drewnowski, 1993). It is claimed that the phobia regresses with behavioural techniques that are based on reinforcement and punishment (stimuli-responses) and result in a new approach to food being established (Lang, 1965). However, although behavioural techniques obtain positive results during the treatment phase, the benefits are not maintained after the treatment ends. As soon as the reinforcement (reward or punishment) fades, the newly gained behaviour is not stabilised and extinguishes (Simon, 1996).

de Silva (1995) argues that the behavioural model explains the maintenance (based on positive and negative reinforcement) of the illness but does not provide any account on the origins of the behaviour. Dissatisfaction with the behavioural model led to the incorporation of cognitive concepts into the model such as thoughts, images, ideas and attitudes, resulting in the cognitive-behavioural model

(Beck, 1976). Dysfunctional and irrational cognition such as excessive preoccupation with, and distorted perception of, the body followed by changes in feeding behaviour, are described as being at the origin of eating disorders (Fairburn, 1985; Gardner & Bemis, 1982). Cognitive restructuring requires the individual to replace the dysfunctional behaviour with appropriate behaviour, and intends to lead to a readjustment of attitudes towards food. Education, adjustment strategies, relaxation, problem solving, and relapse prevention are included in most of cognitive-behavioural programmes (Jansen, 1996). The aim of such programs is to modify the individual's distorted perception and representation and, as a result, to readjust the eating behaviour. However, this technique is less successful with anorexic patients because dieting provides them with feelings of self-control and competency. Therefore, reaching a low weight becomes an achievement in itself and, in turn, becomes a reinforcement of the illness (Gardner & Bemis, 1982). The distorted belief systems of people with eating disorders cause them to reject or ignore any new information that does not fit with their dysfunctional perception and cognition. The rejection of new information supports the hypothesis that there are other factors, independent of the rational cognitive system, that play a major role in the development of eating disorders. New considerations of the model include the mutual interdependence between a patient's cognitive system and the cognitive system of the patient's social group(s) (Bandura, 1976).

3. The socio-cultural model and feminist models

Eating disorders are often defined as a cultural syndrome because the phenomenon is mainly present in western countries with a high socio-economical level of development (Maine, 1995). Studies on other ethnic groups living in western countries showed that eating disorders also occur in subjects who have moved from a country where eating disorders are not observed. This phenomenon is explained by the tendency for young migrants to adopt the cultural values of the hosting country (Nasser, 1986). In non-western countries anorexia nervosa and bulimia nervosa are rarely observed except in the most westernised classes of the original non-western society (DiNicola, 1990).

Since the 1960s there has been increasing cultural pressure for thinness as the “ideal of beauty” as presented in media such as women’s magazines. As a consequence, there has been a widespread increase in dieting as an attempt to reach the ideal level of thinness (Dolan & Gitzinger, 1994) and anorexia nervosa is much more common in societies where dieting is prevalent (Szmukler, 1995). Some particular groups such as dancers and fashion models are considered as high risk groups because they over-focus on the cultural ideals applied to body weight and shape (Gardner & Garfinkel, 1980). High rates, up to 32% for eating disorders and 7 to 9% for anorexia nervosa, have been observed in these high risk groups (Szmukler, 1995).

The media has a significant influence on identity formation by presenting role models that girls should follow in order to be accepted in society (Abraham & Llewellyn-Jones, 1997). The media also offer the ideal male image as being relatively thin, but the number of male sufferers from eating disorders is much smaller (Dolan & Gitzinger, 1994). In an attempt to explain why females are more influenced by the media, feminists suggest that expectations about women are contradictory because societal changes have been rapid and substantial over the last decades, and contribute to the development of eating disorders within the female population (Dolan & Gitzinger, 1994). The media emphasise the ideal body image much more for females than males and, therefore, more women are influenced by these messages. Until recently, women also had fewer opportunities to focus on other activities such as developing professional careers (Dolan & Gitzinger, 1994). Moreover, in an attempt to reach more freedom, independence, and autonomy in a still patriarchal society, women are struggling with contradictory expectations which maintain the common idea that, to be successful, women have to satisfy the aesthetic body ideals defined by slimness and low weight (Szmukler, 1995). The influence of cultural factors in the etiology of eating disorders through encouraging dieting, may explain the frequency of the disorders which, in turn, are maintained by the value that individuals attribute to the process of dieting (Szmukler, 1995).

It is a difficult challenge to ameliorate the negative impact of media images on eating disordered people or those at risk of developing eating disorders. One

course of action would be to change the media messages, but this is unlikely to happen because they are supported by powerful financial and political groups. A different intervention is to change individuals' vulnerability in order to prevent the media from influencing women's perceptions.

The cultural pressure on women to accord with a fashionable body image leads to dieting which is a predisposing factor to eating disorders. However, only a small percentage of the young female population develops eating disorders which means that, within a specific socio-cultural context, some individuals are more vulnerable to eating disorders than others. Therefore, the cultural pressure may be an important factor in the origin of eating disorders, but other factors need to be considered in order to understand the etiology of these disorders.

4. The family model

The family model is predicated on the notion that family systems are at the origin of eating disorders and identifies the recurrent processes of relationships in the family in order to define specific pathologies of relating (Selvini-Palazzoli, Cirillo, Selvini, & Sorrentino, 1996). Strober and Humphrey (1987) reviewed research into the role of familial factors in the etiology and development of eating disorders, and concluded from the research (Crisp, 1980; Garfinkel et al., 1983; Minuchin, Rosman, & Baker, 1978; Selvini-Palazzoli, 1974) that there are differences in family systems of interaction between families of eating disordered

people and other families. Mothers of anorexics tend to be described as more intrusive, perfectionist, overprotective, and resistant to their daughter's independence. On the other hand, fathers are seen as withdrawn, cold, passive, and moody. Anorexics appear to find it difficult to separate from the family and to build a separate identity (Stern, Whitaker, Hagemann, Anderson, & Bargman, 1981). In such cases the messages of affection are often confusing and the care is provided in an enmeshed and intrusive way (Strober & Humphrey, 1987). In a study of 60 families with an anorexic daughter, Minuchin et al (1978) identified five patterns of impairment, namely enmeshment, over-protectiveness, rigidity, conflict avoidance, and poor conflict resolution.

Less attention has been given to the study of family systems of bulimic people. Humphrey (1987) found that bulimics' familial environment was more conflictual, disorganised, depriving, and disengaged than in a normal population. In addition, the bulimics' family was less cohesive, supportive, and nurturing. The bulimics' perception of their parents was defined by a deficit in nurturance and empathy. Humphrey (1987) suggested that binge eating is equivalent to obtaining nurturance, soothing, and empathy whereas vomiting corresponds to expelling aggressiveness and frustration without any resolution.

The overall picture of families with an eating disordered daughter is mainly negative and has been so since the very first reports from Gull (1874) and Lasègue (1873). However, Eisler (1995) argues that many descriptions of families of anorexics have been made by clinicians from observation after the illness had

started and it is unclear if the parents' attitudes are a response to the problem or at the origin of it.

Demographic factors such as social class, composition and size of the family, and parental age at the time of the birth of the child have been studied widely (Eisler, 1995). The results of demographic studies show some differences compared with control groups but the influence of such factors in the etiology of eating disorders is not as salient as expected (Eisler, 1995). Traumatic events within the family have also been suggested as potential causes of eating disorders; parental loss, divorce, illness or abusive and violent experiences influence the family dynamics but there is no clear evidence that they play a major role in the etiology of eating disorders (Eisler, 1995).

Moreover, in any specific family, only some children are affected by eating disorders and not all of them, which raises questions about whether the factors are primarily familial or the result of a wider source of influence. Similarly, in relation to familial patterns, what are primary pathogenic patterns and what are secondary reactions to the illness? Is the family pattern the cause or the consequence of the disorder?

In an attempt to answer the questions of whether the familial patterns are the causes or the consequences of the eating disorders, theoretical models considering the role of individual susceptibility due to personality factors are examined in the next section. Individual susceptibility is viewed from the psychodynamic

human relationships.

“An eating disorder develops in the *context* of a particular relationship(s) but this is not the same as saying it is caused by it. However, it also becomes *part of the relationship* so that what we observe is a pattern of relationships that has evolved around the eating disorder ...” (Eisler, 1995, p. 171).

5. The psychoanalytic theory and the psychodynamic model

This section focuses on the etiology issues that link personality factors, quality of the family-child relationships, and family dynamics.

The first psychoanalytic theorists suggested that anorexia was associated with orality and unconscious oral impregnation-incorporation fantasies or to sexual fear displaced on the body (Berlin, Boatman, Sheimo, & Szurek, 1945; Thoma, 1967; Waller, Kaufman, & Deutsch, 1940). Linked with the psychosexual developmental stages of childhood, eating disorders were explained as the symptomatology of socially unacceptable repressed sexual drives. “Anorexia nervosa was postulated, developmentally, within drive theory, as showing ‘oral fixation’, with ‘anal’ character qualities” (Dare & Crowther, 1995, p. 128). In this context, eating disorders were understood as neurotic symptoms due to the re-

emergence during adolescence of oral, anal, and oedipal sexual energies repressed during childhood.

More recently, the etiological explanation of eating disorders has not been limited to the classical psychoanalytic drive theory (Sours, 1980). Object Relations theory emphasises the importance of the relationships of the self (subject) with important others (object) focusing on childhood experiences. The early life experiences of people with eating disorders take place within an environment in which they may be predisposed to develop anorexia nervosa or bulimia nervosa. The psychological environment results from interactions of individuals characterised by their genetic predisposition which includes biological, cognitive, and personality determinants. In the psychodynamic model, eating disorders are seen as the result of dysfunctional or distorted ways of relating with others.

Taking some distance from the psychoanalytic theory, Bruch (1973) turned to the developmental model and, more precisely, the perceptual and conceptual processes involved in learning theory. Bruch (1973) underlined specific deficits such as disturbances in perception and cognition towards hunger, sensation and feelings, distortion of body image, and sense of ineffectiveness. Concurrently, Kohut (1977) using Self Psychology theory and Kernberg (1976), Mahler, Pine and Bergman (1975) and Masterson (1977) all using Object Relations theory, offered new conceptualisation in the psychoanalytic field. Projective and introjective identification, development of the Self, transitional objects function, and separation-individuation process were suggested as potential issues included in the etiology of

eating disorders. These new concepts were integrated into a developmental framework, which offers a comprehensive framework for understanding eating disorders. It takes a psychodynamic perspective that considers the interpersonal disturbances in early life of eating disordered patients to be the primary focus. “Separation and Individuation” (Mahler, 1971) are key concepts in the developmental theory.

Individuation is identified as the evolution of intrapsychic autonomy, perception, memory, cognition, and reality testing. Separation refers to the intrapsychic development of differentiation, distancing, boundary formation, and disengagement from the mother” (Mahler, 1971 in Johnson & Connors, 1994, p. 89).

Mahler (1971) stated that from recurrent interactions with a “good enough” mother (or primary caretaker), the child develops the capacity to internalise the ability of self-regulation which includes the capability of identifying needs and organising adaptive responses to satisfy these needs. Successful separation and individuation refers to the capacity to manage impulses and drives, to delay gratification, and to tolerate frustration, anxiety and depression. This process is progressive during early childhood and leads to the development of “... a cohesive sense of self, object constancy, self-esteem, and perhaps even identity.” (Johnson & Connors, 1994, p. 90).

Mahler (1971) divided this progressive developmental process into three main stages. The first stage is called “autism” (normal psychological autism) and corresponds to the first month following birth during which the mother satisfies the infant’s basic physiological needs. During this first period the capacity for the infant to self regulate is virtually non-existent.

The second stage, the “symbiotic stage” (from one month to four or five months), also called a “dual unity within one common boundary”, is based on the mother's capacity to understand the cues sent from the infant and on the mother responding adequately to her child’s cues. It is during this time that the attachment occurs based on the development of a communication between the mother and the infant.

The third stage, called “separation-individuation” (from five months to three years) is divided into four subphases. “Differentiation” (5 to 10 months) occurs when the child develops increasing alertness when awake and differentiates self and others. This is followed by “practising” (10 to 16 months) when, with the locomotor maturation, the child starts to separate physically from the mother and hence the world widens. The capacity for the child to explore the world is related to the quality of the bonding with the mother, including her capacity to tolerate her child’s distancing by staying emotionally, and even physically, available. The third subphase, “rapprochement” (18 to 24 months) is a difficult stage when the child starts to develop some separation anxiety and his/her capacity to separate and individuate is experienced in a very ambivalent mode. The child wants to explore the environment but the separation from the mother creates some anxiety. The role

of the mother is to be supportive without imposing her presence. The transitional object is used at the rapprochement stage as a support to leave the mother without unbearable anxiety of losing the object of love. People with bulimia appear to use food and binge-eating as a function very similar to that of a transitional object which is a "...concrete, symbolic representation of the mother's function of soothing and comforting" (Johnson & Connors, 1994, p. 93). The use of food as a transitional object indicates that the self-regulation capacity which develops at the rapprochement phase (18-24 months) is vulnerable.

The fourth sub-phase, "object constancy" (around 3 years), is the period when the child develops more complex cognitive functions such as verbal communication, fantasy, reality testing, sense of individuality, and the consolidation of object constancy.

Failure to achieve successful separation-individuation at an early age has been found to influence subsequent development and, during adolescence, the separation-individuation issues re-emerge. Adolescents experience new needs for reorganisation of social life, personality, role, relationships, and knowledge but some of them do not have the personal resources nor the external social support for readjustment. In particular, a failure to re-negotiate the separation-individuation process at adolescence adds more psychological pressure and increases the difficulties for young people to cope with the task of gaining autonomy and independence (Alexander-Mott & Lumsden, 1994). Therefore, difficulties from the separation-individuation stage may be at the origin of the development of eating

disorders as the use of food in childhood had a psychological function for dealing with difficulties in separating from the care-giver.

Taken together the familial and the developmental models provide interesting input into the study of the origin and development of eating disorders. The family model defines personality characteristics as mainly enmeshed and rigid for mothers of anorexics, and disengaged and non-supportive for mothers of bulimics. The developmental model, more specifically Mahler's concept of separation-individuation, underlines the possibility that eating disorders arise from reactivation of earlier developmental deficits at the critical time of adolescence.

Bruch (1970) observed that mothers of anorexics are intrusive, overprotective, and domineering and therefore discourage the separation-individuation process that should reoccur at the adolescence. On the contrary, they encourage enmeshment and are inclined to relate to their daughters according to their own needs rather than their daughter's needs. The child is not considered in her own right, but is perceived by her mother as an extension of herself. Therefore the daughter's needs are not acknowledged and compliance is imposed on the young girl, which prevents the adolescent from developing a sense of independence and self-confidence. The starvation that characterises anorexia is then "... a desperate attempt to assert some autonomy, defend the fragile self against further maternal intrusiveness, and protect the fragile ego from the psychobiological demands of adulthood" (Johnson & Connors, 1994, p. 100).

In contrast, mothers of bulimics have been described as passive, disengaged, rejecting, and emotionally unavailable, even if they are physically present. This creates an insecure environment where nothing can be predictable. Therefore, food is used as a transitional object for self-comfort and compensation for emptiness and a sense of absence. Accordingly, eating disorder symptoms are a displacement of the need for autonomy, independence, and control onto food and body weight issues.

In an attempt to link the familial and the developmental models, Johnson and Connors (1994) speculated that specific differences in the mother-child relationship may lead to differentiating the type of eating disorder the adolescent will develop. On a symbolic level, bulimia is “the search for something to take” and anorexia is “the attempt to keep something out” (Johnson and Connors, 1994, p. 102). They elaborated the concept that families of anorexics are characterised by maternal *over-involvement* and families of bulimics by maternal *under-involvement*. The concept of over- and under- involvement, together with the importance for the daughter of developing a sense of security in her interactions within the family, underlines the difficulty for the child to engage into the separation-individuation process. Drawing directly on this theoretical perspective, attachment theory offers a new orientation for studying the impact of early attachment patterns on the etiology and development of eating disorders. This theory is presented in the following chapter.

Summary of chapter 2

From a literature review of the theoretical models of etiology, development, and maintenance of eating disorders, several orientations were suggested.

The role of genetic factors had to be considered with caution and there is no conclusive evidence that biological factors were primary causes or secondary consequences of eating disorders.

The cognitive-behavioural model explained the maintenance of the illness but did not provide sufficient account of the origins of the disturbed eating behaviours. The conclusion suggested that the individuals' behavioural cognitive system had to be linked with the system of the social group to which they belong.

Within social groups or communities, social pressure, through the influence of the media and its emphasis on the "ideal body image" is very strong for females. This may explain the frequency of eating disorders but does not provide a satisfactory explanation for the predisposing factors in play.

From studies of family systems, specific patterns of relationship were identified in families where daughters experienced eating disorders. Within these patterns of impairment, difficulties in achieving independence and separation seemed to play a major role for adolescent girls with eating disorders. However, in any specific family, only some children were affected by eating disorders, and therefore the role of individual susceptibilities due to personality factors had to be considered, and more particularly in the context of the Separation-Individuation process. Within that context, eating disorders were regarded as the external

symptoms of difficulties in negotiating separation and individuation from the family, and attitude to food was understood as an attempt to gain a sense of autonomy, independence, and security.

The conclusions of chapter two led to the attachment model that combines theory with empirical research and offers new perspectives for the study of eating disorders. The next chapter will explore attachment theory in detail as it will be the theoretical background for this research on early attachment and eating disorders.

CHAPTER III

ATTACHMENT THEORY

The foundations of attachment theory were laid by the collaborative work of John Bowlby and Mary Ainsworth. Researchers such as Mary Main, Inge Bretherton, Peter Fonagy, and Patricia Crittenden have revised and refined the original theory of attachment theoretically and clinically, and their work has resulted in the current understanding of attachment theory.

This chapter outlines attachment theory from the pioneering work to the more recent developments such as the “move to the level of representation” (Bretherton, 1985) and the work on adult attachment. The Adult Attachment Interview (AAI) (George et al., 1985) and its implications for research are described in detail. Crittenden’s contribution on the Dynamic-Maturational model of attachment and the *expanded* AAI (1998, 1999) for the purpose of scoring clinical samples are discussed. Recent concepts of attachment theory applied to psychopathology are introduced, followed by the more specific review on research on attachment and eating disorders, with a focus on the conclusions and limitations of the previous studies.

1. John Bowlby

Drawing upon ethology, control systems, and information theory, Bowlby (1969/1982; 1973; 1980) developed “attachment theory”. Bowlby originally trained as a psychoanalyst in the Kleinian field of the British Object Relations school. However, traditional psychoanalytic theory did not satisfy his thinking based on observation of children separated from their families, particularly after the Second World War when he worked with children who had been institutionalised. From his work, he developed the concept of “maternal deprivation”. He observed that maternal deprivation occurred when the primary caregiver was not available to the child for a certain amount of time. This referred to the physical absence of the parent but also to situations where the parent could not provide satisfactory care, affection, and support. Bowlby and his colleagues (Robertson & Bowlby, 1952) observed that children who were separated from their parents for a prolonged period of time developed signs of distress that led to major disturbances in their development . When infants were separated from their attachment figures, they responded with protest, despair, and detachment (Bowlby, 1973). Protest included calling, crying, and searching which were normal and healthy reactions but despair and detachment included passivity, apathetic resignation, and withdrawal and were signs of unhealthy development. These prolonged separations, as well as parental loss in childhood, were potentially traumatic experiences and determinants of disturbances.

Bowlby wanted to find a satisfactory explanation for his observations but at that time the main psychoanalytic model was based on drive, instinct, and fantasy, and focused on the role of the caregiver as a requirement to satisfy these instincts (such as hunger or oral satisfaction) and to reduce the tension.

Bowlby therefore distanced himself from the psychoanalytic model which did not take into account the role of the environment, and turned to the field of ethology, influenced by scientists such as Konrad Lorenz (1935), Robert Hinde (1974) and H. Harlow (1958; 1962). The framework of Bowlby's thinking became more biological and evolutionary. More specifically, he underlined the biological roots in attachment for mammal species from observation of non-human primates. New ethological concepts led Bowlby (1969/1982) to conclude that the bonding between a child and his caregiver is innate and is linked to the need for *protection* and *survival*. Instinctive innate behaviour is a sequence of behaviours that is activated by specific signals and when the system is no longer activated, the motivation ceases and so does the action as a consequence.

Bowlby first suggested that attachment behaviour is activated by danger and deactivated by safety (Bretherton, 1987). He noted that when the need for protection is not satisfied, for example when children are separated from their family, the child's development is compromised, and this can lead to neurosis and character disturbance. However, Bowlby maintained that attachment between young children and their caregivers has the function to satisfy both physiological and psychological needs, and that the emotional presence of the mother is as

important as her feeding function (Bowlby, 1973). Attachment for a child is defined by the search for *safety* and *responsiveness*. It can be summarised by two main questions: who are the attachment figures? and where are they? (for proximity seeking) in case of danger. In that sense, attachment theory focuses on interactions and the formation of a bond with selected persons or attachment figures. Despite conflicts and distancing from the psychoanalytic establishment, Bowlby supported the idea that psychoanalysis would benefit from more empirical research and that attachment theory with its connection to ethology, developmental psychology, and controlled observation, could provide scientific support for the theoretical and clinical model of psychoanalysis.

2. Mary Ainsworth

Mary Ainsworth, after her study on observation of mothers and infants (in Uganda in the 1950s and in Baltimore in the 1960s), became involved with Bowlby's research team at the Tavistock Institute. Her major input into attachment theory was the empirical testing of Bowlby's theoretical ideas (Ainsworth, 1967; 1974). Ainsworth also added important theoretical concepts from security theory to the new model of attachment. In particular she defined the caregiver, or parent, or attachment figure as a secure base from which the child will explore the environment. Maternal sensitivity, or the capacity for the caregiver to demonstrate sensitivity to the child's signals and to adequately respond to these cues, plays a major role in the development of the attachment patterns between the child and the

caregiver. While she was studying the normal development of infants and young children at John Hopkins University and the University of Virginia, Ainsworth developed an experimental research methodology called the *Strange Situation* (SS) (Ainsworth, Blehar, Waters, & Wall, 1978). The Strange Situation is a controlled structural laboratory procedure for observation of infants' behaviour (toddlers from 12 to 20 months of age) when briefly separated from, and then reunited with, their attachment figure. Through a coding system, the SS classifies the infants' attachment into categories.

The observation of the infant's reactions during brief separations and reunions with the mother, has led to the identification of three, and more recently four, categories of attachment: Secure (Group B), Insecure-Avoidant (Group A), Insecure-Ambivalent (or Resistant) (Group C) and Insecure-Disorganised/Disoriented (Group D). The pattern of attachment is defined as secure when the infant fusses a little when the mother has left the room and quickly reconnects with her during the reunion stage. After receiving some comfort from the attachment figure, the secure infant will easily settle down and resume his/her activities. In parallel, the mother demonstrates an active connection with the child, supported by her capacity to manage the situation as well as her sensitivity towards the signals sent by her infant. The insecure-avoidant pattern of attachment is characterised by an absence of signs of distress for the infant during the separation phase as well as during the reunion phase; the child does not cry and tends to ignore his/her mother. The mother of an avoidant infant will avoid physical contacts with her child and may demonstrate passivity or intrusion. In the insecure-ambivalent

(or resistant) pattern of attachment, the infant is either angry or passive when separated and demonstrates difficulties in settling down after reunion as well as going back to his/her previous activity. These signs of anxiety reflect the mother's unpredictable (sometimes warm, sometimes cold or aggressive) and unreliable responsiveness. Finally, more recently, a fourth category of attachment has been defined as insecure-disorganised/disoriented (Main & Solomon, 1986) in which the infant shows conflicted behaviours in the presence of the parent such as "freezing" or "moving away" from the parent. These reactions are observed in families where parents are the source of danger, for example when parents are neglecting or abusing. Therefore, in a situation of danger (like separation), the child experiences a paradoxical situation: to approach the attachment figure for security and, at the same time, to escape from another potential source of danger coming from the maltreating parent.

Ainsworth concluded that attachment is a system that studies how children attempt to obtain safety and security by regulating their contacts with their attachment figures. In a situation of exploration, if the attachment figure is not close by, and the child perceives potential threats, the child responds by initiating attachment behaviour such as trying to reduce the distance from the attachment figure or testing its availability.

In the original sample of her study with a normative population of infants in Baltimore, Ainsworth obtained the following distribution between attachment categories: 50% secure (B), 37% avoidant (A), and 13% resistant-ambivalent (C).

To summarise from Bowlby's and Ainsworth's work, attachment is defined as a system which is linked primarily to the search for safety and protection and for which the focus is placed on the child's confidence in a caregiver's availability and responsiveness. More broadly, attachment theory attempts to define why human beings develop strong attachment with one or a few specific caregivers. A parallel question to the first issue of attachment relationships is why, when this bonding is disrupted or threatened, does it lead to distressed reactions and, if prolonged, to psychopathology? For example, if the environment is repeatedly dangerous, typified by long separations, constant unavailability from the caregiver, neglect or abuse, why does the child respond with behaviour that is more chronic, such as constant clinging?

In the attachment model security and responsiveness have a direct impact on the capacity for the child to tolerate separation. The secure relationship is the one where the caregiver's responsiveness and availability allows the child to explore the environment and experiment at some distance from her knowing that, when needed, he/she can return to the proximity of the caregiver for safety, affect regulation, and information. In that sense, attachment theory has been partly defined as a spatial theory (Holmes, 1993). There are parallels between the concept of the attachment figure as a secure base for the infant, and the practising sub-phase of Mahler's

(1971) separation-individuation concept. In both situations the child returns to the mother for “emotional refueling” (Fonagy, 1999c, p. 602).

On the other hand, insecure attachment occurs when the caregiver is not available or is rejecting, in which case, the child will develop strategies in order to cope with this reality and the anxiety attached to it. Two different types of strategies have been observed. One is ambivalence where the child is angry or fearful, the other one is avoidance, where the child keeps his/her distance and minimises the need for care and attention. Insecure attachment therefore results from two contrasting caregiver’s attitudes to the child; under-responsiveness or intrusiveness. These are similar to maternal under-involvement and maternal over-involvement (Johnson & Connors, 1994), two factors that have been suggested as potential causes of eating disorders.

3. The concept of internal working models

A major implication of attachment theory is the view that children’s patterns of attachment are carried into adult life.

The developmental pathway followed by each individual and the extent to which he or she becomes resilient to stressful life events is determined to a very significant degree by the pattern of attachment he or she develops during the early years (Bowlby, 1988, p. 172).

Bowlby (1969/1982) proposed that these early patterns of attachment form an *internal working model*, which is a belief system representing the way an individual remembers, thinks, and describes his/her past experiences. Furthermore, Bowlby suggested that this belief system is stable across the life span. Internal working models are made of psychic representations that individuals have about themselves and their environments and represent a variety of experiences from the past, their interpretation of these experiences, and their projection in the present and into the future. The internal working models can be conceptualised as an "internal map" (Holmes, 1993) in which representations are written or encoded; all kinds of information are stored on this map and the organisation of this information is the mental representation that a person has about the world which includes himself and the other as part of the environment. In essence, "... at a broader level, the internal working model must contain multiple representations which reference not only direct experiences regarding the attachment figure, but also concepts of the self which are derived from such experiences" (Main, 1991, p. 131).

It is suggested (Marrone, 1998) that the content of the internal working models is partly conscious and partly unconscious, partly objective and partly subjective. It is made of cognitive and emotional experiences that are processed with a high level of selection in an attempt to make the representation satisfactory or tolerable. "What is stored in the internal working model is not so much an Ordnance Survey picture but an *affective* model..." (Holmes, 1993, p. 77). Several working models can coexist at the same time and they can be mutually incompatible

which creates tension and internal conflicts (Marrone, 1998). The capacity for individuals to change their working models, or the perception of themselves and their environment, plays an important part in their adaptability to any kind of new situation. Internal working models start to develop from the beginning of life (within the second half of the first year of life) and are revised and transformed throughout the life span. They are not static structures but are modified; Individuals constantly readjust the model to their new experiences, the impact of these experiences, and the interpretation of them. The main function of the working models is to select, process, and adapt the information with the purpose of correcting the reality and predicting or anticipating the future. In attachment theory, the focus is placed on the early life working models as the most important ones in the development of the personality.

Bowlby's definition (1973) embraces the main characteristics of the working model:

Each individual builds working models of the world and of himself in it, with the aid of which he perceives events, forecasts the future, and constructs his plans. In the working model of the world that anyone builds, a key feature is his notion of who his attachment figures are, where they may be found, and how they may be expected to respond. Similarly, in the working model of the self that anyone builds, a key feature is his notion of how acceptable or unacceptable he himself is in the eyes of his attachment figures (p. 203).

As Marrone (1998) emphasises, "... in attachment theory, the term (internal working model) is more specifically used to refer to a representational system of oneself in relation to significant others." (p. 72). This includes not only the representation of the attachment figure as a reliable and available person but also the perception of oneself as a lovable, worthwhile person who is likely to get the attention from the attachment figure. Similarly, Bretherton (1985) insisted on the dynamic aspect of psychic representation and noted that one of the functions of the internal model is to predict for each of us the other's reactions as well as to adjust our plans and projects in order to reach our goals.

4. The "move to the level of representation"

In 1980, Bowlby drew on information processing theory to explain the cognitive aspects of representation such as language and memory which enabled attachment theory to "move to the level of representation" (Bretherton, 1985). This was facilitated by the work of Mary Main and her colleagues (1985) on adult attachment. Main (1985) examined the relationship between parents' experiences of their own life early relationships and the attachment classification of their children. Her definition of internal working models is "the conscious and/or unconscious rules for the organization of information relevant to attachment and for obtaining or limiting access to that information, that is, to information regarding attachment-related experiences, feelings, and ideations." (Main et al., 1985, p. 92).

By introducing the Adult Attachment Interview, the concepts of internal working models and mental representations have been tested and refined by Mary Main and her colleagues (George et al., 1985).

In 1985, George, Kaplan, and Main developed the AAI to enable researchers to assess attachment representation (people's state of mind in terms of attachment) in late adolescence and adulthood. Early work with the AAI looked at analogies between patterns of attachment of parents and their infants. For example, it was found that there was a tendency for secure/autonomous parents to have secure infants, for parents with dismissing patterns of attachment to have avoidant infants, for parents with preoccupied patterns of attachment to have resistant/ambivalent infants, and for unresolved/disorganised parents to have disorganised/disoriented infants.

At present, the AAI is broadly used in research and clinical settings for the assessment of adults' attachment, independently of prediction and correlation with infants' attachment.

The Adult Attachment Interview (AAI)

The Adult Attachment Interview (George et al., 1985) provides a method for assessing the attachment of adults. The AAI is a semi-structured interview that focuses on memories and descriptions of early relationships and childhood experiences with parents, and on the effects of those relationships on adult

personality and parenting. On one hand, the focus is on identifying the participants' understanding of their past memories and, on the other hand, to probe the organisation of the discourse about their remembered instances and feelings. The interview seeks to identify differences in mental representations that are based on differences in the organisation of attachment experiences. The events themselves are not considered in their actuality or reality, and the scoring is based on the current state of mind with respect to attachment rather than the actual history and on "the coherence, cohesiveness and plausibility as the basic forms of analysis" (Main, 1991, p. 139).

The interview consists of asking questions that enable the participants to describe their childhood relationships with their parents and close family, looking at what they remember and how they understand their early interactions with their attachment figures. Interviewees are invited to choose five adjectives that describe their relationships with each parent during childhood and then to provide memories of instances (episodes) which illustrate each chosen adjective. Other questions investigate more precisely situations including distress, illness, hurt, and separation. In addition, memories of potential rejection and threat as well as loss, trauma, and abuse are explored. The participants are asked their opinion on why their parents behaved the way they did and how these early experiences may or may not have affected their adult life. Finally, some questions on the speakers' current relationships with their parents and their own children (if applicable) end the interview. For most questions, the participants are invited to recall instances and

experiences that illustrate and explain their statements as far back as they can remember. The order of the questions has to be respected because one of the purpose of the structure of the interview is to *surprise the unconscious* (George et al., 1985). The interview is audio-taped and rigorously transcribed verbatim, including silences, laughing, crying, interruptions and any other potentially useful information. The interview is always conducted in the subject's primary (first) language.

From the analysis of the patterns of the discourse and through a coding system based on the organisation of memories of childhood experiences, the AAI identifies patterns of attachment. Originally, Main and her colleagues (George et al., 1985) described three categories of adult attachment: Autonomous or secure (F), dismissing (Ds) and preoccupied (E). In the autonomous category, adults have access to childhood memories and are capable of constructing a coherent recollection of experiences, integrating both positive and negative aspects, and presenting it in a discourse that recognises the importance of attachment and is well balanced between objectivity and experience. The dismissing (Ds) category refers to non-autonomous adults who are not capable of balancing between experience and objectivity. The recollection of memories is very limited and the strategy for coping is then characterised by the need to cut off from the experience and its memory and to minimise the discussion on attachment-related experiences. If some events are related, it is usually in an idealised mode with some contradictions between the instances. The impact of the childhood attachment is mainly denied or reduced. The preoccupied (E) classification is assigned to affectively overwhelmed

adults for whom the childhood experiences are presented in a non-objective way. The discourse consists of an abundance of episodes (often angry or fearful with regard to attachment figures) presented in an incoherent semantic discourse, and the speakers seem to be unable to focus on specific questions.

Each of the main three attachment categories (Ds, F, E) are divided in several subcategories: Ds1 (dismissing of attachment), Ds2 (devaluing of attachment), Ds3 (restricted in feelings) and Ds4 (cut-off from the source of fear), F1 and F2 (somewhat dismissing), F3 (secure/autonomous), F4 and F5 (with some preoccupied features), E1 (passive), E2 (angry and conflicted), and E3 (fearfully preoccupied) (Main & Goldwyn, 1984)

Dismissing and preoccupied adults are both considered as insecure. Dismissing people tend to minimise, idealise, or avoid attachment-related experiences while preoccupied people maximise and over-emphasise their narratives on attachment-related experiences.

Autonomous (F) people value the importance of attachment whereas dismissing (Ds) people deny or devalue it and preoccupied (E) people seem to be engulfed in a still dependent attachment style with parents.

More recently, an additional fourth category has been added (Main & Solomon, 1986): Unresolved/Disorganised with respect to trauma (Utr) or loss (Ul). This category usually applies to subjects who have experienced trauma or loss of an

important attachment figure and present some psychopathology due to the lack of resolution of these traumatic experiences. Their discourses are fearful and incoherent, especially around the questions exploring loss and trauma.

As a result of more research on the Adult Attachment Interview, and more specifically with clinical populations, a fifth category called “Cannot Classify” (CC) has been introduced by Hesse (1996) and corresponds to transcripts in which patterns of both dismissing and preoccupied categories are used in a “...combination of contradictory and incompatible linguistic patternings” (Hesse, 1999, p. 398). The subject does not rely on one single strategy and alternates between different states of mind, and therefore must be classified in a separate category (CC). In a normative population, a very small proportion (7 to 10%) of individuals are assigned the CC category (Hesse, 1999), but a higher proportion has been observed in people with psychiatric disorders (van IJzendoorn & Bakermans-Kranenburg, 1996).

The scoring system of the AAI follows a method of discourse analysis and focuses on the narrative coherence and cohesiveness, the collaboration, and the *metacognitive monitoring* (Main, 1991) of the speaker. Coherence is evaluated by Grice’s (1975) maxims which define the *cooperative principle* based on *quality* (plausibility), *quantity* (complete but also succinct), *relation* (relevance) and *manner* (clarity) of the discourse. Therefore, narrative coherence is the capacity for the speaker to present his or her story in a clear, plausible, non-contradictory, and

collaborative way which demonstrates that the speaker is keen to be understood by the interviewer. The speaker's capacity to *think* while presenting his or her story in a collaborative fashion is named by Main (1991) as *metacognitive monitoring* and corresponds to "... the ability to step back and consider (one's own) cognitive processes as objects of thought or reflection..." (p. 134).

Adults who have access to the information of their childhood experiences, and are simultaneously capable of organising this information and presenting it in a clear, undistorted, and collaborative fashion are classified as secure.

A strong correlation between patterns of attachment for parents and their children has been described by Main and her colleagues (1985). However, although in a meta-analysis covering 14 studies (van IJzendoorn, 1995; van IJzendoorn & Bakermans-Kranenburg, 1996) these findings have been confirmed for the secure pattern of attachment, there is some controversy for the insecure patterns of attachment and more research needs to be conducted in this area.

Since Main's considerable contribution to the development of the Adult Attachment Interview, new theoretical and clinical concepts have been introduced, especially from the field of psychopathology: The concept of *reflective functioning* (Fonagy et al., 1995), and the *expanded system for scoring* (Crittenden, 1998, 1999).

The concept of “reflective functioning”

From the perspective of psychotherapy, and more specifically from the dynamics of the therapeutic relationship, Fonagy and his colleagues (Fonagy et al., 1995; Fonagy & Target, 1996) have contributed to the concept of metacognitive monitoring by introducing the concept of *reflective functioning*. The concept of reflective functioning defines the capacity to think or to reflect not only on oneself but also on others in terms of perceiving and understanding psychological or affective experiences. The capacity for reflective process is vital to the experience of safety and security and is identifiable in the Adult Attachment Interview discourse through the analysis of the structure and the organisation of the narrative. The capacity to reflect on states of mind, to provide a coherent, well constructed story of childhood experiences, and to regulate and integrate memories that are sometimes contradictory, are part of the reflective self-processes in the secure pattern of attachment.

In order to assess the reflective-self function in the AAI, an additional scale (RSF, the reflective-self function) has been introduced by Fonagy et al. (1991). In the AAI transcripts of people with psychopathology, the lack of reflective functioning is apparent in the discourse (Fonagy & Target, 1996). Disruptions, lapses, discrepancies, contradictions, or any kind of incoherent change in the

presentation or the organisation of the narrative are potential signs for signaling failed strategic attempts on the part of the speaker to manage the difficult experience of contemplating unacceptable memories or emotional experiences in their mind.

The AAI *expanded system* (Crittenden, 1998, 1999)

Patricia Crittenden's (1985; 1990; 1992; 1995) contribution to the attachment model covers new developments in theory and research on childhood and adulthood. New concepts on attachment patterns for endangered infants, preschoolers, school-age children, adolescents, and adults have been elaborated. Crittenden's model of attachment is based on maturational and experiential mental competence, which implies that mental functioning, in turn, potentially evolves throughout life. The focus is on patterns of "mentally processing of information that vary in the extent to which they integrate information based on cognition and affect to create models of reality" (Crittenden, 1995, p. 401). In this model, affect and cognition refer to transformations of sensory stimuli into information that can guide behaviour. Cognitive information is based on the temporal order of the stimulation (with the implicit attribution of a causal relation between temporally ordered events) whereas affect is derived from the intensity of the stimulation (with the implicit attribution of risk associated with extreme high and low intensities).

The study of psychopathology from the perspective of threats to safety and comfort has led Crittenden (1995) to extend the classificatory system of the Adult Attachment Interview. Using a *dynamic-maturational* classificatory method, Crittenden revised the AAI coding system basing it on (a) the source of information and (b) the degree of integration.

Three sources of information have to be considered: the childhood history, the representational model (procedural, imaged, semantic, episodic, and working/integrative memory systems), and the discourse markers which signal any transformation of information or discrepancy between memory systems (Crittenden, 1998, 1999).

The history of childhood events provides information on the kind of life the speaker was exposed to (particularly dangerous events and the provision of protection and comfort); the events are considered from the perspective of adaptation and coherency but not as determinants of classification. Comfort, protection, danger, rejection, involvement, role reversal, neglect, performance, deception, and sexuality are the classes of childhood events that are considered in the dynamic-maturational classificatory method.

The speaker's representational model is assessed in each memory system: procedural memory (dysfluences of speech [i.e., discourse markers], expressed affect, and how the speaker engages with the interviewer), imaged memory (through the quantity, quality and function of images in the discourse), semantic memory (capacity for differentiation between temporal order, causes, responsibilities, etc), and episodic memory (event-specific integration of affective

and cognitive information). The degree of integration is analysed through consistency among the different representational models that appear in the discourse of the speaker.

For Crittenden, “danger” (e.g., separation, loss, trauma and abuse) is an important factor to consider in analysing the AAI and more particularly the strategies and behaviours put in place by the speaker for self-protection and safety. Sexuality and reproduction are also included into her system, as they play a major role in adolescence and adulthood, and therefore, any distortion of sexual references are analysed for the scoring of the AAI.

Crittenden (1998, 1999) states that each pattern of attachment, including the most extreme compulsive dismissing and obsessive preoccupied patterns, is a strategy to reach a solution for a problem, and that the dynamic maturational system considers the organisation of each specific attachment pattern as an attempt to respond protectively to continuing exposure to that type of situation. “Over the course of two decades, I have come to conceptualize attachment as a theory about protection from danger and the patterns of attachment as strategies for predicting and protecting oneself from danger” (p. 11). The strategies to insure self-protection against potential (real or imagined) danger rely on cognition and affect. In Crittenden’s scoring system, cognition and affect are analysed not only for their adaptive quality but also in their transformation through maturation and experience. Therefore, there may be changes in individuals’ attachment patterns, depending on their current level of psychological maturation and their experience of life.

Although Crittenden's coding system is partly similar to the original Main and Goldwyn's (1984) system, especially in retaining the three main Ainsworth categories (balanced, dismissing and preoccupied), major differences and additions have been made to Main and Goldwyn's system. Firstly, there is the reintroduction of the original labelling of categories used by Ainsworth for children's patterns of attachment observed in the Strange Situation: A for dismissing, B for balanced, and C for preoccupied. Secondly, there is the addition to the dismissing and the preoccupied categories of (a) several subcategories, respectively called the *compulsive dismissing* (A3-6 or A+) and the *obsessive preoccupied* (C3-8 or C+) subpatterns, (b) patterns that include combinations of patterns (A/C and AC), and (c) modifying conditions of all patterns (U for lack of resolution of loss and trauma, Dp for Depressed, DX for Disorganised, R for Reorganising, and IO for Insecure Other). These inclusions have added more precision in the specificity of each category of attachment, and as a result, more precision on the functioning of each attachment type.

Thirdly, Crittenden's system of scoring extends the analysis of the AAI from three to five memory systems, adding the procedural and imaged memory to the original semantic, episodic and the integration of these two memory systems. The procedural memory in particular adds information on the way the speaker engages with the interviewer, which has implications for treatment as the procedural memory system informs the therapist on the style of transference the patient may develop in psychotherapy.

For further information on characteristics applying to subcategories, combination of patterns (Appendix B), and modifying conditions, see Crittenden's (1998, 1999) manual on the Dynamic-Maturational Approach to Analysing the Adult Attachment Interview.

In sum, with all these addition and revision in the scoring system, the dynamic-maturational approach (Crittenden, 1998) has expanded the system from “normal functioning in safe contexts to pathological functioning in dangerous contexts” (p. 2, chapter 10). This includes populations with psychiatric disorders.

As emphasised previously in this chapter, attachment theory and methodology were originally derived from, and applied to, a normative population but it is now largely accepted (Crittenden, 1995; Fonagy, 1999a), that attachment research can be applied beyond the normative population, and more specifically to clinical groups covering psychopathology. Indeed, it is Crittenden's position that attachment is critical to survival in endangered populations and merely interesting in safe populations (verbal communication).

5. Attachment and psychopathology

Over the last 10 years research has been conducted on patterns of attachment in major psychopathological disorders, using the AAI as a measure of attachment

strategies or working models (Dozier, Stovall, & Albus, 1999). The findings of research that studied the links between attachment-related experiences in childhood and psychopathology in adulthood demonstrate that psychopathology is highly associated with the insecure attachment classification and that loss and trauma are highly associated with the Unresolved category. In a study on psychopathology, Fonagy and his colleagues (1996) reported that individuals classified as secure accounted for nine of the 82 people in the psychiatric sample but for 50 of the 85 in the normative control group. Comparing attachment classifications between normative samples and clinical samples in a meta-analysis, van IJzendoorn and his colleagues reported the following distribution between categories of attachment: 58% secure, 24% dismissing, and 18% preoccupied for a normative population (based on 584 AAI) against 13% secure, 41% dismissing, and 46% preoccupied for a clinical sample (based on 439 AAI). When the U (Unresolved) and CC (Cannot Classify) categories were included, the results became: 55% secure, 16% dismissing, 9% preoccupied, and 19% Unresolved or Cannot Classify for a normative population against 8% secure, 26% dismissing, 25% preoccupied, and 40% Unresolved or Cannot Classify for a clinical sample (van IJzendoorn & Bakermans-Kranenburg, 1996).

6. Attachment and eating disorders

The literature supports a clear relationship between attachment and eating disorders, with a very high proportion (96-98%) of anxious attachment for people who have an eating disorder (Amstrong & Roth, 1989; Chassler, 1997; Heesacker & Neimeyer, 1990; Kenny & Hart, 1992; Lavik, Claussen, & Pedersen, 1991). The anxious attachment was associated with separation difficulties (Amstrong & Roth, 1989), Object Relations disturbances and social incompetence (Heesacker & Neimeyer, 1990), as well as fear of abandonment and difficulties with autonomy (Kenny & Hart, 1992; Lavik et al., 1991). In order to assess the attachment styles of people with eating disorders, these studies used a range of instruments such as the Separation Anxiety Test (Hansburg, 1980a, 1980b), the Bell Object Relations Inventory (Bell et al., 1986), the Parental Attachment Questionnaire (Kenny, 1990), and the Attachment History Questionnaire (Pottharst, 1990). Salzman (1997) in a study on ambivalent attachment in female adolescents observed that, for 11 subjects classified from the Adolescent Attachment Interview (Salzman, 1996) with an ambivalent attachment, 7 subjects had experienced periods of anorexia. Although these studies demonstrated the impact of attachment disruptions on eating disorders, the results showed no significant difference between categories of eating disorders in terms of perception of parental relationships (Amstrong & Roth, 1989; Wonderlich & Swift, 1990).

O'Kerney (1996) criticised the methodological weaknesses of most of these studies. The sample selection limited the generalisation of the results, the definition of eating disorders lacked methodological rigour, self report testing was subject to bias, and

other kinds of measures would have added more strength to the results. Moreover, the measures used in these studies did not provide information on the specificity of the anxious attachment that characterised people with eating disorders.

More recently, studies (Cole-Detke & Kobak, 1996; Fonagy et al., 1996; Candelori & Ciocca, 1998) have used the Adult Attachment Interview (AAI) as the instrument for assessing attachment styles of people with eating disorders. Results from these studies confirmed insecure attachment and also provided classification into categories of attachment. Cole-Detke and Kobak's (1996) administered the AAI to young women (mean 18.6 years) suffering from bulimia and/or depression. The AAI was scored with the Q-set (Kobak, 1993) and the results for attachment classification for his sample of 12 bulimic women were 3 secure, 8 dismissing and 1 preoccupied. From these results (Cole-Detke & Kobak, 1996), it was suggested that bulimics use *deactivating strategies*, defined by a low expectation of parental availability and nurturing. The avoidance in the discourse as well as the denial of feelings have a self-protective function against the uncertainty of the parent's availability. However, when depression was associated with bulimia, the results were reversed and 61% classified as preoccupied. In their conclusion, Cole-Detke and Kobak suggested that eating disorders should be understood as an attempt to displace attention from feelings onto the body and to divert distress from inside to outside.

Different results were found by Fonagy and his colleagues (1996) who also used the AAI in a study on attachment and psychopathology. With a sample of 14 young women with eating disorders, 9 women were classified preoccupied, and when the fourth

category U was considered, 13 out of the 14 women were classified Unresolved with regard to trauma or loss.

Although there was a general agreement on the high proportion of insecure attachment for women with eating disorders, there was less clarity on whether the insecure patterns of attachment were dismissing or preoccupied. Moreover, Cole-Detke and Kobak, as well as Fonagy did not differentiate between types of eating disorders.

Candelori and Ciocca (1998) used the adolescent version of the AAI (Candelori & Tambelli, 1992) with a sample of 36 young Italian in-patients (age range from 13 to 24 years) who were admitted to an eating disorders unit in a hospital. They found that 83% of their sample were classified insecure. When different eating disorder categories were considered (categories defined by DSM-IV criteria), restricting anorexics were classified dismissing whereas bulimics and bulimic anorexics were mainly preoccupied. This provides some evidence that there may be differences in attachment styles between different types of eating disorders.

Some research has been conducted on the more specific relationships between fathers and their eating disordered daughters. Humphrey (1987) concluded that bulimic girls had significantly less friendly relationships with their father than a control group of non-eating disordered adolescent girls and that the quality of their interactions was characterised by more hostility. In a study (Palmer et al., 1988), using the Parental-Bonding Instrument (Parker et al., 1988), bulimics also described their father as being less caring than in a control group. Although the restricting anorexics also experienced some tension with their fathers, their relationships were generally more positive

compared with the bulimic group (Humphrey, 1987). Bulimic anorexics saw their father as less nurturing than restricting anorexics (Wonderlich & Swift, 1990).

Research on attachment disruption and eating disorders has concluded that people with eating disorders were characterised by insecure attachment but it was unclear whether the patterns of attachment were dismissing or preoccupied. Apart from Candelori and Ciocca's study (1998), the lack of differentiation between types of eating disorders did not provide information on specific attachment classifications for specific eating disorders. For most studies, the sample sizes were small and presented limitations for statistical analysis.

These conclusions highlight the need for more research. In a recent review (Ward et al., 2000) on attachment research in eating disorders, the authors suggested to use "refined instruments" (p. 35) for testing the attachment classification in association with the eating disorder subcategories, and also to study more specific aspects of attachment.

The current study, which focuses on a comparison between anorexia nervosa and bulimia nervosa, aims to address some of the unresolved issues, and to determine (a) the attachment classifications in relation to eating disorders, (b) whether or not the attachment classifications differ with types of eating disorders, and (c) the more specific characteristics of early attachment representations to fathers.

CHAPTER IV

METHODOLOGY

This chapter presents the hypotheses and the related research questions of the study as well as the research measures used for data collection, and the procedures followed.

1. Hypotheses, related research questions, and subsidiary research questions

Hypothesis 1: It is predicted that when eating disorders occur in adolescence or adulthood, the attachment classifications will show a higher proportion of insecure attachment than secure attachment.

Research question 1: Within a sample of women with eating disorders (all combined), what is the distribution of different attachment categories?

Hypothesis 2: It is predicted that there will be a relationship between the types of eating disorders and the attachment classifications: women with restricting anorexia will be classified dismissing and women with bulimia and bulimic anorexia will be classified preoccupied.

Hypothesis 3: It is predicted that women with eating disorders will choose “negative adjectives” to describe their childhood relationships with their father, and that the number of women choosing negative adjectives will be higher for bulimia and bulimic anorexia than for restricting anorexia.

Research question 2: Are there differences between types of eating disorders for the answers to the AAI question: To which parent (mother vs. father) did you feel the closest when you were a child?

Subsidiary research questions

Research question 3: Are there differences in the links between eating disorders categories, attachment styles, and treatment for the self-referred participants?

Research question 4: Is there a relationship between the age of the participants and their attachment style?

Research question 5: Is there a relationship between the length of treatment undertaken by the participants and their attachment style?

2. Participants

The total sample consisted of 62 Anglo-Australian women who were diagnosed with eating disorders according to DSM-IV criteria. The choice of studying an only female sample was based on the gender rate for eating disorders of one man for ten women. However, the current study could be replicated with a sample of males, although access to participants may present practical difficulties.

Participants were drawn from three different sources: hospitals, private practitioners, and advertising.

The largest source of referral for the study came from hospitals (40 women) and comprised: (a) 21 in-patients from the Eating Disorders Unit at a private hospital in Perth, (b) 1 in-patient from the Psychiatric Unit at a public hospital in Perth, (c) 6 in-patients from the Psychiatric Unit at a public hospital in Brisbane, and d) 12 out-patients from the Eating Disorders Unit of a private hospital in Brisbane.

Eight women were referred to join the study by private clinical practitioners (five psychologists and three psychiatrists) working with eating disorders patients. The private practitioners had been approached personally by the researcher and informed about the research project.

The third source for participants was community advertising. An article, explaining the research project and inviting women who were currently experiencing eating disorders to participate, was published in a community

newspaper (see Appendix C1). Further, an information flyer was distributed on University campuses in Perth (see Appendix C2). Thirty-four women made a contact by telephone, offering to participate in the project. After assessment using the DSM-IV criteria for eating disorders, eight women who responded to the newspaper article and six who responded to the flyer were included in the study. The other people who made contact were not selected because the selection criteria were not currently fully met, and therefore they were not suitable for inclusion in this research project.

3. Research measures

Eating Disorders Assessment Interview (EDAI)

The EDAI (see Appendix D) is a short version of the “Diagnostic Survey for Eating Disorders - Revised” (DSED-R) (Johnson, 1984; Love & Johnson, 1984) which is usually used in the initial consultation for patients with anorexia and bulimia. The DSED-R is a self-report assessment questionnaire for diagnosis, treatment recommendations, and clinical purposes. It is an extensive survey of eating disorders, divided into twelve sections covering information on demographic factors, weight, dieting, body image, medical history, and family dynamics (for more information on the DSED-R, see Johnson, 1984). The integral version of the DSED-R is usually used for detailed assessment that gives information beyond the need for the current study; for example the impact of eating disorders on the quality

of relationships, sexual life, drug and/or alcohol problems and life adjustment.

Therefore, the DSED-R was revised and selectively reduced to a shortened version that covers the diagnostic criteria for eating disorders.

The most universal diagnosis of eating disorders in clinical practice is made using the criteria outlined in the American Psychiatric Association's *Diagnostic and Statistical Manual of Mental Disorders* (DSM-IV, 1998) currently in its fourth revision. For the current study, each question of the Eating Disorders Assessment Interview was related to the DSM-IV criteria for eating disorders in order to classify the participants between bulimia, restricting anorexia or bulimic anorexia.

For example:

- Criterion B (DSM-IV) for anorexia nervosa: "Intense fear of gaining weight or becoming fat, even though underweight" was assessed with the question 16 of the EDAI: "how much do you agree with the statement 'I have an intense fear of becoming fat, which does not lessen as I lose weight', not at all, somewhat, moderately, very much or extremely?"
- Criterion D for anorexia nervosa: "In postmenarcheal females, amenorrhea, i. e., the absence of at least three consecutive menstrual cycles" (p. 545), was assessed with the EDAI questions such as "Do you menstruate?", "If not, when did you have your last periods?" and "Have you ever stopped menstruating for at least 3 months?" . For this

criterion, it was also investigated if the participant was taking a hormonal treatment.

- Criterion C for bulimia nervosa: “The binge eating and inappropriate compensatory behaviours both occur, on average, at least twice a week for three months” was assessed by question 30 in the EDAI: “Over the last 3 months, what has been the average number of times you have engaged in the following behaviours per week: binge eating, vomiting, use of laxatives, fasting or skipping meals for a day?” and question 32 in the EDAI: “how often do you currently exercise (including going on walks, riding bicycle, swimming, going to the gym, etc), per day and per week?”

Appendix E shows how each diagnostic criterion was assessed by the EDAI.

Questions were added to obtain (a) demographic information such as age, marital status, level of education and living arrangement, (b) information on treatments (and their specificity), hospitalisation, and its duration (if applicable), and (c) the onset as well as the duration of the eating disorders.

The EDAI was conducted by the researcher as a semi-structured interview with each participant, who was consequently classified with anorexia nervosa (restricting or bulimic) or bulimia nervosa.

The Adult Attachment Interview (AAI)

The AAI (George et al., 1985) (Appendix F) was used to classify the participants according to their attachment categories. The interview consists of asking questions that enable the participants to describe their childhood relationships with their parents and close family, to ascertain what they remember and how they understand their early interactions with their attachment figures. Participants are invited to choose five adjectives which describe their relationship with each parent during childhood and then to provide memories of instances (episodes) which illustrate each chosen adjective. Some questions investigate more precisely situations including distress, illness, hurt and separation. In addition, memories of potential rejection and threat as well as loss, trauma and abuse are explored. The participants are asked why their parents behaved the way they did and how these early experiences may or may not have affected their adult life. Finally some questions on the participants' current relationships with their parents and their own children (if applicable) end the interview. For most questions, the participants are invited to recall instances and experiences that illustrate and explain their statements as far back as they can remember.

Each AAI was audio-taped and then transcribed verbatim including every detail such as silences, stuttering, cries, laughs and facial expression. All these elements of verbal and non-verbal expression are required for scoring purposes.

Reliability and validity of the AAI

Bakermans-Kranenburg and van IJzendoorn (1993) tested the reliability of the AAI and found that “As long as adequate training is provided, the semi-structured AAI appears to be robust against interviewer effects” (p. 8) and that “78% of the AAI classifications remained stable across a two month period” (p. 9).

In their study on the discriminant validity of the AAI, Crowell and his colleagues (1996) established a “significant degree of discriminant validity for the AAI in an important population” (p. 2596). They concluded that “these results substantially strengthen the case for interpreting the AAI as an attachment-related measure” (p. 2584).

van IJzendoorn (1995) reviewed several studies on discriminant and predictive validity and concluded that “the qualitative, semi-structured AAI, therefore, appears to meet stringent psychometric criteria, not only in terms of reliability but also in terms of discriminant and predictive validity” (p. 9).

For Crittenden’s (1998) dynamic-maturational approach to scoring the AAI, as the system is more recent than Main and Goldwyn’s (1984) system, reliability and validity are currently being tested. Nevertheless, preliminary findings (Hughes, 1997) suggested that the dynamic-maturational system of scoring is a valid tool to clinically differentiate groups with psychopathology.

The AAI scoring system used in the current study

The choice of the scoring system was carefully considered and it was decided, for the current research, to score the AAI transcripts with Crittenden's (1998) scoring system rather than Main and Goldwyn's (1984) system. By offering a broader range of subcategories and combined dismissing/preoccupied categories, Crittenden's system has extended the AAI classificatory system to clinical populations. These extensions have proved to be useful as people with mental illnesses usually have more complex attachment patterns. In Main and Goldwyn's system, the transcripts of clinical samples showing complex patterns of attachment were usually assigned the "Cannot Classify" (Hesse, 1996) category.

Agreement between scorers

Two coders, successfully trained and certified by Dr Patricia Crittenden, independently classified the AAI. These coders were not given any information about the subjects. For the first 44 interviews, the inter-scorer reliability reached 86.3% (38 transcripts out of 44). Six out of these 44 interviews for which an agreement could not be reached were submitted for scoring to a third certified independent scorer. Consensual agreement was still not reached for four of these interviews which consequently were sent to Dr. Patricia Crittenden who provided the final scoring.

After 44 transcripts had been scored, one of the two independent scorers became unavailable for scoring and, considering that the inter-scorers' level of agreement had reached 86.3%, it was decided that the remaining scorer would continue the rating on her own with her reliability tested randomly by Dr. Patricia Crittenden. Nine of the 18 remaining transcripts were subsequently scored by Dr Patricia Crittenden, and reached agreement with the independent scorer.

4. Procedure

Potential participants who indicated interest in volunteering for a research study on eating disorders and early attachment were contacted by the researcher and an appointment was organised. The objectives, purposes and implications of the research as well as the extent of their participation were explained on the information sheet (Appendix G1) and the consent form (Appendix G 2). Subsequent questions from the potential participants were considered and answered directly by the interviewer (researcher). The participants were informed of their freedom to accept or decline the invitation to be included in the research project, and the information sheet specified clearly that their decision would not influence in any way their current or future treatment. They were fully assured that all the information they would provide would be fully confidential and would be used only for the research, unless they specified otherwise.

Firstly, the Eating Disorders Assessment Interview (EDAI) was administered by the researcher. In the first section of the interview, general demographic information including age, marital status, living arrangement and level of education was sought. In the second section of the interview, eating patterns (based on DSM-IV criteria and the Diagnostic Survey for Eating Disorders – Revised (Johnson and Connors, 1987) were probed, and the information was used to classify the sample into different eating disorders categories: anorexia nervosa (restricting or bulimic) and bulimia nervosa. In addition to the Eating Disorders Assessment Interview for diagnostic classification of eating disorders, the participants' primary therapists provided their own diagnosis (performed at the admission to hospital) and this information was available for 44 participants. There was 100% agreement between the EDAI as conducted by the researcher and the primary therapist's assessment.

Secondly, following this diagnostic interview, the Adult Attachment Interview (George et al., 1985) was conducted by the researcher who has been extensively trained with the AAI. The interviews were audio-taped and rigorously transcribed verbatim, including silences, laughing, crying, interruptions and any other useful information. For confidentiality reason, and in accordance with the Ethics regulations, all the names of persons and places were changed. The transcripts were then given for scoring to two independent scorers who were not informed about the participants.

In-patient subjects (n = 28) were interviewed at the hospital where they were treated. Similarly, the participants from Brisbane (n = 18) were interviewed at the hospital where they were treated as in or out-patients. Participants who were referred by private practitioners (psychologists and psychiatrists) or who volunteered from advertising in the local community newspapers and from a flyer at a university campus were interviewed in the private practice room of the researcher. In these cases \$20 was allocated to the participants in order to cover the cost of their travel to the researcher's office.

The total time spent with each participant varied between one and two hours, depending on several factors: (a) the length of the interviews (an average of 20 minutes for diagnosis interview and an average of 45-60 minutes for the AAI), (b) the amount of additional information on the research requested by the participants (an average of 10-15 minutes), and (c) the debriefing time (an average of 10-15 minutes).

Ethical considerations

Prior to the beginning of the research, ethical considerations were carefully considered. As the Adult Attachment Interview invites the subjects to remember and discuss memories of their childhood, it has the potential to affect the participants' emotional state and re-connect them with distress arising from early life experiences. In a study using the AAI with a severely psychopathologically

disordered population, Dozier (1991) specified to the interviewees that they could interrupt or terminate the interview at any point if they felt distressed, but none of them requested to stop the interview or to get additional counselling.

For the current study it was decided, in accordance with the Ethical Committees' requirements from Edith Cowan University and from the hospitals which had agreed to be involved in the research project, that after the AAI had been administered, a debriefing time would be offered to the participants. During the interview some participants showed expression of emotions such as crying or withdrawing in silence for a few minutes, but none of them requested to interrupt or to terminate the interview even after this had been offered by the interviewer. It was agreed with the Ethics Committees from the university and from the hospitals involved in the research that, in order to maintain clear boundaries between research and treatment, in case of distress following the administration of the AAI, the participant would not get counselling from the researcher but would be given the name of persons to contact for further support. Only one participant, who was hospitalised at the time of the interview, requested an additional debriefing session with her primary therapist at the hospital where she had been admitted. Many subjects expressed their personal interest in the results of the research and requested to be informed when the final dissertation is available.

The issue of confidentiality was also explained to the participants. The code of confidentiality that are part of the ethical requirements of the Australian

Psychological Society (APS) and the Psychologists Board of Western Australia was applied to the information obtained from the participants for the current research. The same code of confidentiality was applied by the two independent scorers, who were clinical psychologists registered with the Psychologists Board of Western Australia, and members of the Australian Psychological Society.

Moreover, in order to respect their privacy, during the interviews participants were given alias names, and all the names of people and places that the participants mentioned in the interview were changed in the transcripts. After transcription of the recorded interviews, the audio-tapes were deleted, and the interviews were identified by a number. All the data were stored in a locked filing cabinet, and the electronic versions were protected by an access pin number that was only known by the researcher.

It was also mentioned to the participants that the information they gave in the Eating Disorders Assessment Interview and in the Adult Attachment Interview was used only for the purpose of the research project, and that no information would be passed onto the treating medical or psychological teams.

Participants were also informed of their right to withdraw at any time from the project, as well as the guarantee that their withdrawal would not influence their continuing medical care.

Selection of scorers.

The Adult Attachment Interview requires extensive training, for its administration and for its scoring. Moreover, the AAI is considered to be a “new” research measure and is subject to adjustment and improvement. Therefore, the complexity of the scoring system is constantly increasing and requires that training be regularly up-dated.

In order to be certified scorers, the candidates have to be extensively face-to-face trained (several weeks training, including exercises and practice between each of the weeks). At the end of the training, the candidates have to pass the standardised reliability test and succeed it at a level of agreement of at least 85%.

For this research the scorers and the author were clinical psychologists who have been extensively trained by Dr. Patricia Crittenden. A first two-week training was undertaken in 1996 during which Dr. Patricia Crittenden taught the Main and Goldwyn’s (1984) Adult Attachment Interview scoring system for a normative population. A second two-week training was undertaken in 1998, and focused on the revision of the original system and the addition of the scoring system applying for a clinical population. This training included the broader range of sub-classifications and additional techniques for the analysis of the discourse (see chapter III). Finally, in 1999, a three day course on the “Advance Adult

Attachment Interview” focused on specific aspects for scoring the AAI of clinical populations.

The scorers and the researcher successfully passed the standardised reliability tests and have extensive experience for the administration and the scoring of the AAI for other research and clinical practice.

Design

The research used a group differences design looking at differences relating to attachment classifications. The independent variables were the eating disorders categories (bulimia, restricting anorexia, and bulimic anorexia) and the dependent variables were the attachment categories, and negativity towards the father. Data collected were categorical data.

CHAPTER V

RESULTS

The program SPSS – version 9.01 for Windows was used to analyse the data. As categorised data were used, Chi-square tests were performed for each hypothesis and research question. The first section of the chapter presents the results on eating disorders and demographic characteristics, followed by a second section on the results on attachment classifications. A third section explores further investigations on potential relationships between specific demographic characteristics and attachment classifications.

1. Eating disorders and demographic characteristics

The EDAI provided information on the eating disorders characteristics and the demographic characteristics of the sample.

Eating disorders characteristics

The sample consisted of 62 Anglo-Australian women who were diagnosed with eating disorders according to DSM-IV criteria.

Although the differences between types of eating disorders are rarely “clear cut” and the rates for the partial syndrome is five time more frequent than the full

syndrome of anorexia nervosa and bulimia nervosa (Dancyger & Garfinkel, 1995), strict diagnostic criteria (DSM-IV) were applied to the selection of the sample in order to get “pure” groups for comparability of results. The two main eating disorder categories were anorexia nervosa and bulimia nervosa; anorexia nervosa was divided into two subcategories, restricting anorexia and bulimic anorexia. Twenty-six participants (41.9%) were currently suffering from bulimia nervosa and 36 women (58.1%) from anorexia nervosa. Within the group with anorexia nervosa, 20 women (55.5%) were restricting and 16 women (44.5%) had bulimic features and therefore were categorised as bulimic anorexics. The distribution is summarised in Table 1.

Table 1
Distribution of Participants by Eating Disorder (E.D.) Categories

E.D. categories	Number of participants
Bulimia	26
Anorexia (restricting)	20
Anorexia (bulimic)	16
Total	62

By definition, women with bulimia nervosa are characterised by regular binge eating followed by inappropriate compensatory methods to prevent weight gain. Therefore, all the participants with bulimia nervosa satisfied the criteria of

binge eating at least twice a week for three months. The compensatory methods to prevent weight gain were mainly purging (92.3%) which included self-induced vomiting (84.6%) and/or misuse of laxatives (23.1%), but also fasting (11.5%) and/or excessive exercise (15.4%).

The number of women satisfying the criteria for anorexia nervosa was 36; 20 restricting and 16 bulimic anorexics. Women with restricting anorexia nervosa do not engage in binge eating or purging but maintain their weight through fasting or excessive exercise. This was the case for the sample of 20 women with restricting anorexia. Women with bulimic anorexia nervosa have regular binge eating episodes followed by inappropriate compensatory behaviours. However, some individuals do not binge-eat but purge, even after consuming a small amount of food. Within the subcategory of bulimic anorexia, 69% had regular episodes of binge eating followed by purging but another 31% had only purging episodes even though they did not binge. The purging methods were mainly vomiting (87%), sometimes associated with misuse of laxatives (37%) or misuse of laxatives only (12.5%). Almost half of the sample of anorexics (44.4%) was engaged in excessive exercising (more than 2 hours a day of intense physical training such as jogging, gym, cycling, swimming, etc). Eighty-six percent of women with anorexia admitted to skipping meals regularly, sometimes over an extended period of time. This group included the entire restricting subcategory for which fasting is the main feature, and 69% of women with bulimic anorexia who, between their binge eating

episodes, skipped meals in an attempt to compensate for the large food intake during the binges.

Table 2 presents the types of inappropriate compensatory methods for bulimia and bulimic anorexia.

Table 2

Inappropriate Compensatory Methods

Compensatory methods	Eating disorders	
	Bulimic Anorexia	Bulimia
Binge eating	69%	100.0%
Purging	100%	92.3%
Vomiting	87%	84.6%
Misuse of laxatives	37%	23.1%
Fasting or dieting	69%	11.5%
Excessive exercise	56.2%	15.4%

Age of the participants

The age distribution of the sample ranged between 18 and 45 with a mean age of 24.61 (standard deviation SD 7.08). Seventy-one percent of the sample was less or equal to 25 years of age and more than 90% less or equal to 30 years, which corresponds to the demographic fact that eating disorders affect primarily young

people. The distribution of age categories by eating disorder categories is displayed in Table 3.

Table 3
Distribution of Age Categories by ED Categories

Age categories	Eating disorders	
	Anorexia	Bulimia
Under 21	33.3	34.6
21 to 25	36.1	38.5
26 to 30	16.7	23.1
over 30	13.9	3.8
Total	100.0%	100.0%

Marital status

Seventy four percent of the sample were single and had never been married or in a long-term (at least one year) relationship with a partner, and 26% were in a relationship with a partner (de facto or married).

The relationship between marital status and age is presented in Table 4.

Table 4

Marital Status by Age Categories

Age categories	Marital status	
	Single	With partner
Under 21	45.7	0.0
21 to 25	32.6	50.0
26 to 30	13.0	37.5
Over 30	8.7	12.5
Total	100.0%	100.0%

Level of education

Twenty-five (40.3%) women were engaged in or had finished secondary school and 37 (59.7%) women were engaged or had completed tertiary education. The secondary level corresponds to year 12 in an accredited institution, and the tertiary level corresponds to studies undergone in tertiary institutions, with a requirement of having achieved secondary level up to year 12. There was no major difference in the level of education by eating disorders categories. The results are displayed in Table 5.

Table 5

Level of Education by ED Categories

Level of education	Eating disorders	
	Anorexia	Bulimia
Secondary	44.4	34.6
Tertiary	55.6	65.4
Total	100.0%	100.0%

Twenty eight participants (45.2%) were students, most of them at the tertiary education level, which can be linked to the relatively low level of age of the sample (71% was less than 25 years old).

Referral of participants

As shown in Table 6, the referral system was primarily from hospitals (64.5%) for the total sample. When the referral system was considered by eating disorder categories, it shows a higher proportion of anorexic women (80.6%) than bulimic women (42.3%) coming from hospitals. On the other hand, a higher proportion of bulimic women (38.5%) than anorexic women (11.1%) volunteered from the advertising.

Table 6

Distribution of Sources of Referral by Eating Disorder Categories

Sources of referral	Eating disorders		
	Anorexia	Bulimia	Total
Hospitals	80.6%	42.3%	64.5%
Private practitioners	8.3%	19.2%	12.9%
Advertising	11.1%	38.5%	22.6%
Total	100.0%	100.0%	100%

Hospitalisation and treatment

At the time of the interview, 28 women (45.2%) were hospitalised and 49 (79%) were receiving psychological treatment as in- or out-patients. The proportion of women receiving treatment against the proportion of women not receiving treatment is much higher for anorexia nervosa (91.7%) than bulimia nervosa (61.5%). See Table 7.

Table 7

Hospitalisation and Treatment by ED Categories

Treatment	Eating disorders	
	Anorexia	Bulimia
Hospitalised	50.0%	38.5%
Psychological treatment	91.7%	61.5%

2. Attachment classifications

The AAI provided a classificatory system into categories of attachment.

Attachment and eating disorders

Hypothesis 1 predicted that: The attachment classifications will show a higher proportion of insecure attachment than secure attachment for women with eating disorders.

The results showed that amongst the sample of 62 women with eating disorders (all types combined), 60 presented an insecure attachment and only 2 presented a secure attachment. This confirms the first hypothesis (see Table 8).

Table 8

Distribution of Secure vs. Insecure Attachment Classifications

Participants	Attachment classifications	
	Secure	Insecure
N = 62	2	60
Percentages	3.2%	96.8%

Research question 1: What is the distribution of attachment categories among this sample of women with eating disorders (n = 62)?

The distribution between different types of insecure attachment was 18 dismissing (A1-6), 27 preoccupied (C1-8), and 15 combined dismissing/preoccupied (A/C or AC). Two participants were classified secure. An outline of attachment classification is presented in Table 9 and Figure 1.

Table 9

Attachment Classifications

Participants	Attachment classifications			
	Secure (B)	Dismissing (A)	Preoccupied (C)	A/C and AC
N=62	2	18	27	15
Percentages	3.2%	29.0%	43.5%	24.2%

(For comparison of the results on attachment classifications between Main and Goldwyn’s system and Crittenden’s system, see Appendix H.)

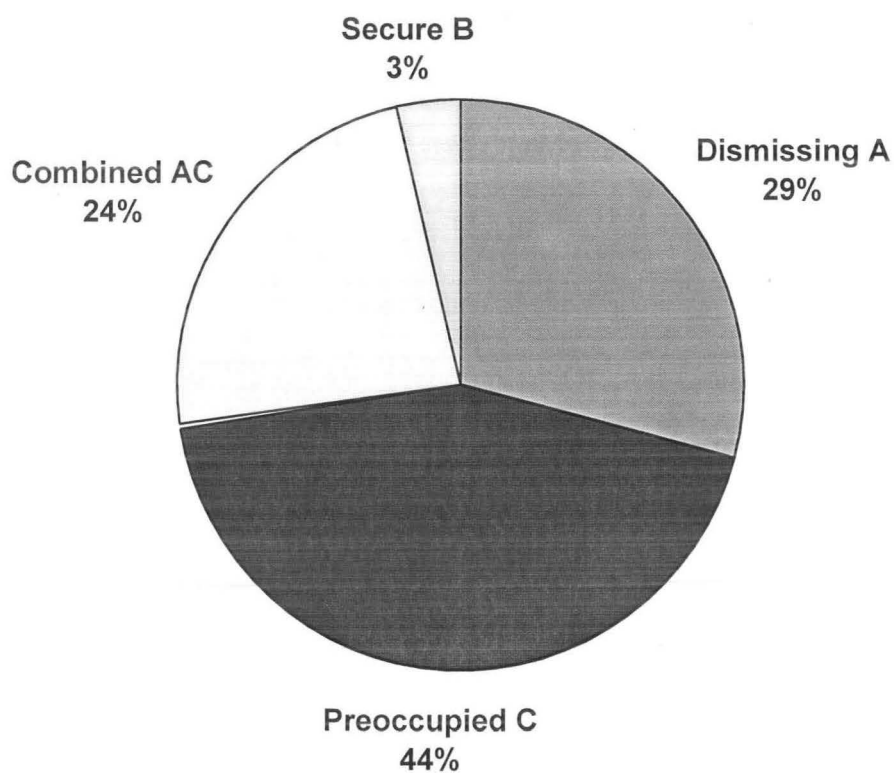


Figure 1: Attachment classification for a sample (n=62) of women with eating disorders

As the secure category comprised only 2 participants out of 62, it was decided, for statistical analysis, to discard these two transcripts (cell numbers < 5). The sample was reduced to 60 participants (all classified insecure) and the distribution among insecure attachment categories is presented in Table 10.

Table 10
Distribution of Types of Insecure Attachment

Participants	Insecure attachment classifications		
	Dismissing (A)	Preoccupied (C)	A/C and AC
N=60	18	27	15
Percentages	30.0%	45.0%	25.0%

Results on lack of resolution (Unresolved loss and/or trauma)

When the scoring on Unresolved (U) loss and/or trauma was included into the classificatory system, the results showed that 23.3% of the participants scored U with regard to loss and/or trauma. However, in Crittenden’s system of scoring (unpublished), the lack of resolution is not scored as a distinctive category in itself, but is adjoined to the main categories. In the current research, 29.6% of preoccupied, 26.7% of combined AC, A/C, and 11.1% of dismissing were scored

with lack of resolution. The distribution of Unresolved (U) within attachment categories is displayed in Table 11.

Table 11
Distribution of Unresolved (U) within Attachment Categories

	Attachment classifications			
	Dismissing (A)	Preoccupied (C)	A/C and AC	Total
Unresolved (U)	11.1%	29.6%	26.7%	23.3%

Attachment classifications by different types of eating disorders

Hypothesis 2 predicted that women with restricting anorexia would be classified dismissing and women with bulimia and bulimic anorexia would be classified preoccupied. There was a significant relationship between eating disorders and attachment categories, $\chi^2(4, N=60) = 11.337, p = .02$.

The results confirm that women with bulimia are predominantly preoccupied C (65.4%). They also confirm that women with bulimic anorexia are predominantly preoccupied C (46.7%), but with one third dismissing A (33.3%).

For women with restricting anorexia, the results show an equally high proportion of dismissing A (42.1%) and combined dismissing/preoccupied A/C (42.1%), and a very low proportion of preoccupied C (15.8%). These results partly

confirm the hypothesis, and if the combined (A/C) had been “forced scored”, it is possible that the proportion of those scored as dismissing (A) would have been higher for women with restricting anorexia. The results are presented in Table 12 and Figure 2.

Table 12

Distribution of Attachment Categories by Types of Eating Disorders

Eating disorders	Attachment classifications		
	Dismissing (A)	Preoccupied (C)	A/C and AC
Bulimia	19.2%	65.4%	15.4%
Anorexia (restricting)	42.1%	15.8%	42.1%
Anorexia (bulimic)	33.3%	46.7%	20.0%

Distribution of Attachment Categories by Types of Eating Disorders

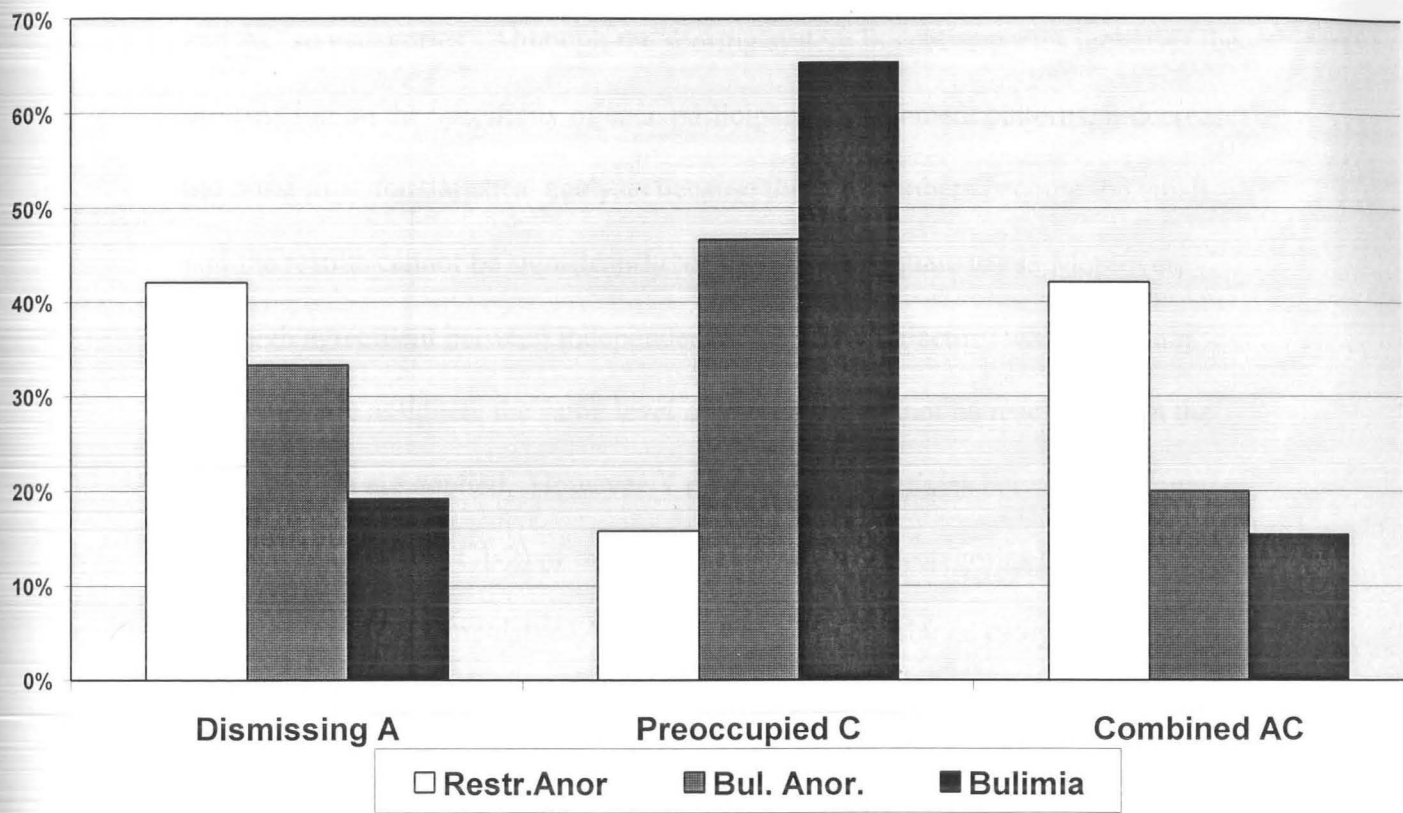


Figure 2: Attachment categories by types of eating disorders

Results with subcategories of attachment

As outlined in chapter IV, Crittenden's (1998) scoring system differs from the classificatory system introduced by Main and Goldwyn (1984). In Crittenden's system the number of subcategories is seven for dismissing (A0 to A6), five for secure (B1-5), eight for preoccupied (C1-8), plus all the combinations for the A/C and AC subcategories. Although the scoring system in subcategories increases the information on the specificity of each participant's attachment patterns, it decreases the possibility for statistical analysis because the cell numbers become too small and the results cannot be significantly tested with Chi-square tests. Moreover, although agreement between independent scorers is satisfactory when the main categories are assigned, the same level of agreement cannot be reached when the subcategories are applied. However, Crittenden differentiates between the low subcategories (A1-2, C1-2) of the scale and the high subcategories that she names obsessive (C3-8), compulsive (A3-6), as well as the combined categories (A/C, AC). This enables analysis to be conducted on these groups. For more detail on subcategories, see chapter IV, and Appendix B.

Further investigations were performed on the classificatory system that takes into account the differences between the high and low subcategories, and the combined categories. The sample ($n = 60$) was classified between the following attachment categories: A(1-2), C(1-2), A+ (3-6), C+ (3-8), and AC, A/C. The

results were significant when tested by χ^2 (8, N = 60) = 15.283, p = .05. They are presented in Table 13 and Figure 3.

Table 13

Distribution of Attachment Categories in Crittenden's Differentiated System

Eating disorders	Attachment categories				
	A(1-2)	C(1-2)	AC, A/C	A+(3-6)	C+(3-8)
Bulimia	15.4%	26.9%	15.4%	3.8%	38.5%
Anorexia (restricting)	15.8%	5.3%	42.1%	26.3%	10.5%
Anorexia (bulimic)	13.3%	6.7%	20.0%	20.0%	40.0%

The distribution between the total of low subcategories (A1-2 and C1-2) and the total of high subcategories (A3-6, C3-8, and AC) was respectively 30% and 70%.

Participants with bulimia and bulimic anorexia showed a high proportion of C+ (38.5% and 40%), whereas women with restricting anorexia showed a high proportion of combined AC (42.1%).

Distribution of Attachment Categories in Crittenden's System

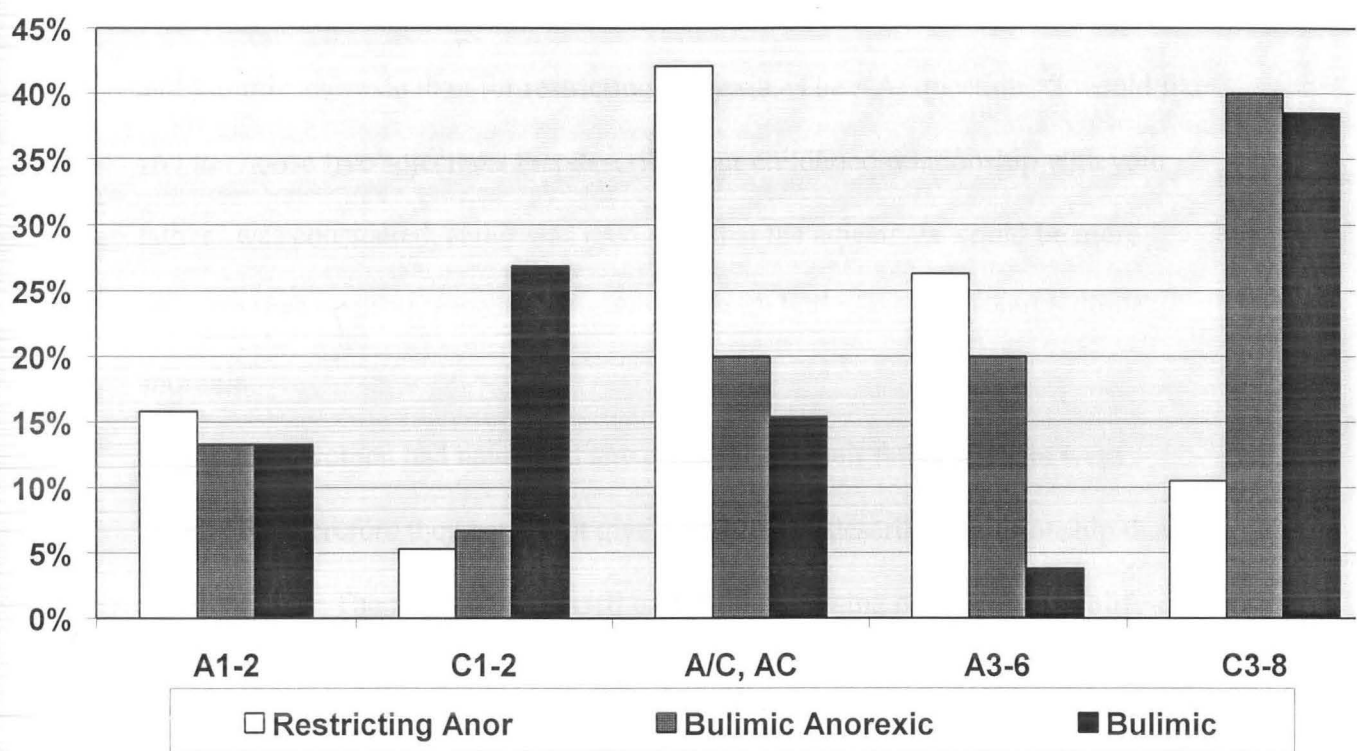


Figure 3: Attachment categories by eating disorders in Crittenden’s differentiated system for scoring.

Mental representation of the father

Hypothesis 3 predicted that women with eating disorders will choose “negative adjectives” to describe their childhood relationships with their father, and that the number of women choosing negative adjectives will be higher for bulimia and bulimic anorexia than for restricting anorexia. The AAI question “I would like you to choose five adjectives that describe your childhood relationship with your father” was considered, and it was predicted that the adjectives would be more negative than positive, especially for women with bulimia nervosa and bulimic anorexia.

Two women had never had any contact with their father (fathers were unknown), therefore they could not give adjectives to describe a relationship that never existed. The results were based on the 60 remaining participants. Thirty-one women (51.7%) chose negative adjectives to describe their childhood relationships with their father against 29 women (48.3%) who did not.

However, when the distribution of “negative adjectives ” was considered by types of eating disorders, the results showed 57.7% for bulimia, 30% for anorexia restricting, and 71.4% for bulimic anorexia. A Chi-square test was significant at .04 level, $\chi^2 (2, N = 60) = 6.327, p = .04$, and the results are displayed in Table 14.

Table 14

Distribution of “Negative Adjectives for the Father” by Types of Eating Disorders

Eating disorders	Negative adjectives
Bulimia	57.7%
Anorexia (restricting)	30.0%
Anorexia (bulimic)	71.4%

These results confirm the hypothesis that the proportion of participants choosing negative adjectives to describe their childhood relationships with their fathers would be greater for women with bulimia (57.7%) and bulimic anorexia (71.4%) than for women with restricting anorexia (30%).

Research question 2 explored whether the answers to the AAI question: To which parent did you feel the closest and why? would be significantly different between types of eating disorders?

For the sample of 62 women with eating disorders, seven women did not answer the question. Two had never known their father (totally absent from the beginning of their life), two declared that they were equally close to both parents, and three answered “close to none of my parents” but to another relative (grandparents or aunt). For the 55 remaining participants, 30.9% of the participants declared that they felt closer to their father against 69.1% who declared that they felt closer to their mother. When the types of eating disorders were considered, the

distribution of women feeling closer to their father than their mother did not show any significant difference. The results are presented in Table 15.

Table 15
Distribution of “Closest to” by Types of Eating Disorders

Eating disorders	Closest to	
	Father	Mother
Bulimia	39.1%	60.9%
Anorexia (restricting)	26.3%	73.7%
Anorexia (bulimic)	23.1%	76.9%
Total	30.0%	69.1%

Demographic characteristics and attachment classifications

Due to the heterogeneity of the sample, further analyses were conducted to explore whether any background characteristics of the sample were related to the attachment styles.

1) Source of referral

The source of referral of participants came mainly (67.4%) from professionals (hospitals and private practitioners). On the other hand, less than a

quarter (22.6%) of the sample self-referred to participate, from advertising in community newspapers, and flyers in university campuses.

Further analyses were conducted to determine whether self-referred participants were significantly different than the other participants in terms of eating disorders categories, attachment styles, and treatment?

Participants who self-referred to the research project were mainly (71.4%) bulimic (see Table 6).

When classified for attachment styles, self-referred participants showed a very high proportion (78.6%) in the preoccupied categories [$\chi^2(4, N = 60) = 9.474$, $p = .05$]. The results are shown in Table 16.

Table 16

Distribution of Attachment Categories by Sources of Referral

Sources of referral	Attachment classifications			Total
	Dismissing (A)	Preoccupied (C)	A/C and AC	
Hospital	31.6%	36.8%	31.6%	100%
Professionals	50.0%	25.0%	25.0%	100%
Advertising	14.3%	78.6%	7.1%	100%

Participants who were referred from hospitals or by private mental health professionals were all receiving psychological treatment for their current eating

disorders, but only 14.3% of the participants who self-referred for the research project were receiving psychological treatment. In terms of attachment classification, 83% of participants who did not receive psychological treatment were preoccupied, against 8.3% who were respectively dismissing and combined dismissing/preoccupied. These results were significant with $\chi^2 (2, N = 60) = 8.912$, $p = .01$.

When these three observations were analysed together, it appeared that participants who self-referred to the research project were mainly bulimic (71.4%), did not get psychological treatment for their eating disorders (85.7%), and classified preoccupied (78.6%).

2) Age distribution.

The age distribution of the sample ranged from 18 to 45 with a mean age of 24.6 (SD 7.08). As this was a broad range of age, further analysis was conducted to explore whether the age of the participants was related to the attachment classifications.

The results were not significant but they showed a tendency for participants under 18 to be primarily dismissing, participants between 21 and 31 years to be primarily preoccupied, and participants above the age 30 to be primarily combined dismissing/preoccupied with regards to attachment. The results are displayed in Table 17.

Table 17

Distribution of Attachment Categories by Age Categories

Age categories	Attachment classifications			Total
	Dismissing (A)	Preoccupied (C)	A/C and AC	
Under 21	45.0%	40.0%	15.0%	100%
21 to 25	30.4%	47.8%	21.7%	100%
26 to 30	9.1%	54.5%	36.4%	100%
over 30	16.7%	33.3%	50.0%	100%

3) Length of therapy

The length of therapy ranged from none to several years. In order to differentiate the sample in terms of length of therapy, it was decided to classify the number of months/years of therapy in four categories: none, less than six months, from six months to two years, and over two years. Further analysis was performed to explore whether the length of therapy was related to the attachment styles. The results were not significant but it was observed that 100% of the participants in the secure category and 60% of the participants in the combined AC, A/C category had been engaged in therapy for their eating disorders for more than two years. The results are presented in Table 18.

Table 18

Distribution of Attachment Categories by Length of Therapy

Length of therapy	Attachment classifications			
	Dismissing (A)	Preoccupied (C)	A/C and AC	Secure (B)
None	11.1%	33.3%	6.7%	0%
Less 6 months	38.9%	22.2%	20.0%	0%
6 months-2 years	11.1%	11.1%	13.3%	0%
Over 2 years	38.9%	33.3%	60.0%	100%
Total	100%	100%	100%	100%

The following chapter discusses these results in the light of previous research.

CHAPTER VI

DISCUSSION

The first hypothesis, that when eating disorders occur in adolescence or adulthood the attachment classification will show a higher proportion of insecure attachment than secure attachment, was confirmed. This finding supports the conclusions of previous studies which found that 87 to 89 percent of people with psychiatric disorders were classified insecure (Fonagy et al., 1996; van IJzendoorn & Bakermans-Kranenburg, 1996). Similar conclusions were found for studies on eating disorders (Amstrong & Roth, 1989; Candelori & Ciocca, 1998), particularly in terms of fear of abandonment and difficulties with autonomy (Kenny & Hart, 1992; Lavik et al., 1991).

According to the attachment theory, insecure attachments are built on expectations, based on childhood experiences, that the parents, or attachment figures, are not available or rejecting, and that the self is unloved or rejected. Consequently, during childhood, children develop strategies for protecting themselves against the distress associated with their expectations of non-responsiveness and non-protectiveness from their attachment figures. The finding that 97.3% of the sample of the current study was classified insecure demonstrates that their mental representations of childhood attachment-related experiences were characterised by a lack of security and confidence in their parents' availability.

The distribution of different attachment categories for the total sample of women with eating disorders showed that almost half of the sample was classified preoccupied, slightly less than a third dismissing, and a quarter combined dismissing/preoccupied. These findings are supported by Fonagy's results (1996) that also found a high proportion of preoccupied categories of attachment for women with eating disorders. Contrary findings came from Cole-Detke and Kobak's research (1996) that obtained a high proportion of dismissing categories of attachment for their sample of women with eating disorders. However, when depression was associated with eating disorders, Cole-Detke and Kobak's results were reversed, and showed agreement with Fonagy's research and this research.

Co-morbidity was not tested in the current research, and the distinction between a sample of "pure" eating disorders and a sample of eating disorders associated with other psychiatric disorders was not studied. It is possible that the association of eating disorders with others psychiatric disorders would find different results for attachment classifications. Further research would clarify this question by including differentiated diagnosis of psychopathology in association with eating disorders, and by determining how these co-morbid psychiatric disorders impact on the attachment styles.

Twenty three percent of the total sample was found to be unresolved (U) with regard to loss or trauma. In Crittenden's scoring system, the focus is placed on danger and the scoring for lack of resolution (U) is expanded to all kinds of

traumatising danger. Moreover, as Crittenden (1998) pointed out, the trauma may be real, perceived, observed, or imagined, but it is “the psychological response to the event (that) is the critical feature rather than the event itself” (p. 7). In Crittenden’s system, the lack of resolution is not scored as a separate category, but is an adjunct to the other categories (A, B, C, AC, A/C). In the current research, preoccupied and combined AC, A/C categories both showed a proportion of one third of Unresolved, whilst the dismissing category showed only 11% of Unresolved. This finding is in agreement with research (Fonagy et al., 1995) that found similarities between the Unresolved and the preoccupied categories. The lack of resolution is considered as an extreme form of the discourse patterns that characterise people in the preoccupied category of attachment (Slade, 1999).

Hypothesis two predicted that women with restricting anorexia would be classified dismissing and women with bulimia and bulimic anorexia would be classified preoccupied.

The results confirm that women with bulimia are predominantly preoccupied (65.4%) which accords with previous studies (Candelori & Ciocca, 1998). Preoccupied people maximise their experiences of attachment-related issues, and turn their attention to their own distress and unfulfilled needs (Slade, 1999). Theoretically, people with preoccupied patterns of attachment have experienced unpredictable or inconsistent attachment figures, and therefore, are in a constant state of anxiety about potential danger. As a result, preoccupied people are

very vigilant and develop obsessional defenses in which they call for on-going attention from others (Crittenden, 1995).

The association of bulimia with preoccupied attachment is also in agreement with the conclusions from studies using other theoretical models such as the family model and the developmental model (Humphrey, 1987; Johnson & Connors, 1994; Johnson & Larson, 1982). It was suggested that the families of bulimic people were more disengaged, conflictual, isolative, and depriving, characterised by less cohesiveness, support, and nurturing (Humphrey, 1987). The bulimics' perception of their parents was defined by a deficit in nurturance and empathy. Through their preoccupied attachment pattern, they called for attention and comfort, and they became insecure because their family environment was a place where nothing was predictable. Within that context, binge-eating episodes would be an attempt to fulfill their needs, using food as a compensation for emptiness, and purging would correspond to expelling their anger and frustration (Humphrey, 1987).

Women with restricting anorexia were expected to be classified dismissing and the results of the current study showed an equally high proportion of dismissing and combined AC, A/C, with a very low proportion of preoccupied. Previous research (Candelori & Ciocca, 1998) found a high proportion of dismissing and a very low proportion of preoccupied for women with restricting anorexia.

People with dismissing patterns of attachment have experienced predictable attachment figures but in dangerous conditions. Therefore, they develop compulsive defenses against the predictable danger such as inhibiting the source of

danger and relying on themselves for protection (Crittenden, 1995). It was suggested that dismissing people minimise their attachment needs by turning their attention away from their attachment-related issues, pretending that they were not affected by their emotional states (Slade, 1999). Their psychological defenses were to focus on the external world and to avoid their own feelings of distress.

The association of restricting anorexia with dismissing attachment is also in agreement with studies from other theoretical models of anorexia (Garfinkel et al., 1983; Minuchin et al., 1978; Strober & Humphrey, 1987; Strober et al., 1990). In the family model, mothers of anorexics were described as more intrusive, overprotective, and resistant to their daughter's independence. Conflict avoidance, over-protectiveness, and poor conflict resolution were identified (Minuchin et al., 1978) in the families, and anorexics appeared to find it difficult to separate from their family in order to build their own identity (Stern et al., 1981). Bruch (1970) suggested that mothers discourage the separation-individuation process (Mahler, 1971) that should reoccur at adolescence. The defense mechanisms for young anorexics were to comply to their mother's demand in order to avoid the distress associated with the intrusion (Johnson & Connors, 1994). These conclusions support the characteristics of dismissing people who turn their attention away from their own distress, and deny their emotional states.

Concerning the results on the combined AC, A/C categories for restricting anorexia, as they are a specific feature of Crittenden's scoring system, they have not been used in previous research, and therefore, they cannot be compared with other research findings.

People with the combined AC, A/C patterns of attachment have experienced confusing attachment figures (like the Main's Disorganised/Disoriented category for children), who were sometimes frightening (source of potential danger) or sometimes frightened (by external potential danger). Therefore, a combination of defenses which may be contradictory (obsessional and compulsive) have been developed for protection against danger (Crittenden, 1995).

It was expected that women with bulimic anorexia would be classified as preoccupied. The results showed that almost half of them were preoccupied with a third dismissing and a fifth combined AC, A/C. These findings are close to previous research results (Candelori & Ciocca, 1998) where the majority of bulimic anorexics were preoccupied. They also confirm Humphrey's (1987) suggestion that the characteristics of bulimic anorexia are closer to bulimia than anorexia. This poses the issue of diagnostic categories for differentiation between types of eating disorders in terms of evolution of the psychopathology in relation to attachment patterns. The preoccupied category was very high for bulimia, very low for restricting anorexia, and medium for bulimic anorexia. It suggests the possibility of a continuum between types of eating disorders and types of attachment. A large proportion of women who were bulimic anorexic at the onset of their eating disorders may become bulimic after a few years. They still binge-purge but they do not maintain a low body mass index and amenorrhea (which are two criteria for anorexia). In this case their attachment classifications are similar to bulimia. It also underlines that the attitude towards food (binge and/or purge) is a more important

factor in the diagnosis of eating disorders than weight and physical condition. This conclusion is in accordance with Johnson and Connor's (1994) statement, which suggests that DSM IV places too much emphasis on the physical conditions of eating disorders, such as classifying bulimic anorexia as a subtype of anorexia whilst the attitudes and behaviours (binge and purge) are characteristics of bulimia.

On the other hand, the dismissing category characterised almost half of the restricting anorexics, followed by a third of bulimic anorexics and a very low proportion of bulimics. The combined AC, A/C presents a similar distribution. In these cases, the proportion of bulimic anorexics who are dismissing are more similar to restricting anorexics in terms of attachment styles. It is possible that this population of dismissing bulimic anorexics, contrary to the population of bulimic anorexics who were preoccupied like bulimics, may remain on the side of anorexia because their eating disorders do not develop into bulimia. Further longitudinal studies on the evolution of eating disorders in parallel with attachment classifications would clarify these issues, testing the links between changes in eating disorders and changes in attachment patterns.

These results on attachment by categories of eating disorders support the sub-classification of eating disorders between bulimia, restricting anorexia, and bulimic anorexia. Subdividing the anorexia category between restricting and bulimic demonstrates that bulimic anorexics, although they are primarily clinically diagnosed (in DSM IV) as anorexics, are closer to bulimics than restricting anorexics in terms of their attachment patterns. This observation has major

implications for research because, if the anorexic group had been treated as a whole (no differentiation between restricting and bulimic types), the results of this study would have been different. It also has implications for diagnosis and clinical practice.

Results on subcategories showed that 30% of the participants were classified in the low sub-categories (A1-2 and C1-2), and 70% were classified in the high sub-categories (A3-6, C3-8, and AC, A/C). These results support the choice of using Crittenden's scoring system which offers a broader classificatory system. The AAI transcripts of clinical samples are more complex to score, especially when the speakers use both patterns of discourse (combined AC, A/C), and many of the transcripts of the current research would have been scored Cannot Classify (Hesse, 1996) in Main and Goldwyn's system.

Participants with bulimia and bulimic anorexia showed a high proportion of high C subcategories which confirms the *obsessive* quality of their attachment patterns, usually made of anger and/or fear. Obsessively preoccupied people present their story only from their own perspective, and often they try to involve the interviewer in a collusive way against the others (Crittenden, 1998). Their discourse is characterised by complex transformations of information in order to protect the self against danger, and the expression of exaggerated negative feelings is presented as a justification for revenge and/or call for comfort.

Participants with restricting anorexia showed a high proportion of combined AC, A/C subcategories which implies that they use a combination of dismissing and

preoccupied strategies in order to protect themselves. These strategies can be used alternatively (A/C), for example dismissing with one parent and preoccupied with the other, or blended (AC) when both strategies are used with each attachment figure.

The combined A/C, AC strategies may also be confused with the secure strategies (Crittenden, 1998). As presented in the literature review (Brusset, 1998; Sours, 1980), restricting anorexic people may give the illusion of adaptation in the external world because they are high achievers (at work or at school) and most of the time they deny the severity of their eating disorders. However, the difference between the combined and the secure categories of attachment lies in the capacity for integration (cognition and affect) that is present for secure people and absent for people who are classified with combined categories (Crittenden, 1995).

It is also interesting that the higher subcategories are more present in the preoccupied classifications (bulimia and bulimic anorexia) than in the dismissing ones (restricting anorexia) who seem to classify highly in the combined AC, A/C categories. The explanation of this phenomenon may be that when the lower dismissing patterns are not effective, preoccupied patterns are combined with the dismissing ones in order to reach the required level of protection.

It should also be underlined that most of the restricting anorexics were receiving psychological treatment for their eating disorders at the time of the AAI. This may imply that, with the support of their therapist, they gradually change their mental representations of early attachment and use a broader range of strategies. However, contrary to the secure patterns, the transformations are not yet integrated.

The hypothesis that during psychological treatment the combined attachment patterns are a transition toward the secure patterns of attachment should be tested in further studies.

The third aim of the current research was to explore whether the early attachment of eating disordered women with their father would be characterised by a “negative mental representation”, and hence whether there would be a tendency for women with bulimia and bulimic anorexia to have a greater frequency of “negativity towards the father” than women with restricting anorexia. The results showed a high proportion of eating disordered women choosing negative adjectives to describe the childhood relationships with their father. These findings need to be interpreted with caution because they were not compared to a control group of women who do not have an eating disorder. It should also be reminded that, by providing an attachment category, the AAI assesses attachment *in general*, and not to a particular person (such as the father for example). Therefore the results apply to the two specific questions of the AAI that were analysed, and not as a classification of attachment toward the father.

The comparison between types of eating disorders and “negative adjectives for the fathers” showed that women with bulimia and women with bulimic anorexia scored respectively higher than women with restricting anorexia. These results confirm the conclusions from other studies (Humphrey, 1987) which suggested that although girls with restricting anorexia experience some tension with their fathers,

their relationships were generally more positive compared to the bulimic and bulimic anorexic groups.

The question to which parent did the participant feel the closest showed a much greater proportion of answers “to the mother” than “to the father”. As we did not have a control group for comparison with a normative population, the results are only an indication of tendency. It is probable that many people from a normative population would declare feeling closer, as a child, to their mother, simply because mothers are more likely to be providing the daily care to their children (Maine, 1995).

Further analyses were conducted on the demographic characteristics such as age, referral sources, and length of therapy, in relation to attachment classifications, in order to see if these variables had a significant impact on the attachment styles of the participants.

The relation between sources of referral and attachment classifications showed that a very high proportion of participants who self-referred (from advertising) to the research project were classified preoccupied and were bulimic. This may suggest that bulimic women are more inclined to initiate talking about their eating disorders than anorexic women who, despite external evidence of their illness, tend to deny the problem and therefore decline any invitation to explore the issue (Brusset, 1998). However, when these results were associated with the factor “receiving psychological treatment or not”, the majority of people who self-referred did not receive treatment. It is interesting to try and explain this observation.

First, the psychological treatment that some participants received (mainly women with anorexia) was not initiated by the patients, but was included in the treating programme of the hospital where they had been admitted for their eating disorders. Most of the participants with anorexia were hospitalised at the time of the interview because their symptoms (such as refusal to eat despite very low weight) are more on the physical side, externally visible, and moreover put their life at risk. Bulimic symptoms, which are more on the psychological and behavioural side, are less visible and can be undetected for years if the person does not disclose them.

Nonetheless, three quarters of the self-referred participants, who did not receive psychological treatment for their eating disorders, were classified preoccupied and were bulimic. These observations raise new hypotheses for further empirical research on the links between attachment patterns, source of referral of participants, treatments, and types of mental illness.

When the relation between age and attachment classifications was explored, there was no significant difference between age groups. However, there was a tendency for younger women (under 21) to be more dismissing, medium age range participants (between 21 and 29) to be more preoccupied and older participants to be more combined AC, A/C. The older category of age (above 30) comprised women who had suffered chronically from eating disorders, some of them since adolescence, and had received on-going treatment. The question of the impact of treatment should be addressed because it may be possible that the participants in

this age category had, with on-going treatment, gradually changed their mental representation of early attachment. In the process of therapy, patients revisit their past experiences and hopefully start to integrate the information towards a more secure attachment (Crittenden, unpublished). The combined AC, A/C in this case would be a transitional position where experiences, memories, feelings and expectations are not yet fully integrated, but are in the process of changing.

Issues and limitations

There were issues around, and limitations of, the study linked to the sample, the measures, and the statistical analyses.

Issues with the sample

The process of obtaining the sample was difficult because of the tightness of the selection criteria. Access to participants was also problematic and dependent on the sources of referral. The requirement for the sample to satisfy each diagnostic criterion (DSM IV) limited the selection of participants to people who presented the full eating disorders syndrome. However, a large proportion of people suffering from symptoms of eating disorders do not satisfy the DSM IV classification because one criterion is not present, and therefore they are classified as partial syndrome (Dancyger & Garfinkel, 1995). Nevertheless, for the purpose of comparability of

results with other research, participants were included in this study only if they strictly met all of the DSM IV criteria for eating disorders. This restricted access to participants, and inevitably resulted in difficulties in finding a suitable sample.

The access to a sample was also directly dependent on the response of professionals who had been approached by the researcher with a request to refer potential participants for the research. The limited number of medical institutions which specialise in eating disorders in Western Australia, and the limited responses from the treating community (psychiatrists, psychologists, dieticians, etc) to the request for having access to eating disorders patients, reduced the availability of a sample of women with current eating disorders who could be a part of the project. Therefore, apart from one private hospital that specialised in eating disorders in Perth, problems of referral reduced the obtainability of participants.

As a result, within the first year of the project, only a third of the interviews had been achieved. For practical reasons related to the resources and the reasonable duration of the study, two new strategies were put in place. The first involved advertising in the community (through the community media and through information flyers on university campuses). Fourteen women were selected and recruited from self-referring through advertising. The second strategy involved obtaining access to participants in other states of Australia. With the support of two psychiatrists in Brisbane, the last 18 participants were selected and interviewed by the researcher in the hospitals in Brisbane where they had been admitted for eating disorders. This procedure, although resulting in obtaining the sample in a limited period of time, resulted in potential concerns about the homogeneity of the sample.

Most participants with anorexia were recruited through hospitals with a very small proportion recruited through advertising. On the contrary, the participants with bulimia were obtained almost equally from hospitals and advertising. Of the total number of women recruited from advertising, a large majority was bulimic. This may have impacted on the attachment classification in the sense that the preoccupied strategy tends to amplify the importance of potential disruption of early attachment, in which case, the high proportion of self-referring bulimics would partly be responsible for the high proportion of preoccupied classification for bulimia.

Due to the limited access to potential participants, parameters were also redefined from the original proposal in terms of the age range of participants and the length of clinical treatment received by the participants. Based on information on demographic characteristics of people with eating disorders (Fairburn & Cooper, 1982; Johnson & Connors, 1994), the original selection criteria for the sample limited the age range between 18 and 25. However, as presented in Table 3, chapter IV, the actual age of participants ranged between 18 and 45 with a mean age of 24.61 (SD 7.08). Nevertheless, three quarters of the sample was 25 years old or younger (which was within the proposal age range) with more than ninety percent less than or equal to 30 years of age. The age of the sample of this research was, therefore, close to the age range of people with eating disorders as described in the literature (Fairburn & Cooper, 1982; Johnson & Connors, 1994).

The length of psychological treatment that the participants were receiving for their eating disorders should have been reduced as much as possible at the time of the interviews because psychological treatment influences attachment patterns (Byng-Hall, 1995; Crittenden, personal communication; Fonagy, 1999b). However, most of the participants were hospitalised at the time of the interviews and psychological treatment was a part of the hospital programme for treating eating disorders. Some of them, especially people suffering from chronic recurrent episodes of eating disorders, had been regularly admitted to hospital, and had received psychological treatment, on and off, for a long period of time. Further research would clarify the impact of psychological treatment on attachment, particularly the kind of treatments that help people to reach a secure state of mind in terms of attachment.

Another issue concerning the sample was the potential psychological vulnerability of the participants. The ethical issues of distress potentially evoked by the interviews had to be considered with extreme attention. Contact with each participant was limited to the shortest time possible in order to reduce any side effect of the research intervention, and it was agreed with the Ethics Committees that only the diagnostic interview and the AAI would be administered.

Issues with the measures

1) Eating Disorders Assessment Interview:

Although the DSM IV distinguishes two main eating disorders categories, it was decided for the current research to differentiate the sample between three categories: bulimia nervosa, restricting anorexia, and bulimic anorexia. This decision increased precision in characteristics of subcategories of eating disorders. As it was pointed out by Johnson and Connors (1994), the behavioural and psychological factors in each eating disorders category should be a major part in the diagnostic criteria, and the distinction between restricting anorexia and bulimic anorexia achieved this objective. It also showed significant differences between the three groups of eating disorders in terms of attachment patterns. In particular, it showed that people with bulimic anorexia, although they were classified as anorexics, were more similar to people with bulimia for their attachment patterns. However, a division in three subgroups of eating disorders, rather than two, reduced the cell size, which decreased the strength of the results.

2) Adult Attachment Interview:

The Adult Attachment Interview is a highly demanding measure in terms of time for its administration, transcription, and scoring (with two independent scorers). The financial costs involved in the process result in the AAI being a costly tool for use in a research setting. The AAI required extensive training and this type of study relied heavily on scorers trained at an advanced level in the scoring technique. As the number of scorers trained at the advanced level for clinical samples was very small, the resources for independent reliable scorers were limited,

and the investment for the current research in time and energy from these people was extremely demanding.

The scoring system, relying on the scorer's final judgement following guidelines for selecting a category, also has the potential for errors.

Misclassifications can occur, especially when the subject's defenses are highly sophisticated as it is the case, for example, in the combined categories AC, A/C (Crittenden, 1998). The use of both patterns in the combined categories AC, A/C can be confused with the balanced categories; the difference relies on the level of *integration* which is present for the balanced pattern and absent for the combined pattern. Moreover, Crittenden (1998) underlines that the attachment classification, like other psychological assessments, represents only a "sample" of the psychological process of the participant, and therefore it would be more appropriate to assign a classification to the transcript rather than to the person. The AAI is a rich tool to explore attachment styles and to gather information about people's psychological functioning, but the categorical results of scoring represents only a part of the whole procedure.

Although the AAI has been used in a number of studies, it is still a fairly new measure, which is evolving through constant revision and improvement. Crittenden's dynamic-maturational approach has expanded the use of the AAI from the functioning of a normative population to the more psychopathological functioning of clinical samples, offering a more appropriate scoring system for the sample of this research. However, the issue of reliability had to be addressed.

Although the assessment of reliability and validity of the dynamic-maturational system of scoring has not yet been published, there are some available preliminary data (see Hughes, 1997) which suggest that the dynamic-maturational system of scoring is a valid tool to use clinically for differentiating groups with psychopathology.

For the scoring of the AAI transcripts of the current research, Crittenden provided coaching, and classified 17 of them for which agreement was reached with the other scorers.

Statistical analysis

The size of the sample was limited to 62 due to difficulties in recruitment of participants, and resources for the Adult Attachment Interview. These issues were discussed in the previous section. As a result, the statistical analysis had to be performed on small numbers, therefore, the results have to be interpreted with caution.

This research relied on quantitative analysis and a large amount of qualitative information was not used. Attachment is a complex concept that qualitative analysis could explore in more depth, and an analysis of the content of the AAI would certainly provide rich information on some specific aspects of the attachment style of the participants. Qualitative analysis of existing AAI transcripts would provide material for further research.

Co-morbidity of the sample

The issue of co-morbidity was not studied and the sample of the current study was diagnostically classified for eating disorders only. However, a complete psychiatric assessment for co-morbidity of the sample would have been beneficial for differentiation of psychopathologies in relation to the results on attachment styles. Cole-Detke (1996) observed that when other symptoms such as depression were co-morbid to eating disorders, the results on attachment classifications were reversed from the ones obtained with “pure” eating disorders categories. In a review of previous studies on psychopathology and attachment classifications, Dozier and her colleagues (1999) showed that, except for schizophrenia and conduct disorders associated with depression which were classified dismissing, most of the psychopathology groups were classified preoccupied. These included depression, anxiety disorders, substance abuse, and borderline personality disorders. Therefore, with a systematic assessment covering the whole range of symptomatology, the results of the current research might have showed differences in attachment styles between pure groups of eating disorders and groups with co-morbid psychopathologies. Unfortunately, this procedure was not possible as conditions for access to participants defined by the Ethics Committees suggested a limited contact time with the patients in order to reduce any side effect of the research intervention on people who were vulnerable and potentially distressed by the AAI.

Implications

For theory and research

Several findings have emerged from the results that have implications for theory and future research. These findings support theoretical models of eating disorders presented in the literature review, especially the models of patterns of relationships linked with mothers' over- and under- involvement (Johnson & Connors, 1994), the separation-individuation process (Mahler, 1971) reactivated at adolescence, and diagnostic issues for differentiation between anorexia nervosa (restricting and bulimic) and bulimia nervosa (Johnson & Connors, 1994).

The findings of the current research are also consistent with attachment theory, and demonstrate that the mental representation of early attachment of women with eating disorders did not provide for secure attachment. These findings suggest that early intervention would be beneficial for prevention of the onset of eating disorders.

The current research expands theoretical implications of the attachment model to eating disorders. These findings shed new light onto the psychopathology of eating disorders in relation to attachment styles. People characterised by a dismissing attachment style turn their attention away from attachment-related issues and try to minimise their attachment needs. On the other hand, people with a

preoccupied attachment style focus mainly on attachment-related issues and maximise their attachment needs (Cole-Detke & Kobak, 1996). In terms of eating disorders, the findings of the current research support the idea that women with bulimia and bulimic anorexia maximise issues with their attachment figures, and women with restricting anorexia have the tendency to minimise issues relating to their attachment figures or to use both strategies.

Crittenden's system for coding the AAI facilitates the use of the attachment model for clinical populations. By including the combined categories AC and A/C, as well as the higher subcategories such as compulsive A+(3-6) and obsessive C+(3-8), Crittenden's coding system offers the possibility to classify participants who would have been scored "Cannot Classify" in the Main and Goldwyn system. In the current study, the proportion of high subcategories and combined categories formed 70% of the total sample.

The findings of this research also confirm Johnson and Connors' (1994) suggestion that the diagnostic criteria for eating disorders should be reconsidered. Johnson and Connors (1994) suggested that weight is not of central importance in the definitions of eating disorders, and should not be included in the diagnostic criteria. On the contrary, attitudes towards food and the style of eating behaviour (bulimic versus restricting) should be emphasised, rather than weight status. The current research demonstrates that women with bulimic anorexia, although they are primarily diagnosed with anorexia from the DSM IV criteria, have attachment

classifications close to the ones that characterise women with bulimia. This finding offers more weight to the importance of considering psychological factors, in particular attitudes towards food in the differentiated diagnosis of eating disorders. This also suggests that in future research on eating disorders, anorexia must be subdivided into restricting type and bulimic type.

For treatment

Crittenden (1998) underlines that the AAI scoring system classifies transcripts and not people. She also suggests that in most cases the transcripts represent the person's mental functioning. Attachment classifications provide information about the patient's frame of mind with regard to attachment, mental representations, and psychological functioning. More specifically, the patterns of attachment have a defensive function in order to protect the person against unbearable feelings, thoughts, and memories. These patterns also have the function to protect the patients against other potential sources of danger and trauma and, in that sense, attachment patterns play the role of adaptive/non-adaptive defense strategy. As Crittenden (1998) suggests, the classificatory system offers implicitly "a diagnostic assessment based on mental processing of information and behavioural strategies for protecting the self from perceived danger" (p. 10, chapter 10).

In treatment, the observation and understanding of these patterns inform the therapist on how a patient may feel, behave, and react. Moreover, the attachment

classifications provide information about the way a patient can (or cannot) form a relationship with a therapist, build a therapeutic alliance, and explore the transference and resistance, as the processes of attachment are replicated in the therapeutic relationship (Slade, 1999). The defense mechanisms used in each attachment style are brought to, and reactivated in, the psychotherapy setting. Dismissing patients act with avoidance, preoccupied patients show a high level of ambivalence, and combined preoccupied/dismissing patients fluctuate between the patterns of both defense mechanisms, creating a confusing and disorganised relationship with the therapist.

Patients have expectations of the therapist's reliability and responsiveness that are influenced by the expectations they had about the availability and responsiveness of their attachment figures in childhood. For insecurely attached people, the parents' responsiveness was inappropriate for creating a sense of security for the child. Therefore, asking a therapist for help will be a major difficulty in itself, as there is nothing in the mental representation of these insecure people that allows them to trust others and to rely on the external world as a potential source of support. When therapy is successful, the therapist becomes the "secure base" (Slade, 1999, p. 587) from which patients explore and transform their working models. The support of an emotionally available and responsive therapist ensures for patients a basic sense of security that was missing in childhood experiences with their attachment figures. In the context of a "secure base" with a responsive therapist, patients feel able to explore their internal world and to engage in a therapeutic process of change. "Like Oliver Twist (see Chapter 3), she (his

patient) needed first to find a place to which she could become attached, before she could begin to own her story” (Holmes, 1993, p. 169).

Dismissing people deny or minimise the importance of attachment-related experiences and avoid any emotional state by deactivating or turning their attention away from their own feelings. They do not want to be close to others, to feel emotional needs, or to explore potentially painful feelings. Dissociation and splitting-off characterise dismissing defensive systems (Candelori & Ciocca, 1998), with no integration of the “good” and the “bad” in a causal order. Dismissing people either idealise or derogate their past, and their childhood relationships are presented in a dichotomised mode, exonerating the parents while removing the self. The difficulty for the therapist is to overcome the dismissing patient’s strong resistance which functions as a protection against the intrusion of unbearable feelings. It is suggested that dismissing patients would benefit from psychotherapy in which “affective processing” would be the main goal, and interpretations would not be experienced as intrusive into the internal world of the patient (Holmes, 1993).

Preoccupied people maximise the importance of attachment-related experiences and focus their attention on their feelings and emotional states. They demand a lot of attention from the therapist and seem to lack autonomy and capacity to explore the environment by themselves. Confusion characterises preoccupied defensive systems (Candelori & Ciocca, 1998), and there is no

integration of temporal order. Working with people characterised as preoccupied requires the creation of a safe therapeutic base in which the patients' overwhelming feelings are contained, and the information on their history reordered. It is suggested that preoccupied patients would benefit from psychotherapy with clear limits and boundaries from a reliable but firm therapist (Holmes, 1993) who would help patients to articulate their story (without constantly blaming the others), and to develop autonomy and independence.

People with a combined dismissing/preoccupied attachment style use both strategies, and alternate from minimising to maximising the importance of attachment related experiences without any differentiation. They may also use different patterns of attachment with different attachment figures; for example dismissing with one parent and preoccupied with the other. Combined dismissing/preoccupied patients fluctuate between discourses characterised on the one hand by control, denial, idealisation, or derogation, and on the other hand by confusion, fear, fragmentation, and incoherence. It is suggested that these patients have experienced trauma and abuse, and that their attachment figures were simultaneously frightened and frightening. Crittenden (1998) suggests that patients with combined AC, A/C patterns of attachment are the most disturbed people on the scale of psychopathology, especially when the two strategies are confounded with no integration on the cognitive level (preoccupied) nor affective level (dismissing), such as occurs in psychopathy. A combination of containment and emotional exploration in a psychotherapy setting defined by clear and firm boundaries would

help patients to reorganise their internal and external worlds, integrating experiences, emotions, and feelings in a causal and temporal order (affects integrated with cognition).

Although attachment theory was originally developed from, and mainly applied to, normative populations, a significant implication of attachment research lies in the understanding of the characteristics and the dynamics of the attachment patterns that may provide guidelines for psychopathology and clinical practice. As with other psychodynamic approaches, understanding the origins of the dysfunctional working models provide support for the therapist and the patient to act on the structural disturbance in order to produce changes. Attachment theory, and more particularly the Adult Attachment Interview, is a useful assessment tool for psychological treatments.

Further research

It is suggested that further research on eating disorders and attachment should differentiate samples between pure groups of eating disorders and groups of eating disorders associated with co-morbid disorders. In particular, a systematic assessment covering the whole range of symptomatology should be included into the diagnostic criteria for selecting samples. This procedure would clarify if other

psychopathologies influence the attachment styles of people with eating disorders, and in which way.

Further longitudinal studies on the links between the evolution of eating disorders and the changes in attachment styles would clarify whether bulimic anorexia is a transitional state between anorexia and bulimia. New research hypotheses could explore whether the attachment classifications could predict the evolution of eating disorders symptomatology for bulimic anorexics towards anorexia or bulimia.

The hypothesis that the combined attachment categories (A/C, AC) are transitional states that are observed during psychological treatment could also be studied in further research. For example, preoccupied patients, through therapy that contains their overwhelming feelings, gradually explore their feelings and reorder the story of their life. As such a therapeutical process requires time, a transitional state in which both preoccupied and dismissing patterns of attachment may occur before reaching secure patterns of attachment, in which the information and experiences are reorganised and finally integrated.

The current research shows differences in mental representations of women with eating disorders of their early relationships with their fathers. Women with

bulimia and bulimic anorexia have a more negative mental representation than restricting anorexic women. However, comparison with a control group would clarify whether the same results apply to women without eating disorders.

It would be also interesting to analyse the transcripts of the Adult Attachment Interviews on a qualitative level. Although the AAI is not scored from the content of the discourse, some specific questions could be studied qualitatively, and provide further information into issues such as common aspects of childhood experiences for women with eating disorders, or the use of food as metaphors for feelings. Qualitative analysis of existing transcripts would provide material for further research.

Conclusions

This research studied the attachment classifications for a sample of 62 women with eating disorders, and compared attachment styles for women with anorexia nervosa (restricting type and binge-eating/purging type) and women with bulimia nervosa. Eating disorders categories were diagnosed with a semi-structured interview based on the “Diagnostic Survey for Eating Disorders” (Johnson and Connors, 1987) and the DSM IV criteria. Twenty-six participants satisfied the criteria for bulimia nervosa and 36 participants met the criteria for anorexia

nervosa; 20 were classified with restricting anorexia, and 16 were classified with bulimic anorexia.

The Adult Attachment Interview (AAI) (George, Kaplan and Main, 1985) identified the attachment classifications for the sample, using Crittenden's (1999) scoring system for clinical populations. This system for scoring the AAI extends the insecure categories to more extreme patterns of attachment including the compulsive dismissing (A+) and the obsessive preoccupied (C+), as well as the combined AC, A/C categories. The reasons for using Crittenden's system for scoring were that the extension and addition of subcategories have proved to be useful with clinical populations.

The hypotheses were that women with eating disorders would show a high proportion of insecure attachment classifications, and that the insecure attachment patterns would be different for each eating disorders type. Further exploration of two AAI specific questions relating to early attachment to fathers expected that women with eating disorders would have mental representations of their early relationships with their father characterised by negativity, particularly for women with bulimia nervosa and bulimic anorexia nervosa.

The Adult Attachment Interview was audio-taped, transcribed verbatim, and then scored by two independent scorers. Sixty participants (97%) were classified insecure. Participants with bulimia tended to be preoccupied (65.4%), whilst participants with restricting anorexia showed an equal distribution of dismissing (42.1%) and combined dismissing/preoccupied (42.1%) patterns of attachment. Women with bulimic anorexia were classified dismissing (33.3%), preoccupied

(46.7%), and combined dismissing/preoccupied (20.0%). The results were significant when tested with $\chi^2 (4, N=60) = 11.337, p = .02$.

Concerning the degree of “negativity” of the mental representation of early attachment to the father, the results were significant with a Chi-square test $\chi^2 (2, N = 62) = 7.589, p = .02$, and concluded that bulimic women were slightly more negative (57.7%) than positive (42.3%), restricting anorexics were more positive (70.0%) and bulimic anorexics were more negative (75.0%).

The results were consistent with theoretical models of eating disorders and attachment theory. The implication for research is the use of the Adult Attachment Interview with clinical populations, especially with Crittenden’s system for scoring. The findings also supported the need to reconsider the DSM VI categories for eating disorders and to include attitudes to food (restricting versus bulimic) for differentiating categories in anorexia nervosa (Johnson & Connors, 1994). For treatment, there is an agreement in the literature that there is no such thing as an *attachment therapy* (Slade, 1999) as a new model of psychological treatment, but that attachment theory and more specifically attachment research have implications for the practice of psychotherapy. The results provide guidelines for appropriate treatments, based on information on the patient’s frame of mind with regard to attachment, and psychological functioning. The defensive function of patterns of attachment inform the therapist on how the patient is likely to engage in the therapeutic process, including building the therapeutic alliance, exploring the transference and the resistance, and relating to the therapist as an attachment figure.

Although the current research concludes that there are significant differences of attachment styles by specific eating disorders categories, the results should be understood only as tendencies. Applying systematically a type of treatment to a person with a specific type of eating disorders would be a misuse for practitioners.

Limitations due to the difficulty of having access to a sample of women with eating disorders suggest that the current study could be replicated within medical institutions where special units for eating disorders would guarantee the availability of a large homogeneous sample. The AAI as a quantitative research tool has proved to be very costly, and qualitative analyses of transcripts would expand the understanding of clinical issues in psychopathology.

Further research was suggested, especially studies including co-morbidity for the sample, as well as normative control groups for the study of the characteristics of mental representations of early relationships with fathers.

Crittenden's system for scoring the Adult Attachment Interview has proved to be useful for the current research, and its application to relevant studies on psychopathology would provide empirical support for further testing its reliability and validity with clinical populations.

As Ward (2000) recently concluded, "there have been more studies published in this area (attachment research in eating disorders) in the last three years than in the entire period up until then" (p. 35). These studies have brought new understanding on the impact of attachment disruption onto the etiology, development, and maintenance of eating disorders. However, it is important to

keep in mind that other factors such as genetic, biological, familial, cultural and personality traits may also play a role in the complex processes that lead to the pathology of eating disorders.

To conclude, anorexia nervosa and bulimia nervosa are mainly messages. They are external ways, for some people, to express their intrasubjective difficulties that cannot be communicated through the usual vehicle of verbal language. The function of psychotherapy, in that sense, is to offer a space where the disorders are interpreted for their symbolic meaning, and where the words gradually replace the symptoms.

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APPENDIX A

DEFINING AN IDEAL WEIGHT

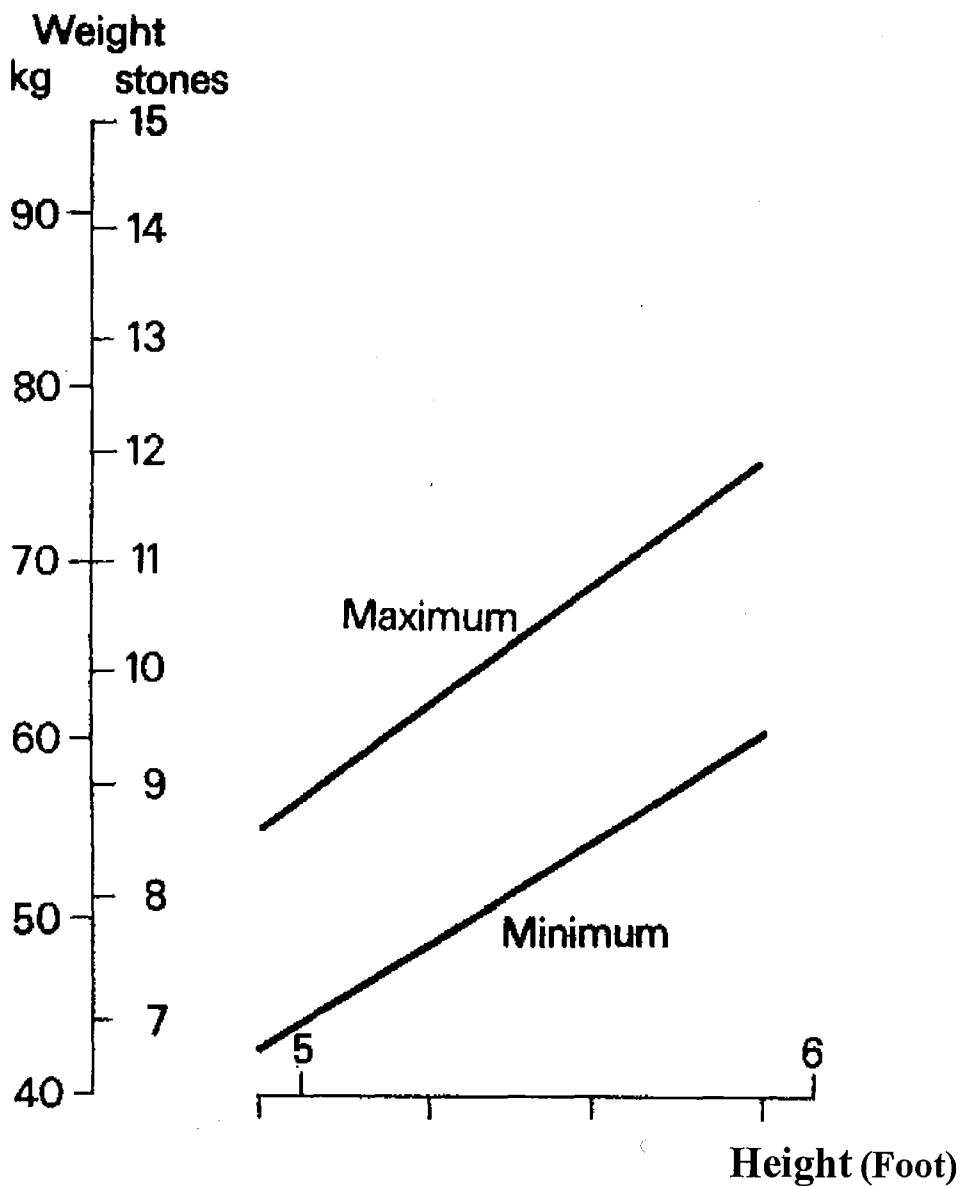


Figure A1: Average Body Weight (ABW) for women, used by insurance companies

From: *Eating disorders. The facts* (p. 23), by S. Abraham and D. Llewellyn-Jones, 1997, Oxford: Oxford University Press.

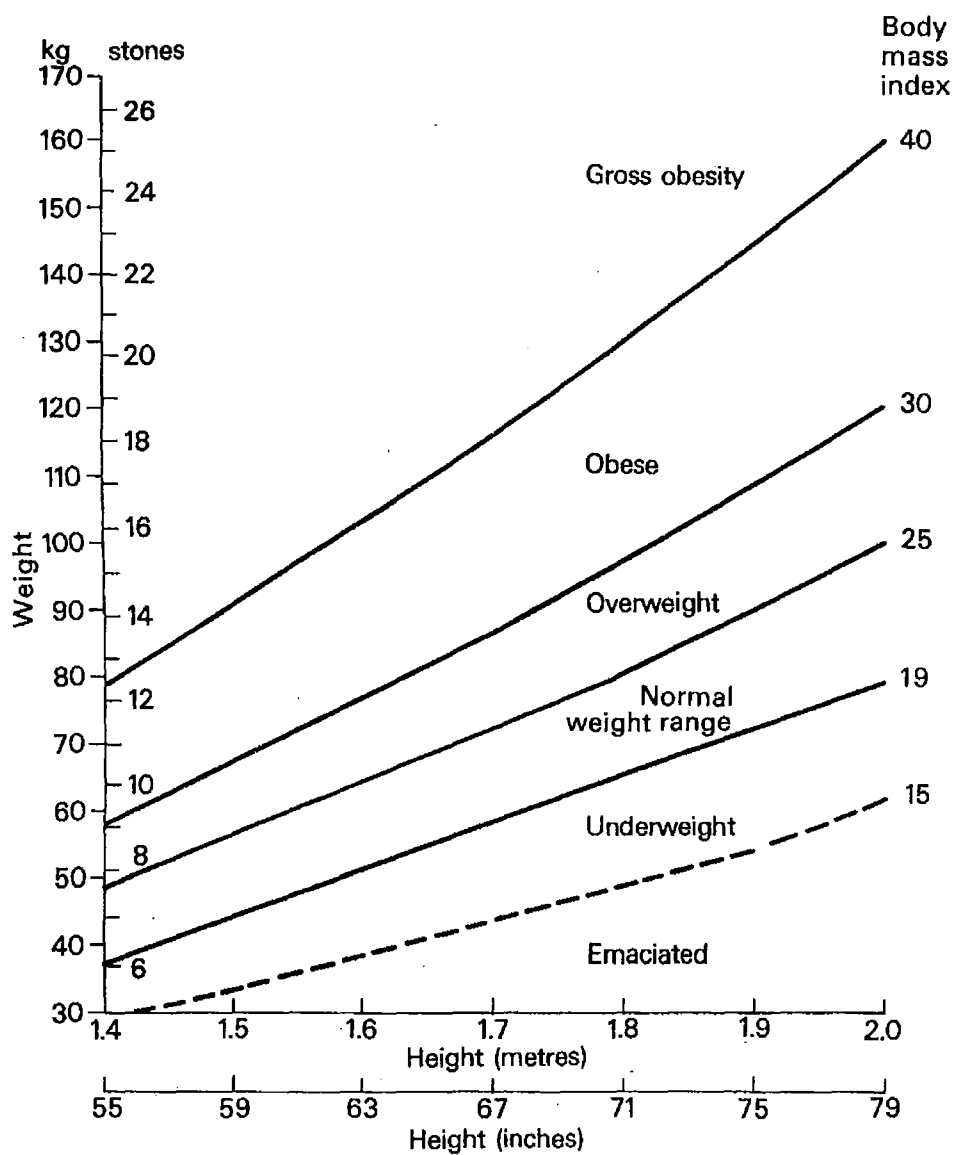


Figure A2: Body Mass Index (BMI) (Quetelet Index)

From: *Eating disorders. The facts* (p. 24), by S. Abraham and D. Llewellyn-Jones, 1997, Oxford: Oxford University Press.

APPENDIX B

**CRITTENDEN' S DYNAMIC-MATURATIONAL MODEL OF ADULT
ATTACHMENT**

Crittenden's Dynamic-Maturational Model of Attachment Adolescent and Adult Patterns

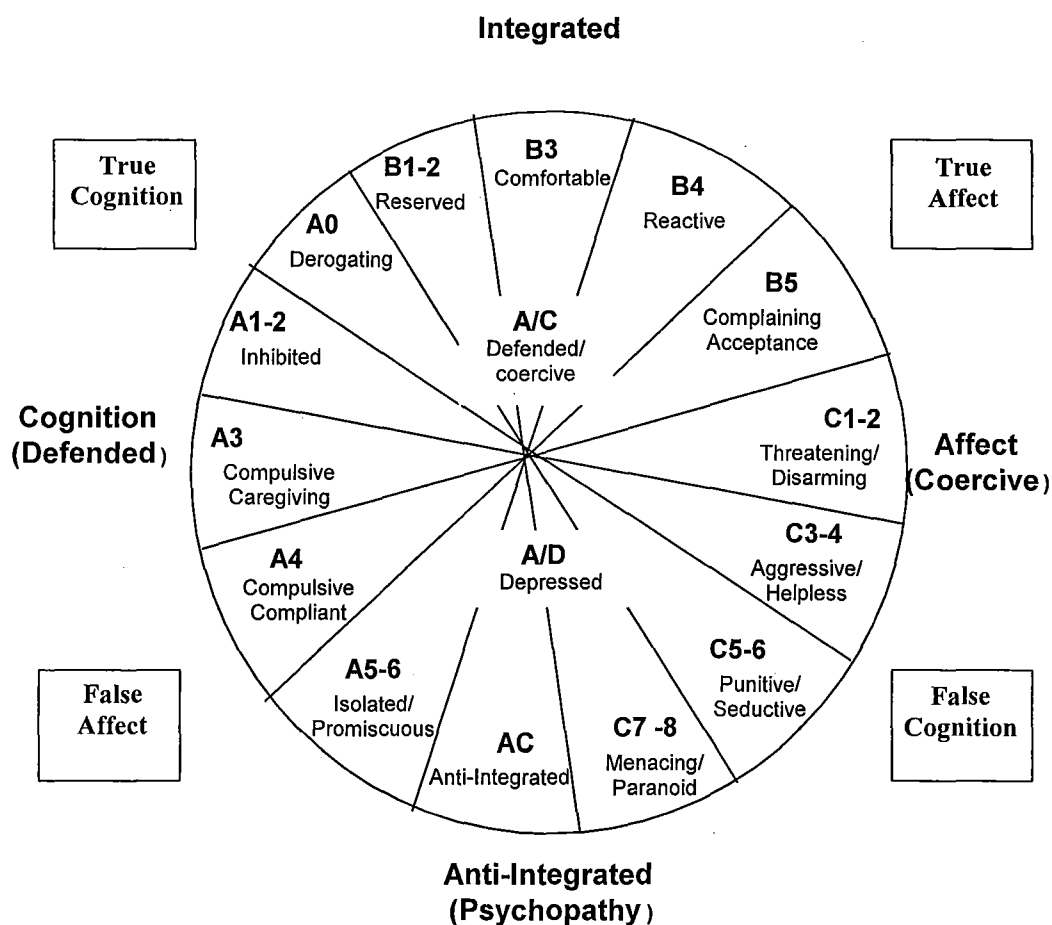


Figure B1: The dynamic-maturational model of attachment (Crittenden)

From: Attachment and psychopathology, by P. Crittenden, 1995, in S. Goldberg, R. Muir, & J. Kerr (Eds), *Attachment theory: Social, developmental, and clinical perspectives* (pp. 367-406). London: The Analytic Press.

Subcategories of attachment classification in Crittenden's (1998) system

Subcategories of the Type B (Balanced)

B1: Distancing from Past

B2: Positive Reframing of Past

B3: Comfortably Balanced

B4: Optimism for Future

B5: Complaining Acceptance

Subcategories of the Type A (Dismissing)

A0: Derogating

A1: Idealising

A2: Distancing

A3: Compulsive Caregiving

A4: Compulsive Compliance

A5: Compulsively Self-Reliant or Isolated

A6: Promiscuous

Subcategories of the Type C (Preoccupied)

C1: Threateningly Angry

C2: Disarmingly Desirous of Comfort

C3: Aggressively Angry

C4: Feigned Helpless

C5: Punitively Angry and Obsessed with Revenge

C6: Seductive and Obsessed with Rescue

C7: Menacing (obsession with revenge)

C8: Paranoid (obsession with rescue)

A/C: alternating combination of defended/coercive strategies

AC: blended combination (anti-integrated, psychopathy)

AD: Anxious Depressed

Classifications in Crittenden expanded system for scoring can be:

- Simple: A or B or C
- Combined: A/C (alternating) or AC (blended)
- Multiple subgroup classifications: e.g.: A1M A4F (dismissing idealising A1 with mother and dismissing compliant A4 with father) or C3F C4M (preoccupied aggressive C3 with father and preoccupied helpless C4 with mother)
- Modified classifications: U (unresolved) trauma and/or loss, Dp (depressed), or DX (disorganised), with are added to the main categories
- Reorganising classifications: e.g.: R(A3 → B1): reorganising from compulsive caregiving A3 towards balanced (distancing from the past) B1.

For more information on Crittenden system, see her unpublished manual (1998):

Patterns of attachment in adulthood: A dynamic-maturational approach.

APPENDIX C

ADVERTISING FOR RECRUITMENT OF PARTICIPANTS

Appendix C1: Article Published in the Community Newspaper

Guardian Express, June 8—14 1999 page 9.

Eating Disorders research looks at early memories

A YOKINE clinical psychologist, who practices in Menora, would like to talk to women with the eating disorders anorexia nervosa or bulimia nervosa.

The free, completely confidential, inter view would take about 60 minutes.

Francoise Spanoghe said the research would mainly explore the way people with eating disorders describe memories of childhood relationships within the family.

For example, do people with eating disorders remember and describe their early experience with their mother and father in a different way to people who do not having eating disorders.

Do anorexics have different memories to bulimics?

Ms Spanoghe said the purpose was not to blame parents.

"As a psychologist, I am interested in increasing the understanding of eating disorders, so as to improve intervention and treatment."

Ms Spanoghe said that for 20 years she had worked with many sufferers, but many aspects of these disorders still puzzled her.

She therefore wanted to study the attachment theory model - a theoretical model in psychology - as part of a PhD at Edith Cowan University.

"This involves looking at what we call the memories in early relationships and experiences within the family," Ms Spanoghe said.

"The models created in the mind might be reality or they might not, but it is what is in the person's mind that is important to us.

Ms Spanoghe said eating disorders affected nine times more women than men. Most were in the 15 to 35-year-old range, but some were younger.

"The proportion of people affected by eating disorders is huge and is increasing," she said.

"It could be cultural, but we don't know at this stage if eating problems are biological.

The environment in which the person lives and their personality, could be factors. Sometimes the disorder stems from trauma, sometimes sexual abuse.

"We don't want to just focus on one of these facets, we look from several perspectives."

Ms Spanoghe explained that anorexics had a very low weight, an intense fear of being fat and a disturbance in body perception. People with bulimia nervosa were usually of normal weight.

Bumilics tended to lose control by binge-eating large amounts of food for a short period. This was followed by compensatory behaviour: vomiting, misuse of laxatives, over-exercising and fasting.

But what these people had in common was an intense concern about food and weight.

Ms Spanoghe would be pleased to provide further information to interested people.

If you wish to volunteer to be interviewed, or would like further information call Ms Spanoghe on 9444 5949 or 9344 6964.

KAE SINCLAIR

Appendix C2: Flyers Distributed at Universities.

RESEARCH ON EATING DISORDERS

**As a clinical psychologist I am currently doing a PhD research at Edith Cowan
University (department of psychology) on**

Eating disorders and Early Attachment to the family of origin.

**For this research, I need a sample of 60 women
suffering from eating disorders
(anorexia and/or bulimia).**

**If you think you have an eating disorder, and you are willing to participate in this
project, please contact me and I will
explain in more detail the purpose and the implication of
the project.**

**Your participation would be to take part in an interview with me, discussing your
childhood experience.**

**All the information you will provide will be *fully confidential* and, to protect your
anonymity, your name as well as names of people and places will be changed.**

I thank you very much for your kind consideration

Françoise Spanoghe

Tel: 9444 5949 (W) and 9344 6964 (H)

E-mail: f.spanoghe@cowan.edu.au

This research has been fully approved by ECU Ethics Committee

APPENDIX D

EATING DISORDERS ASSESSMENT INTERVIEW (EDAI)

EATING DISORDERS ASSESSMENT INTERVIEW

No:

Date:

1- Age: _____

2- Marital status:

Single □

Married or de facto ☐

Separated or divorced ☐

3- Current occupation: _____

4- Current living arrangement:

With parents or relatives ☐

Shared accommodation with friends ☐

conjugal (with partner) ☐

alone □

5- Level of education

post-graduate ☐

graduate ☐

completed high school ☐

some high school ☐

primary school ☐

6- Current weight: _____ Kg

7- Current height: _____ Cm

8- Desired weight: _____ Kg

9- Perception of your weight: (please circle one)

1	2	3	4	5
extremely thin	somewhat thin	normal weight	somewhat overweight	extremely overweight

10- How satisfied are you with the way your body is proportioned?

1	2	3	4	5
Not at all	slightly satisfied	moderately satisfied	Very satisfied	extremely satisfied

11- At your current weight, how fat do you feel?

1	2	3	4	5
Not at all	somewhat fat	moderately fat	very much fat	extremely fat

12- Are there specific parts of your body that you feel fat? Yes No

If yes, which parts of your body? _____

13- During the past month, on the average, how many times have you weighed yourself or measured your body size?

_____ number of times/per week

14- Have you ever been on a diet? Yes No

15- At what age did you begin to restrict your food intake due to concern over your body size?

_____ Years

16- Using the scale below, indicate how characteristic the following statement is of you:
“I have an intense fear of becoming fat, which does not lessen as I lose weight”

1	2	3	4	5
Not at all	somewhat	moderately	very	extremely
characteristic	characteristic	characteristic	characteristic	characteristic

17- Have you ever had an episode of eating a large amount of food in a short space of time (an eating binge)?

Yes No

18- How old were you when you had your first episode? _____ Years

19- How long does a binge episode usually last?

- Less than an hour ☐
- 1 - 2 hours ☐
- more than 2 hours ☐

20- Over the last 3 months, what is the average number of binge eating you have had?

Per day _____
or per week _____
or per month _____

21- Please circle on the scale below, how characteristic the following symptoms are of your eating binge

	Never	Rarely	Sometimes	often	always
I consume a large amount of food during a binge	1	2	3	4	5
I eat very rapidly	1	2	3	4	5
I feel out of control when I eat	1	2	3	4	5
I feel miserable or annoyed after a binge	1	2	3	4	5
I get uncontrollable urges to eat and eat until I feel physically ill	1	2	3	4	5
I binge eat alone	1	2	3	4	5
I binge eat with others	1	2	3	4	5

22- Have you ever vomited after eating in order to get rid of the food? Yes No

23- How old were you when you induced vomiting for the first time? _____ years

24- How long have you been using self-inducing vomiting? _____ months or _____ years

25- What is the average number of vomiting you have had:

per day: _____ per week: _____

26- Have you ever used laxatives to control your weight or get rid of food? Yes No

27- How old were you when you first took laxatives for weight control? _____ years

28- How long have you been using laxatives for weight control? _____ months, _____ years

29- What is the average number of laxatives that you use

per day: _____ per week: _____

30- Over the last 3 months, what has been the average number of times you have engaged in the following behaviours per week?

Binge eating: _____
vomiting: _____
use of laxatives: _____
fasting (skipping meals for a day): _____

31- How often do you currently exercise (including going on walks, riding bicycle, etc.)?

minutes a day: _____
or days a week: _____

32- Does your body weight or shape affect how you feel about yourself as a person?

1	2	3	4	5
Not at all	somewhat	moderately	very much	extremely

Medical history

33- Have you ever been hospitalised for eating problems?

Age: _____
Duration: _____

34- Have you ever been treated as an outpatient for eating problems?

Age: ____

Duration: ____

individual therapy: ☐

group therapy: ☐

family therapy: ☐

medications treatment: ☐

35- Do you have your menstruation? Yes No

36- If not, when did you have the last ones? _____

37- Did you previously loose your menstruation for at least 3 months? Yes No

Thank you very much for your participation.

This interview is based on the “Diagnostic Survey for Eating Disorders - Revised”
(Jonhnson and Connors, 1985).

APPENDIX E

EATING DISORDER CLASSIFICATION SHEET

Subject : _____

DSM IV CRITERIA	Question	Yes	No
ANOREXIA			
A- Refusal to maintain body weight... (less than 85%)	6 & 7		
B- Intense fear of gaining weight or becoming fat	16		
C- Disturbance in body weight experience, influence of weight on self perception or denial of seriousness of low body weight	8 – 12		
D- Amenorrhea	35 – 37		
- restricting type (not engaged in binge eating or purging)			
- binge-eating/ /purging type	17-21 /22 – 29		
BULIMIA			
A- Recurrent episodes of binge eating (large quantity in a short period of time and sense of lack of control)	17-21		
B- Inappropriate compensatory behaviour (vomiting, laxative or fasting, excessive exercise)	22-26; 32; (30)		
C- On average at least twice a week for three months	30		
D- Self evaluation is unduly influenced by body shape/weight	33		
E- Not exclusively during episodes of Anorexia Nervosa			
- purging type (vomiting, laxatives, diuretics, enema)	22-26		
- non purging type (fasting or exercise but not purging)	32		

NOTES :

APPENDIX F

THE ADULT ATTACHMENT INTERVIEW

ADULT ATTACHMENT INTERVIEW

Carol George

Nancy Kaplan

Mary Main

**Department of Psychology
University of California, Berkeley
Berkeley, California 94720**

March 1985

INTRODUCTION

Our lab has started asking parents about the way they feel the kind of parenting they had in childhood has had an effect on them as parents and as people. So, we'd like to ask you about your early relationship with your family, and what you think about the way it might have affected you. I'll ask you mainly about your childhood, but we'll get on to your later years and what's going on right now. This whole interview will probably take us about an hour.

1. Could you start by helping me get oriented to your early family situation, and where you lived and so on? If you could start out with where you were born, whether you moved around much, what your family did at various times for a living?

*this question is used to gain basic data which may be lost elsewhere within the interview.

(Later note: No more than 2 or 3 minutes at most for this whole question.)

----- Did you see much of your grandparents when you were little? If subject indicates that there were grandparents whom she never met, ask whether this (these) grandparent(s) had died before she was born. If yes, continue as follows: **Your mother's father died before you were born? How old was she at the time, do you know? Did she tell you much about this grandfather?**

This question functions to inform us whether the subject's parent's may have suffered early loss of their own parents. The answer to this question will be important to our understanding of second-generation effects of early loss, but it should appear as a casual and spontaneous query on the part of the interviewer.

-----Were there brothers and sisters living in the house, or anybody besides your parents? Are they living nearby now or is your family pretty scattered?

Do not go on to the following question until the subject seems a bit relaxed and oriented.

2. I'd like you to try to describe your relationship with your parents as a young child...if you could start from as far back as you can remember?

Encourage parent to try to remember very early. Many parents say they cannot remember childhood, let alone early childhood, but you should very much shape the questions around starting at least at age five, and gently remind the subject from time to time that if possible, you would like her to think back to this age period.

Admittedly, this is leaping right into it, and the subject may stumble. Indicate in some way that this feeling of difficulty is natural, but indicate by some silence that you would like the subject to attempt a general description of early relationships.

3. Now I'd like to ask you to choose five adjectives that reflect your childhood relationship with your mother. I know this may take a bit of time, so go ahead and think for a minute. Then I'd like to ask you why you chose them.

Not all subjects will be able to think of five adjectives right away, and if it seems too difficult, simply permit the subject to choose one or two adjectives at a time. Be sure to make the word *relationship* clear enough to be heard in this sentence, though without leaning forward and stressing it deliberately. Some subjects do use "relationship" adjectives to describe the parent, but some just describe the parent herself, e.g., pretty, and efficient manager, as though then had only been asked to "pick adjectives to describe your mother". These individual differences are of interest only if the subject has heard the phrase, "that reflect your childhood relationship" with your mother.

The following probe follows either the whole set of adjectives, or follows each adjective as it emerges.

----- Okay, now let me go through some more of my questions about your description. You say she was (you used the phrase) ----- . Are there any memories or incidents that come to mind with respect to her (being) ----- ?

Interviewer continues, as naturally as possible, through each phrase or adjective chosen by the adult. The interviewer is searching here for specific supportive or illustrative memories and incidents. A specific supportive memory or expansion and illustration is sought for every adjective.

This adjective choice has proven very helpful both in starting an interview, and in later interview analysis. It helps some parents to continue to focus upon the relationship when otherwise they would not be able to come up with spontaneous comments. However, since the ability to provide either both an overview and specific memories, or only one, or only the other, it is important the interviewer must press enough in the effort to obtain these overview" adjectives that she/he is reasonably certain that they simply cannot be given. Some subjects will protest reasonably that they "just don't like to think that way"; the interviewer should respond jokingly or amiably, "...just try! Why don't you start with just one or two adjectives". Not all subjects will be able to provide a full five adjectives.

In terms of time to answer, this is usually the longest question. Obviously, some adjectives chosen may be almost identical, e.g., "loving, caring", and you can cover the succeeding probes for supportive memories on these with one question ("You described your mother as loving and caring. Can you illustrate with some memories?") "Protective", however, is importantly different from "loving, caring", and the interviewer should seek for separate, illustrative memories. ("You said she was not only loving and caring, but also protective. Any memories on that one?").

4. Now I'd like you to choose five adjectives that reflect your childhood relationship with your father. I'm going to ask you again why you chose them.

----- Queries as above

5. To which parent did you feel the closest, and why? Why isn't there this feeling with the other parent?

By the time you are through with the above set of questions, the answer to this one may be obvious, and you may want to remark on that ("I think I know the answer to this next question, but I'd like to ask it briefly anyway..."). While the answer to this question may indeed be obvious for many subjects, some -particularly those who describe both parents as loving - may be able to reflect further on the difference in the relationships through the use of this question.

6. When you were upset as a child, what would you do?

This is a critical question in the interview, so as much as possible encourage the parent to think up her own interpretations of "upset" to begin with. The variations in interpretation are important, and here again, the first thing the interviewer should do is to pause quietly to indicate that the question is completed, and that an answer is requested.

Once the subject has completed her own interpretation of the question, with an answer, begin on the following probes. Be sure to get expansions of every answer. If the subject states, for example, "I withdrew", probe to understand what this subject means by "withdrew".

- **When you were upset emotionally when you were little, what would you do? Can you illustrate with specific incidents?**
- **Can you remember what would happen when you were hurt a bit physically? Again, do any specific incidents come to mind?**
- **Were you ever ill when you were little? Do you remember what would happen?**

When the subject pictures going to a parent, see first what details they can give you spontaneously, then ask directly if they were held by the parent, and if so, how.

When this series is over, go back and ask remaining questions with reference to the parent whom they have not mentioned.

Be sure to get expansions of every answer. If the subject says "I withdrew", for example, probe until you understand what the subject means by this, i.e., what exactly she or he did, or how exactly they felt.

7. What is the first time you remember being separated from your parents? How did you or they respond? Are there any other separations that stand out in your mind?

Subjects usually give some first memory of going off to school, or camping.

However, occasionally subjects will volunteer that they hated separations, or hated having the parent work, ask the parents not to leave or were relieved at the thought of separation.

8. Did you ever feel rejected as a young child? Of course, looking back on it now, you may realize it was not really rejection, but what I'm trying to ask about here is whether you remember ever having felt rejected in childhood.

- **How old were you when you first felt this way, and what did you do?**
- **Why so you think your parent did those things. Do you think he/she realized he was rejecting you?**

Interviewer may need to give an example eventually, but at first give parent a good bit of time to respond to/interpret the question.

Many subjects tend to avoid this in terms of a positive answer. It may be helpful for the interviewer to give examples from his/her own life with parents. The interviewer should also be prepared to finally cite examples from earlier in the interview when the subject conceivably would have felt rejected.

9. Were your parents ever threatening with you in any way, maybe for discipline, or even jokingly?

- Some parents have told us for example that their parents would threaten to leave them or send them away from home. A few of our parents have memories of some kind of abuse.
- **Did anything like this ever happen to you, or in your family?**
- **How old were you at the time? Did it happen frequently?**
- **Do you feel this experience affects you now as an adult? Does it influence your approach to your own child?**

Many subjects simply answer "no" to this question. Some, however, have reported abuse, or sexual abuse, often suffering much distress in the memory. It is obviously important when the subject is willing to share memories of this kind for the interviewer to maintain a respectful silence, or to offer active sympathy, or to do whatever may be required to recognize and insofar as possible to help alleviate the distress arising with such memories.

10. How do you think these experiences with your parents have affected your adult personality? Are there any aspects to your early experiences that you feel were a set-back in your development?

Again, in some cases, the subject will already have answered this question. Indicate, as usual, that you would just like some verbal response again anyway, "for the record".

11. Why do you think your parents behaved as they did, during your childhood?

This question is relevant even if the subject feels childhood experiences were entirely positive. For subjects reporting negative experiences, this question is particularly important. The interviewer may eventually need to prompt the subject regarding some of her stated experiences.

12. Were there any other adults with whom you were close, like parents, as a child? Or any other adults who were especially important to you, even though not parental?

Be sure to find out ages, whether this person lived with the child, or had any caregiving responsibilities, and the significance and nature of the relationship.

13. Did you experience the loss of a parent or other close loved one (sibling, or close family member) while you were a young child?

- **Could you tell me about the circumstances, and how old you were at the time?**
- **How did you respond at the time? Was this death sudden or was it expected?**
- **Can you recall your feelings at that time?**
- **Have your feelings regarding this death changed much over time?**
- *If not volunteered earlier.* **Were you allowed to attend the funeral, and what was this like for you?**
- *If loss of a parent or sibling.* **What would you say was the effect on (other parent or) household, and how did this change over the years?**
- **Would you say this loss has had an effect on your adult personality?**
- **How does it affect your approach to your own child?**

13a. Did you lose any other important persons during your childhood? (Same queries).

13b. Have you lost other close persons, in adult years? (Same queries).

Be sure that the response to these questions covers loss of any siblings, whether older or younger, loss of grandparents, and loss of any person who seemed a "substitute figure" to the adult or who lived with the family for a time. Some individuals will have been deeply affected by losses which occurred in the adult years. Give them time to discuss this, and make sure to cover the same issues.

14. Have there been many changes in your relationship with your parents (or remaining parent) since childhood? I mean from childhood through until the present?

Here we are trying to find out, *indirectly*. (1) whether there has been a period of rebellion from the parents, and (2) also, indirectly, whether the subject may have re-thought early unfortunately relationships and "forgiven" the parents.

If the subject does bring up a period of acting up, but it is unclear whether this was real rebellion, probe sufficiently to find out. "Acting up" can be done to gain attention, or to hurt the parents, without constituting a period of real rebellion in the interests of establishing an independence.

Do not ask anything about forgiveness directly. -this will need to come up spontaneously.

15. What is your relationship with your parents like for you now as an adult?

This question moves from reflections on the past to the present, the last couple of years, even this week. Try to find out, indirectly if possible, how much contact the subject has with her parents at present, what the relationship is like currently, sources of satisfaction and dissatisfaction.

16. How do you respond now, in terms of feelings, when you separate from your child?

leave this question exactly as it is, without elaboration, and be sure to give the subject enough time to respond. Subjects may respond in terms of leaving child at school, leaving child for vacations, etc., and this is encouraged. What we want here are the *subject's* feelings about the separation. This question has been very helpful in terms of analyses, for two reasons. In some cases it highlights a kind of role-reversal between parents and child, i.e., subject may respond as though it were the child who 'was leaving the parent alone, as though the parent was the child. In other cases, the subject may suddenly speak of a fear of loss of the child, or a fear of death in general. When you are certain you have given enough time (or repeated or clarified the question enough) for the subject's response, then add:

Do you ever feel worried about child?

17. If you had three wishes for your child twenty years from now, what would they be? I'm thinking partly of the kind of future you would like to see for your child. I'll give you a minute to think about this one.

This question has proven especially interesting with interviews with adolescents, who often bring up issues (fears of disasters, effect on child or family), and it is of interest to let the subject speak or converse long enough here to see the subject's view of such issues in general. In addition, there, is considerable variability in whether the response has psychological elements, e.g., "I hope she grows up to feel she can just be herself, and that she likes herself".

18. Is there any particular thing which you feel you learned above all from your childhood experienced? What would you hope your child might have learned from his/her experiences of being parented?

Give the subject plenty of time to respond to these questions. These questions are intended to help the subject use and integrate whatever she has said or remembered within this interview, for her own benefit and the benefit of the relationship with the child.

APPENDIX G

INFORMATION SHEETS FOR PARTICIPANTS

DISCLOSURE FORM

Project: Ph.D. research on “**Early Attachment and Eating Disorders: A comparative study between Anorexia Nervosa and Bulimia Nervosa**”.

Principal researcher: Françoise Spanoghe

Dear participant,

Thank you for expressing interest in this project. The purpose of this research is to study eating disorders and more specifically the links between early attachment and eating disorders. The potential benefit of this research will be to provide more understanding to the problems of eating disorders and to improve their treatments.

Your participation would be to answer some questions related to your experience as a child in your family of origin because we think that the way you have experienced your childhood relationships has some implications in your current eating problems.

A first interview will gather some general information (such as your age, etc) as well as your eating pattern. This will take about 10 minutes.

A second interview (the Adult Attachment Interview) will explore the relationships and experiences from your childhood. This will take about an hour and will be audio-taped.

These two interviews will be fully confidential and, to protect your anonymity, your name as well as names of people and places will be changed.

All the information you will provide will be used only for this research. Unless you specify, no information will be passed to your treating doctors or any staff members.

If at any time you felt some discomfort or distress, you are allowed to stop the interview and withdraw from the project, and this will not influence in any way your current or future treatment. After the interviews, you will also have time for debriefing during which you are invited to express feedback or comments. If after debriefing you still wanted to talk more about what you felt during the interview, please let me know.

If you have questions or concerns about this project, please feel free to discuss them with me or to forward them to the following address:

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289 Walcott Street

North Perth WA 6006

Tel: 9444 5949 (W) or 9344 6964 (H)

e-mail: f.spanoghe@cowan.edu.au

Thank you very much for your kind participation.

AGREEMENT FORM

I have read the above disclosure form and any questions I have asked have been answered to my satisfaction.

I agree to participate in this project, realising I may withdraw at any time.

I agree that the research data gathered for this study may be published provided I am not identifiable.

Participant:

Date:

Researcher:

Date:

APPENDIX H

COMPARISON OF RESULTS FROM THE TWO SCORING SYSTEMS

Comparison of the results from the current research between Main and Goldwyn’s (1984) system and Crittenden’s (1998) system for scoring the AAI.

In order to classify the sample into different attachment categories, the question of choice of scoring system had to be addressed.

When Main & Goldwyn’s scoring system (1984) was applied to the sample of 62 women with eating disorders, 8 were dismissing (Ds), 11 were preoccupied (E), 2 were secure (F), 15 were cannot classify (CC), and 26 did not fit in subcategories offered by the original system and therefore had to be scored as *others*. The results are presented in Table 19.

Table 19

Attachment Classifications in Main and Goldwyn’s system

Participants	Attachment Classifications				
	Secure	Dismissing	Preoccupied	Cannot Classify	Others
N=62	2	8	11	15	26
Percentages	3.2%	12.9%	17.7%	24.2%	41.8%

The very high proportion of *Others* comprised all the transcripts which cannot be included in Main and Goldwyn’s system subcategories, and correspond to the higher subcategories (A3-6 and C3-8) in Crittenden’s expanded scoring system

(Crittenden, 1998). The Cannot Classify and Others categories together represented a total of 66% of the sample.

When the expanded system of scoring (Crittenden, 1998) was applied to the sample of women with eating disorders, 18 were dismissing (A1-6), 27 were preoccupied (C1-8), 2 were secure (B), and 15 combined dismissing/preoccupied (A/C or AC). An outline of attachment classification in the extended system of scoring is presented in Table 20.

Table 20

Attachment Classifications in Crittenden’s Expanded Scoring System

Participants	Attachment Classifications			
	Secure (B)	Dismissing (A)	Preoccupied (C)	A/C and AC
N=62	2	18	27	13
Percentages	3.2%	29.0%	43.5%	24.2%