The Early Maladaptive Schema model of personality disorder
An assessment of Young & Brown's Schema Questionnaire (short form)

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CORRECTIONS TO Ph.D. THESIS

PAGE iii, LINE 14 replace guanidine with guanosine
PAGE 18, PARA 2, LINE 3 replace conjunction with conjugation
PAGE 21, FIG 1.4 alter diagram to include H2O
PAGE 30, PARA 2, LINE 3 replace effect of with effect on
PAGE 43, PARA 1, LINE 4 replace sub-order muridae with sub-family
PAGE 43, PARA 2, LINES 3 and 7 replace hypolipidaemic with hyperlipidaemic
PAGE 51, FIG.1.8 include legend to define R
PAGE 54, PARA 2, LINE 2 change propranalol to propanalol
PAGE 63, PARA 3, LINE 12 replace include with induce
PAGE 69, PARA 14, LINE 6 delete words between parameters and after
PAGE 71, PARA 2 footnote to indicate purity of radiolabels
PAGE 76, PARA 5, LINE 3 replace 0.6 with 0.06
PAGE 120, TABLE 4.2 replace lower case c with upper case
PAGE 158, PARA 1, LINE 3 replace 450 with 420
PAGE 158, PARA 1, LINE 4 replace 420 with 450
PAGES 178, 179, 181, 183, 185 include error bars on graphs
PAGE 207 PARA 4, LINE 2 replace proliferation with β-oxidation
PAGE 208 PARA 3, LINE 11 replace sulphuric with sulphonic
PAGE 219 PARA 1 LINE 10 new sentence between conditions and acetone
PAGES 17, 28, 50, 97, 151, 163, 172, 188, 218 include missing w
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CONTENTS

1. ACADEMIC DOSSIER

Adult Mental Health Essay
Discuss the efficacy of cognitive behavioural interventions for panic attacks

Long Term Disabilities Essay
Discuss the role of the psychologist in a rehabilitation/continuing care multidisciplinary team and which aspects of a person's care they would be involved in

People with Learning Disabilities Essay
How might you evaluate quality of life changes in people with learning disabilities who have moved from hospital to a community home? Describe the advantages of your chosen approach or approaches

Child and Adolescent Essay
Consider the utility of the diagnostic classification of Attention Deficit Disorder

Specialist Essay
A critical review of the evidence for the different theoretical functions of self-harm

2. CLINICAL DOSSIER

Adult Mental Health Placement
Contract (summary of placement)
Case report summary (Cognitive behavioural assessment and treatment of a client presenting with social phobia)
People with Learning Disabilities Placement 85
Contract (summary of placement) 86
Case report summary (The re-settlement of a thirty-two year old man with profound learning disabilities and a history of challenging behaviour: A psychological assessment) 88

Child and Adolescent Placement 89
Contract (summary of placement) 90
Case report summary (Assessment & intervention with a nine year old boy suffering from obsessive compulsive difficulties and engagement of his parents in therapy) 93

Older Adult Placement 95
Contract (summary of placement) 96
Case report summary (Neuropsychological assessment with an 80 year old woman presenting with ‘memory problems’) 98

Specialist (Forensic) Placement 99
Contract (summary of placement) 100
Case report summary (Working with a forensic patient of afro-caribbean origin to assist in an understanding of his medical diagnosis) 102

3. RESEARCH DOSSIER

First Year Literature Review 105
Who are the men who sexually abuse children? A review of the research literature
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Academic Dossier

All essays are in ascending chronological order
Adult Mental Health Essay

Discuss the efficacy of cognitive behavioural interventions for panic attacks

First Year PSYCHD
Introduction

According to Clark (1986) a panic attack consists of an intense feeling of apprehension or impending doom which is of sudden onset and is associated with a wide range of distressing physical sensations. These sensations include breathlessness, palpitations, chest pain, choking, dizziness, tingling in the hands and feet, hot and cold flushes, sweating, faintness, trembling and feelings of unreality. The unexpected and intense nature of these sensations often leads clients to think they are in danger of some physical or mental disaster such as fainting, a heart attack, losing control or going mad.

Initial aetiological theories of panic were largely grounded in a biological framework due to the seemingly spontaneous nature of most attacks. More recently, however, cognitive, hyperventilatory and conditioning theories have been proposed. Acierno, Hersen & Van Hasselt (1993) provide an eloquent description of the various aetiological theories of panic, including the biological theories and the supporting evidence.

This paper focuses on the cognitive behavioural theory and treatment of panic attacks. As most cognitive-behavioural therapists base their intervention on a cognitive model of panic, this paper continues to outline a cognitive model. It then proceeds to review the evidence to support cognitive-behavioural interventions for panic attacks.

Cognitive Model of Panic

According to Beck (1976) people who suffer from anxiety systematically overestimate the danger inherent in a situation. These overestimates activate the 'anxiety programme' and the fight-flight response. The responses include;

- changes in automatic arousal as preparation for fight or flight
- inhibition of ongoing behaviour
- selectively scanning the environment for possible sources of danger

Clark (1986) advances this theory to produce a model of panic (figure 1). According to this model people experience panic attacks because they interpret their bodily sensations in a catastrophic fashion. This interpretation increases the feeling of panic
and thus the bodily sensations. Hence a vicious circle is formed which must be escaped in order for the panic to decrease.

![Cognitive Model of Anxiety (Clark, 1986)](image)

Westling & Öst (1995) found panic disorder patients compared to normal controls interpreted physical sensations in a more threatening fashion, thus providing support for this model.

Cognitive behaviour therapy (CBT) aims to reduce anxiety by teaching clients to identify, evaluate, control and modify their negative danger-related thoughts and associated behaviours. It focuses on the client’s hypersensitivity to cues of physical arousal and the misinterpretation of these sensations as signalling immediate threat (Telch, Schmidt, Jaimez, Jacquin & Harrington, 1995). A variety of cognitive and behavioural techniques are used to achieve this aim (e.g. see Clark, 1989; Barlow & Cerny, 1988).

**Treatment strategies for panic**
According to Acierno et al (1993) psychological treatment strategies fall into two major categories: Panic management approaches, which endeavour to teach the individual to control his or her anxiety in response to somatic cues, and extinction- or counterconditioning-based procedures, which attempt to sever the connection between
particular somatic cues and panic (Craske, Rapee & Barlow, 1992). Non-psychological treatment strategies surmount to drug prescription.

**Efficacy of treatment strategies for panic: A review of the literature**

**Efficacy of pharmacological treatment**

Klerman (1992) argues it has been firmly established that pharmacological treatment can effectively reduce panic. However in a study evaluating the treatment of panic disorder with agoraphobia, De Beurs, Van Balkom, Lange, Koele & Van Dyck (1995) compared fluvoxamine, placebo, psychological panic management combined with exposure and exposure in vivo alone. They found all four treatments resulted in a significant decrease of agoraphobic avoidance at post test but there was no difference in the effect of fluvoxamine and placebo treatment on panic frequency.

Klosko, Barlow, Tassinari and Cerny (1990) employed a controlled group design to evaluate the relative efficacy of CBT, alprazolam, a waiting-list control and a drug placebo in the treatment of panic disorder. CBT for panic control, alprazolam, and drug placebo were significantly more effective than waiting-list control in reducing panic frequency. However, only CBT resulted in significantly more participants (87%) reporting zero panic attacks at post-test than placebo (36%) and waiting-list control (33%). Alprazolam, falling between CBT and control conditions (50%), was not significantly different from any other group. These studies (De Beurs et al, 1995; Klosko et al, 1990) do not appear to support Klerman's argument that pharmacological treatment can effectively reduce panic.

**Efficacy of treatment with exposure**

Literature reviews (e.g. Michelson & Marchione, 1991) conclude that the optimal treatment for patients suffering from panic disorder with agoraphobia consists of panic management techniques, either pharmacological or psychological, combined with exposure in vivo (De Beurs et al, 1995).
Combining coping statements with exposure-based procedures has proven effective in the treatment of panic disorders (Kleiner, Marshall & Spevack, 1987), even though similar procedures have been found to distract and thereby dilute the extinction effect during exposure treatments of simple phobias (Bordon, 1992).

Barlow, Craske, Cerny and Klosko (1989) employed a controlled group design to compare the relative efficacy of (a) exposure plus cognitive therapy, (b) relaxation training, (c) exposure plus cognitive therapy plus relaxation therapy and (d) a waiting-list control group in the treatment of panic disorder. 33% of the waiting-list control, 40% of the relaxation, 79% of the exposure plus cognitive, and 74% of the combined condition reported zero panics at post-treatment (relaxation did not significantly different from waiting-list control). Craske, Bran and Barlow (1991) report that, at 2-year follow-up, gains were maintained for the conditions containing exposure and cognitive restructuring (81% panic free), but not for the relaxation group.

Griez and van den Hout (1986) employed a controlled group design to evaluate the relative short-term effectiveness of an extinction-based exposure treatment (carbon dioxide inhalation) and a pharmacological intervention. Carbon dioxide exposure led to a 58% improvement on a self-report inventory designed to assess ‘fear of automatic sensations’, compared to an 8% improvement produced by propranolol. However, no significant between-group differences were evident on measures of state anxiety, though the trend was in favour of carbon dioxide therapy. It appears, therefore, that simple exposure to one of several potential interceptive cues associated with panic is a moderately effective treatment across at least two response channels (subjective and behavioural) and provides some support for the conditioned basis of panic attacks (Acierno et al, 1993). Hence, exposure appears to be an important component of any intervention for panic attacks.

**Efficacy of relaxation training**

individual therapy for 14 one-hour sessions. In the AR condition, Öst attempts to replace the conditioned response of panic with a new conditioned response of relaxation during exposure to conditioned internal stimuli. While both interventions were beneficial, the AR condition was superior at post-treatment and follow-up. Interestingly, Barlow, Cohen, Waddell, Vermilyea, Klosko, Blanchard & Di Nardo (1989) did not find AR to be as nearly as effective as Öst (1988).

**Efficacy of CBT for changing cognitive bias**

Westling & Öst (1995) found cognitive behavioural treatments reduced the interpretation of bodily sensations as threatening and CBT and AR were equally effective in this respect. Moreover, compared to patients suffering from panic, panic-free patients had reduced their cognitive threat bias at post-treatment and follow-up to a significantly larger extent.

Salkovskis, Clark and Hackmann (1991) employed cognitive therapy without exposure or breathing retraining in an attempt to eliminate speculation concerning the mediator of therapeutic change, in addition to highlighting the importance of focused cognitive interventions in the treatment of panic attacks. Results indicated that Focused Cognitive Therapy (FCT) reliably changed participants’ level of belief in catastrophic misattributions. Frequency of reported panic attacks dropped after initiation of focal therapy in six of seven participants by an average of 55%. Non-focal therapy was largely ineffective. It appears, then, that cognitive therapy in isolation is effective in reducing self-reported panic attacks for at least three weeks (longer follow-up measures not recorded). Such success is notable in that the entire treatment took place over only 5 hours in two sessions. Unfortunately, the researchers report that one participant (12% of the participant pool) experienced a reduction in panic frequency during baseline and was therefore not included in the data analysis. This possible misuse of experimental design means the results must be interpreted with caution (Acierno et al, 1993).
Efficacy of CBT for reducing panic attacks

Telch et al (1995) cite three uncontrolled and seven controlled studies which provide evidence to suggest that CBT is effective in the treatment of panic disorder. In a recent study, Beck, Sokal, Clark, Berchick and Wright (1992) employed a controlled design to examine the relative efficacy of focused cognitive therapy and Rogers’ (1951) supportive therapy based on unconditional positive regard. Within-group analysis of the thirty three participants revealed that participants in the cognitive therapy condition reduced their ratings of panic frequency by 84% at post-test; clinician’s ratings of panic were reduced 93%. Non-directive, supportive therapy achieved gains of 36% and 30%, respectively, on the same measures. Follow-up revealed that 85% of the cognitive therapy group remained panic free at the one-year point.

Michelson, Marichone, Greenwald, Glanz, Testa and Marchione (1990) examined the effectiveness of an integrated program utilising cognitive-behavioural therapies for Panic Disorder. Treatment comprised of cognitive model of panic-derived procedures, cognitive therapy and AR training. Their analysis indicated statistically significant improvements. All of the ten participants were free of spontaneous (uncued) panic attacks at post-treatment and all met operationalised criteria for high endstate functioning.

Sokol-Kessler and Beck (1987) conducted an open trial of the Cognitive Model of Panic treatment for 26 Panic Disorder with Agoraphobia or Panic Disorder participants. Significant improvements were observed on all panic measures with a pre-treatment mean of 4.5 panic attacks per week which decreased to zero at post-treatment and continued in remission up to the one year follow-up.

Clark, Salkovskis and Ghalkley (1985) reported an open trial of Cognitive Model of Panic treatments (CMP) consisting of diaphragmatic breathing, panic evocation and breathing retraining with a sample of 18 individuals presenting with panic and varying degrees of phobic avoidance. There were no dropouts and participants exhibited
significant decreases in panic with only 12.5% relapse rate at follow-up. Similarly, Salkovskis (1986a, 1986b) found significant decreases in panic frequency for nine individuals presenting with panic in an open trial of CMP treatment. Both of these studies revealed consistently large decrements in panic frequency.

Gitlin, Martin, Shear, Frances, Ball and Josephson (1985) treated 11 Panic Disorder participants in an open trial using cognitive-behaviour therapy for an average of 14 weeks. Participants received education about panic physiology, panic management, relaxation training, diaphragmatic breathing, cognitive coping skills, imaginal and in vivo exposure. At post treatment, 91% of the Panic Disorder participants were panic free. Five month follow up data revealed maintenance of these treatment effects. Barlow et al (1984) treated 5 Panic Disorder participants with a treatment package consisting of biofeedback, relaxation training and cognitive restructuring of anxiety provoking thoughts. Participants improved on clinical ratings, physiological measures, self-report and panic variables relative to waiting-list controls.

Comparing studies
As cogently discussed by Kazdin (1984) the contributions and limitations of clinical trials to the development of effective treatments varies as a function of experimental rigor, screening criteria, treatment fidelity, quality of supervision and therapist expertise. The studies cited in this paper vary in terms of assessment measures used and lengths of treatment. Some studies have considered group treatment (e.g. Michelson et al, 1990), whilst most evaluate individual treatment programmes. Many studies only report post treatment effects and not longer term results. Those that report follow-up data, do not always specify the time duration between treatment and follow-up (e.g. De Beurs et al, 1995; Westling & Öst, 1995).

Due to the differences between studies it is difficult to compare treatment results. It is also difficult to generalise the results from these studies. There appears to be a general assumption that both the therapists and the clients are homogenous groups and experimental designs do not appear to allow for individual therapist or client
differences. This is not aided by the fact that participant pools seem to be relatively small.

Most of the studies cited in this paper refer to criteria as applied in the DSM-IV (APA, 1994) predecessors (i.e. DSM-III-R and DSM-III) for identifying an individual as suffering from panic disorder. It is likely that in future studies DSM-IV criteria will be used. Considering the already many differences between studies, it is plausible this extra variable will make inter-study comparison more difficult in the future.

Having considered these points and since unique dimensions of the clinical trial paradigm can enhance treatment effects, issues concerning replicability and generalisation can only be resolved via comparative outcome research (Michelson et al, 1990). Comparative research will provide discrepancies between findings, e.g. Barlow et al (1989) and Öst (1988), however as the CBT research shows, similarities are beginning to emerge.

**Conclusion**
Researchers have developed interventions for panic disorder that are consistent with their chosen aetiological framework but combinations of treatments which address possible multiple causal pathways have been found to be relatively more effective than interventions based on only one aetiological perspective (Acierno et al, 1993).

Whilst the results of the treatment evaluation studies do not lead to a consensus on the best treatment strategy, results do suggest cognitive interpretations of bodily sensations play a role in people’s experience of panic attacks, (e.g. Westling & Öst, 1995).

As Acierno et al (1993) conclude, pure cognitive interventions do seem effective (e.g. Salkovskis et al, 1991) but long-term follow up data is not currently available. Whilst exposure treatment appears to play a role in reducing the frequency of panic attacks (e.g. Barlow et al, 1989), pure interoceptive exposure treatments which omit anxiety
management training and cognitive restructuring procedures appear only moderately effective and equal to some pharmacological treatments (e.g. Klosko et al, 1990). Addition of cognitive strategies to interceptive-exposure and anxiety management techniques produces comprehensive interventions that address all possible aetiological origins of panic and, as a result, are most efficacious in its amelioration and removal, (e.g. Barlow et al, 1989; Craske et al, 1991).

To summarise, as the research data currently stands;

- CBT seems largely effective in the long term reduction of panic.
- Exposure as part of a CBT programme appears to have the potential to increase treatment effectiveness.
- CBT appears to consistently show significant improvements in panic frequency where as the data on the efficacy of pharmacological and general relaxation training appears unclear.
- More outcome research of good experimental design is required before it can be concluded which treatment strategy provides the most consistent, positive, long term results.
References


Long Term Disabilities Essay

Discuss the role of the psychologist in a rehabilitation/continuing care multidisciplinary team and which aspects of a person’s care they would be involved in.

First Year PSYCHD
INTRODUCTION

This paper provides an overview of the services a psychologist could provide when working within a multidisciplinary team. It focuses on the rehabilitation and continuing care of people with long term mental health issues but this should not be taken to mean the roles described here are unique to working with this client group. The psychologist could provide the services outlined here to clients and professionals in other sectors of mental and physical health, for example, primary care, neuropsychological rehabilitation or child and adolescent services.

Relative to other health care professions, clinical psychology is a small profession. Recruitment and retention difficulties among psychologists have led to an upward regrading of jobs at a rate that cannot be supported by the financial resources of purchasers (Shillitoe & Hall, 1997). The purchasers are seeking alternatives. The use of psychological techniques by other professions and psychology’s relationship to these professions is under question (Guinan, 1990). Other NHS professions, particularly Community Psychiatric Nurses, increasingly seek a role in counselling or therapy. These services are usually cheaper than those provided by clinical psychology. Within this climate, why should psychology be purchased? In terms of the future of the profession, defining clinical psychology’s potential role has become essential. Indeed the MAS report (1989) concluded there was a pressing need for psychology to decide its core roles and skills.

The potential role and function of a clinical psychologist within a multidisciplinary team varies depending on both the particular philosophy of the service and the orientation and personalities of other team members. This paper discusses the various roles of the clinical psychologist but first it is useful to be clear what is meant by rehabilitation and continuing care.

REHABILITATION AND CONTINUING CARE

Rehabilitation is concerned with both skills training and prompting community re-integration. It is concerned with a philosophy rather than just a set of techniques
It is not only about the 'treatment of symptoms' but also includes helping the individual cope with symptoms. Certainly, rehabilitation, continuing care and its relationship to clinical psychology is changing. Historically rehabilitation has occurred within large psychiatric hospitals. The majority of these hospitals are either closed or in the process of being closed. In future the proper focus for rehabilitation will be on the community mental health services (Pilling, 1995).

THE ROLE OF THE CLINICAL PSYCHOLOGIST

The role of a clinical psychologist encompasses that of a clinical supervisor, which itself includes being a teacher, a consultant and a counsellor (Bernard, 1984, cited in Beauvais, Spooner & Oetting, 1991). Beauvais et al (1991) identified many characteristics of the psychologist including awareness of environmental influences, ability to form treatment or supervision plans, ability to analyse and predict behaviour and treatment and ability to interpret general test and interview data.

The psychologist's role with clients is often ambiguous. Searle (1991) analysed the types of clients seen by a Community Mental Health Team (CMHT) in Derby and compared the Community Psychiatric Nurses' (CPN's), Occupational Therapists' (OT's) and Psychologist's contacts. She found the psychologist saw mostly clients who had been diagnosed as suffering from anxiety and those she classified as having a diagnosis as 'other' or 'uncertain'. The CPN's saw mostly clients suffering from schizophrenia and the OT's greatest client input was with clients suffering from dementia. So even though there appears to be no clear definition of who sees whom, individual teams appear to have formed some form of categorisation of clients by professional input.

THE ROLE OF THE CLINICAL PSYCHOLOGIST WITHIN THE MULTIDISCIPLINARY TEAM

There appears to be uncertainties both within and between professions as to the role of the psychologist within a multidisciplinary. If no uniform definition exists it is hardly surprising the purchasers are requesting clarification.
Some argue psychologists should play a central role in the team, being responsible for the treatment plan, assessing progress, for programme evaluation and, in many instances, supervision of treatment staff (Beauvais et al, 1991). Social disablement however is an amalgam of clinical disorder and social difficulties suggesting a combined professional approach is essential (Ekdawi & Conning, 1994). Clinical psychologists do not always readily identify with CMHT’s and can feel their professional identity is threatened by team members (Gournay, 1995). Unfortunately a sharp split between medical and vocational rehabilitation services can be counter productive and may undermine the programme’s effectiveness (Lang & Rio, 1989).

Working within a multidisciplinary team is not always easy, there are not only different theoretical backgrounds present but different personalities as well. This is an important consideration. Beauvais et al (1991) made an eloquent point when he stated ‘Nothing is more demoralising to team members than to have an “outside expert” periodically dismiss their plans and replace them with a different set of professional opinions. In short, the psychologist must listen carefully and integrate his or her contribution with the goals of the team and the client’. An effective team needs to be a judicious blend of independence and co-operation, of assigned and self-initiated responsibilities and flexible functioning. The level of interaction of team members must be very high. This highlights the apparent need for the psychologist to be part of the team and not a ‘visiting consultant’.

THE PSYCHOLOGICAL ASSESSMENT
Reasons for assessment include description of difficulties, level of functioning and diagnosis. Assessment can include the identification of the opinions, wishes and satisfaction of the individual and of their need for care. It is also essential in terms of monitoring the effectiveness of treatment and the client’s progress or deterioration.

Psychometric assessment is often mentioned when discussing core skills of the psychologist. The reality is that psychologists largely avoid this role choosing to
promote a comprehensive psychological formulation and recommendation for treatment (Alexander, 1992). The benefit of work as a rehabilitation tool has been long known (e.g. Schwartz, 1976) and whilst intelligence is not a predictor of either work performance or future employability, it can predict the choice of level of job. Similarly, tests of vocational aptitude do not predict employability but are of value in exploring skills, training potential and providing focus for vocational counselling (Ekdawi & Conning, 1994).

Assessments need to tailored to the individual client and the care team. The psychologist must gauge what is essential information and at what point assessment becomes more of a burden than the care staff can handle. There is no point attempting to implement a battery of assessment tools if staff or carers do not have the time to complete them. Psychologists are trained not only in the administration of tests but in the design of them. This means they can be flexible in their approach to assessment drawing on their knowledge of existing tools and their knowledge of forming and adapting assessments.

Their ability to design standardised assessment tools is not only important for the individual client but for the field as a whole. Tools such as the Rehabilitation Evaluation of Hall and Baker (REHAB; Baker and Hall, 1983) and the Independent Living Skills Survey (ILSS; Wallace, 1986) are widely used and enable consistency of monitoring.

Psychologists are aware the perfect assessment instrument does not exist (Ekdawi & Conning, 1994). Other professionals often look at the end ‘score’ of a test and take this result as gospel, particularly in the case of IQ scores. Psychologists are trained to consider environmental and personal influences on a person’s behaviour and to use test results as part of a formulation. Psychologists are able to bring this skill to multidisciplinary teams.
PSYCHOLOGICAL INTERVENTION

A treatment plan is based on knowledge of the client and on the abilities and skills of the treatment team. The psychologist can use their research skills to analyse treatment plan effectiveness. Training in measurement and knowledge of experimental research design enables psychologists to develop programme evaluation plans, including the evaluation of plans made using the Care Plan Approach, (CPA).

In terms of individual client work, perhaps the most widely documented psychological intervention with this client group is Cognitive Behavioural Therapy (CBT). CBT can help sufferers of schizophrenia by reducing the frequency of the level of distress caused by strange beliefs, by alleviating depression and by helping those who have difficulty motivating themselves. Factors such as family or environmental stress are known to precipitate relapse in schizophrenia and cognitive behavioural intervention can modify these (Birchwood & Tarrier, 1994).

Families and carers can also benefit from psychological intervention. Counselling is an essential rehabilitation tool (Ekdawi, 1981) for both the client and their families and psychologists possess a knowledge of both general counselling and psychotherapy theory (Beauvais et al, 1991). For a long time psychologists have seen clients suffering from depression, bereavement and loss. Families with a member with long term mental health needs, can also suffer these difficulties.

Psychologists are trained in thinking in terms of models and theories. A model provides a framework for thinking about a particular issue or problem. It allows hypotheses about outcome of intervention to be made and tested (Ekdawi & Conning, 1994). Psychologists can attempt to instil this approach into the multidisciplinary team.

The psychologist can also bring to the team a way of thinking based on the theories of learning. The most obvious example of how this has been used is the, now controversial, 'Token Economy Programmes'. Positive reinforcement was presented in the form of tokens given in response to desired behaviour. These programmes are not
widely used these days, however the theories can still be taught and applied. The theories of learning provide a strong alternative to more medical models.

Often, when considering this client group, skills training is considered a vital intervention. For many health professionals, including psychologists, skills training for those with severe and persistent mental illness has been synonymous with social skills training. However, interventions can also include cognitive and emotional skill training (Gournay, 1995) which psychologists are trained to implement.

Rehabilitation can also include training in the constructive use of leisure time. This is usually based on a combination of behavioural skills training, counselling and assistance in developing social networks (Ekdawi & Conning, 1994). The most obvious place of input for a psychologist would be in the first two approaches, however problem-solving techniques would be one valuable tool for the third.

One main area of difficulty with this client group is their motivation to attend and comply with therapy. Psychologists often apply motivational interviewing techniques when working in substance misuse. They should also be able to apply this intervention with this client group and their carers.

SUPERVISION AND CONSULTANCY
The number of psychologists working in a consultancy or supervisory role is gradually increasing. Psychologists are also starting to head teams in oppose to them being lead by consultant psychiatrists. Caplan (1970, cited in Orford, 1992) distinguished between four types of consultation, all of which can apply to psychologists;
I. Client-centred consultation. Here, the consultation focuses on the client’s problem and how the consultee can best assess and treat it.
II. Consultee-centred case consultation. The focus here is on the consultee’s difficulty in working with a client or clients.
III. Programme-centred administrative consultation. This is concerned with the effective planning of a treatment programme for multiple clients.
IV. Consultee-centred administrative consultation. The focus of this consultation is like number II but instead of focusing on the consultee’s difficulties, the focus is on the difficulties of the group, team or agency involved in the client’s care.

The consultee can be anybody involved with the client, for example, a member of the health care team or a member of the client’s family. Consultation need not focus on clients but also on helping staff to cope with the challenges and changes to their roles. This aids staff to make maximum use of their knowledge and skills.

THE PSYCHOLOGIST AS A TEACHER

In relation to this client group the people a psychologist may be teaching can be categorised into three groups; the clients, other care professionals and lay people involved with the client’s care e.g. their families and friends or volunteer support workers.

Orford (1992) illustrates a range of psychological education activities including training other professionals in methods of behavioural assessment and behavioural therapy. Teaching can include providing information about an aspect of care or about the client’s problem and treatment. It can be on a one to one basis or to a group of people. It can be general, e.g. ‘what do we know about the effectiveness of therapy on schizophrenia?’ or it can be specific to a client, e.g. ‘what is the expected prognosis for client A who has been diagnosed as suffering from schizophrenia?’ In summary there are many issues a psychologist can educate others in and there are many different groups of people who may find this of benefit.

CONCLUSION

"Do we have something specific to offer by virtue of being psychologists or is our contribution mainly as a behaviourist, cognitive therapist, psychodynamic therapist, etc.?"

(Alexander, 1992)

Psychologists can fulfil many roles. As this paper has outlined, psychologists can be therapists, teachers, consultants, supervisors and researchers. They can be involved in
the client’s assessment and treatment. Clients can be patients, their families, their carers and other professionals involved in their care. Input can be provided into individual client cases and larger treatment programmes. Psychologists can devise, evaluate and analyse individual and group treatment. Using their research skills they can fulfil the role of clinical auditor. They can also use, adapt and devise standardised assessment tools. Finally, but by no means least, psychologists can bring a knowledge of psychological therapies, theories and models to treatment and to the care team.

On a final note, it is important to remember that psychologists are trained therapists. Often wanting to work with clients is the main reason people enter into this career. Selling psychologists as having the skills to fulfil a consultancy role and as being able to provide planning, research and teaching input, may result in less opportunity to be involved in direct client contact. The clinical psychologist’s role should incorporate the use of all their skills, including direct therapeutic work with clients.
REFERENCES


People with Learning Disabilities Essay

How might you evaluate quality of life changes in people with learning disabilities who have moved from hospital to a community home?
Describe the advantages of your chosen approach or approaches.

First Year PSYCHD
Since the late seventies, there has been a move away from hospital care for people with learning disabilities (PLD) to community based services (e.g. report by Jay committee; DHSS, 1979). The move from long-stay hospitals to the community setting has generally been seen as a positive step forward (Cooke, 1997) and on the whole, has been considered to provide PLD with a better life and lifestyle (Emerson and Hatton, 1994).

Much of the research regarding the move to 'care in the community' has considered the effect on the person's quality of life. However, definitions of quality of life vary (see Brown, 1990) and Hughes, Hwang, Kim et al (1995) in their review of the literature published between 1970 and 1993, identified 44 separate definitions. A common theme appears to be the identification of quality of life at a specific moment in time. For example, Barry, Crosby & Bogg (1993) refer to quality of life as 'a sense of well-being and satisfaction experienced by people under their current life conditions' and Young & Longman (1983) state quality of life is 'the degree of satisfaction with perceived present life circumstances'. These examples have been taken from non-PLD literature, but appear consistent with the notion of quality of life within PLD research. Additionally, it has generally been recognised that quality of life is not a constant construct and varies over life span. Responses to quality of life measures have been found to 'reflect change with age and level of disability' (Brown, 1990).

Many authors recognise quality of life encompasses both the objective conditions of a persons life and their subjective satisfaction with life (e.g. Emerson, 1985; Felce & Perry, 1995a). Hence a holistic approach to the measurement of quality of life is viewed as essential (Goode & Hogg, 1994). In evaluating the quality of life of people with learning disabilities many studies (e.g. Murphy, Holland, Fowler & Reep, 1991) have used O'Brien's five accomplishments (O'Brien, 1987). Measures such as Compass: A multi-perspective Evaluation of Quality in Home Life (Cragg & Look, 1992) have been designed to assess the degree to which the lives of PLD in residential provision are consistent with the normalisation principles as set out in the five accomplishments.
One of the larger scale studies is that of Knapp and his colleagues: Knapp, Cambridge, Thomason et al (1992) monitored and evaluated the move of people from hospital to community care. The study comprised of 28 pilot projects, 11 of which were designed to support the move of PLD and collectively involved the move of over 150 people. This essay describes a method for evaluating quality of life changes in PLD who have moved from hospital to a community home. It draws on the work of Knapp et al (1992) and, like much of the published research, considers O’Brien’s five accomplishments of community presence, choice, competence, respect and community participation.

Sources of Information
Most studies have used care staff as informants (see Dagnan, Howard & Drewett, 1994). However, addressing the people with learning disabilities themselves has been recommended by a number of authors (e.g. Allen, 1995; Evans, Beyer & Todd, 1987). Bowd’s (1989) findings that the criteria used by professionals to assess quality of life differed from those used by the clients themselves, supports addressing the individuals themselves. An alternative to the care staff involved with the client would be to interview the client’s relatives. However, as indicated by Knapp et al, this would include additional cost which the researcher may not have the funds to cover.

In terms of gaining a true representation of the quality of PLD lives, without involving additional cost, the research suggests the best sources of information are the PLD and their carers.

Comparison Group
Ideally measures of quality of life should be taken pre and post move. This would allow a direct comparison of the quality of life of people when they lived in hospital with the quality of their lives whilst living in community accommodation. However, the current essay aims to present an approach to evaluate quality of life changes in a group of PLD who have already moved.
Although most hospitals for PLD have now closed, some are still in the process of being closed, e.g. St.Ebba's in Epsom, Surrey. Therefore a matched-subject design would be possible. Research participants could be matched for sex, age and level of disability. Using this matched-subject design would allow data to be gathered to answer the research question of whether 'community care' provides PLD with a better quality of life. It would not, however, provide a comparison with a non-PLD population. Therefore, a third subject group would be required and like the hospital group, this population could be matched for sex and age. In order to maximise available resources, this group could be comprised of the carers of the PLD population.

**Measures**

A large number of quality of life measures exist. In their review of the quality of life literature, Hughes et al (1995) identified 1,243 measures, most designed to measure one aspect of quality of life. Perry & Felce (1995a; 1995b) compared fourteen objective quality of life measures, finding many of the measures overlapped. Therefore in choosing the following measures thought has been given to the aspect of quality of life they have been designed to measure, ensuring a minimum overlap between them.

**Skills and Behaviour questionnaire** (Knapp et al, 1992)

This questionnaire provides descriptive data regarding people's abilities. It also gives an indication of the public services a person can use, for example, public transport. It is an adaptation of the Social Performance Scale (Wykes, 1982; Wykes & Sturt, 1986) and includes additional items from the Disability Assessment Schedule (Holmes, Shah & Wing, 1982), the AAMD Adaptive Behaviour Scale (Nihira, Foster, Shellbass & Leland, 1974) and the Rehabilitation Evaluation Scale (Hall & Baker, 1983). The questionnaire is said to have good validity and reliability (Cambridge, Hayes & Knapp, 1994).
Administration: This questionnaire can be administered by care staff. The staff's knowledge of the client means data collection will be quicker than if an outside researcher completed the scales.

**Environment Questionnaire (Knapp et al, 1992)**

This questionnaire rates physical and social environments of residential facilities. It was developed from the work of Raynes, Pratt & Roses (1979), the PASS instrumentation (Wolfensberger & Glenn, 1975) and Apte’s Hospital and Hostel Practices Profile (Apte, 1968; Wykes, 1982). It is said to have satisfactory reliability and validity (Knapp et al, 1992).

Administration: This questionnaire should be administered by an outside researcher. It is possible that carers may present a biased opinion in terms of the environment their clients are living in and although this is an objective measure, experimenter bias could confound the results.

**User Questionnaire (Knapp et al, 1992)**

This questionnaire is designed to measure attitudes and feelings of residents. It is comprised of a number of scales, including Seltzer and Seltzer’s (1983) Satisfaction Questionnaire for people with learning disabilities, Wykes’ (1982) Assessment of Satisfaction with Services, Cantril’s Ladder (1965), the Morale subscale of the Psychosocial Functioning Inventory (PFI; Feragne, Longabaugh & Stevenson, 1983), the Wakefield Depression Inventory (Snaith, Ahmed, Mehta & Hamilton, 1971), the Personal Presentation Checklist* (Knapp et al, 1982) and the Henderson’s Interview Schedule for Social Interaction* (Henderson, Bryne & Duncan-Jones, 1981).

Administration: Again, to reduce the possibility of experimental bias, these should be administered by an outside researcher. Unfortunately, many of these scales may not be able to be completed due to severity of a client’s learning disability. However, the scales marked with * could be administered through asking care staff.
Diaries

Diaries are frequently referred to within the research literature (e.g. Dagnan, Trout, Jones & McEvoy, 1996). In terms of this study, diaries are not required in order to measure frequency of social contacts as this is covered by the Interview Schedule for Social Interaction. However, diaries will provide information regarding peoples engagement with other residents, staff and people from outside their home. Other studies have used direct observation (e.g. Jahoda & Cattermole, 1995) however this is labour intensive and in terms of activities outside the home, good agreement has been found between diary records and direct observation (Dagnan et al, 1994).

Administration: Most residential accommodation, whether it be a hospital or within the community, should keep records of the residents daily activities. In order to maximise available resources, care staff should complete the diaries. In order to gain a global picture of the persons activities, these diaries should be kept over a period of one month.

With the exception of the diaries, all of the above instruments were used by Knapp et al.

The Five Accomplishments

This study has been designed to assess the quality of life of PLD following their move to community accommodation. It has included measures which assess factors linked with the normalisation principles of O’Brien (1987). Table one summarises which measures are relevant to each accomplishment.

<table>
<thead>
<tr>
<th>Accomplishment</th>
<th>Measure</th>
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<tr>
<td>Community Presence</td>
<td>Environment Questionnaire; Diaries</td>
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<tr>
<td>Choice</td>
<td>User Questionnaire; Diaries</td>
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<tr>
<td>Competence</td>
<td>Skills &amp; Behaviour Questionnaire; User Questionnaire; Diaries</td>
</tr>
<tr>
<td>Respect</td>
<td>Skills &amp; Behaviour Questionnaire; User Questionnaire; Diaries</td>
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<tr>
<td>Community Participation</td>
<td>User Questionnaire; Diaries</td>
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**Table one.** The questionnaires related to each of the five accomplishments.
1. Community Presence

This refers to the sharing of 'ordinary places' and the participation in valued activities. The measures relating to this principle are the Environment Questionnaire and the diaries. For example, this principle will be assessed through considering the appearance of the accommodation, the situation of the accommodation in relation to the community and the use of community facilities such as shops, cafes, pubs etc.

2. Choice

Choice is seen as pertinent to the issue of empowerment (Marlett, 1988) and Emerson & Hatton (1994) identify two types of choice; a) opportunities to use choice in daily activities & b) opportunities to use choice in more substantial life decisions. It is a difficult construct to measure. For the more disabled individuals advocacy is frequently used. One factor of choice which can be measured is the 'opportunity for choice'. For example, if a client is said to have the choice of whether they stay at home or go shopping, but transport is only available on Tuesdays, then the client's opportunity to choose is severely restricted. The two questionnaires relating to choice in this study design are the User Questionnaire and the diaries.

3. Competence

This refers to the opportunity to perform functional and meaningful activities. In order for this to be assessed the severity of a person's learning disability has to be considered. Therefore, accomplishment is considered through the use of the Skills and Behaviour Questionnaire, the User Questionnaire and the diaries.

4. Respect

Again, this is a difficult construct to measure. It relates to having a valued place amongst a group of people. If a person's competence was being restricted and they were provided with a lack of opportunities to enter into social networks one would categorise this accomplishment as not having been achieved. Therefore the measures used to assess competence should also be considered for this
accomplishment. Additionally, personal presentation will affect the respect a person receives and this is measured by the Personal Presentation Checklist.

5. Community participation

Being part of a growing network of personal relationships is the fifth accomplishment. In this study, this is measured through the use of diaries and Henderson's Interview Schedule for Social Interaction.

Criticism of Design

Sources of Information

Any evaluation that considers quality of life factors will intrude upon people's time, property and privacy. However, asking staff to administer and complete questionnaires means less impingement on the time of the client by an outside researcher, who they are unlikely to know. Additionally staff are likely to have a better knowledge of the residents and it will therefore take them less time to complete the skills related questions, resulting in a more efficient use of resources.

Comparison Group

One of Emerson & Hatton's (1994) criticisms of existing literature was the general failure to provide comparisons between quality of life in PLD and the general population. This study has tried to address this through the use of a non-PLD comparison group. Unfortunately, obtaining a matched sample may be difficult. Most of the measures have normative data, therefore perhaps what is needed, instead of a comparison group, is normative data for all the measures used. However, due to time constraints this may not be possible. The researcher needs to address the plausibility of providing normative data verses the suggested matched-subject design.

Another problem of the matched-subject design is the lack of randomisation of people into the differing conditions i.e. community based PLD, hospital based PLD and
community based non-PLD. This questions the possible generalisability of the obtained results. However, it is unlikely a strict experimental design could be used in a study such as this, therefore the matched-subject design is the best method we have available for this type of research.

**Measures**

*Quality of PLD responses & the User Questionnaire*

This study, like many others (e.g. Rosen & Burchard, 1990), has used structured and semi-structured interview schedules. However the validity of such methods with a learning disabled population has been questioned. Antaki & Rapley (1996) used qualitative conversation analysis and found interviewers often paraphrased complex items and distorted interviewees responses in the ‘pursuit of legitimate answers’. This needs to be considered, both in the design of studies and in the analysis of results. The design described in this paper has specifically used objective measures in order to restrict the possibility of distorted responses. In conjunction with this rationale, the design has not incorporated the use of the Compass assessment. Whilst it is recognised that both objective and subjective measures of quality of life are important, it is the subjective view of the person with learning disabilities that is paramount and not that of the researcher (part three of the compass is completed from the subjective impressions of the assessor). The subjective view of the resident has been considered through the use of the User Questionnaire.

Acquiescence in people who have learning disabilities has been cited as problematic within learning disability research (e.g. Heal & Sigelman, 1990). However Matikka & Vesala’s (1997) results suggest acquiescence is affected more by situational or interaction factors in an interview than to individual characteristics of either respondents or interviewers. Therefore in terms of administrating the User Questionnaire, homogeneity of environmental conditions such as researcher and presence of others, needs to be controlled.
Environment Questionnaire

Social indicators, such as physical environment, are commonly used in the social sciences to measure quality of life. However, measures are almost guaranteed to show improvements in community based housing services compared to hospitals (Emerson & Hatton, 1994). We can not say, therefore, that this alone is a good measure of quality of life. It is essential such factors are also considered in relation to non-learning disabled populations and at the same time as other factors such as choice and respect. The design described here has attempted to address this through the use of multiple measures and a non-learning disabled comparison group.

Skills and Behaviour Questionnaire

The majority of scales used to measure changes in ‘adaptive behaviours’ assume the user has access to a range of activities associated with living in the community. However, those living in hospital are less likely to have access to the relevant facilities, for example, public transport, shops, banks (Emerson & Hatton, 1994). This is another example of when a non-learning disabled comparison group is essential in the evaluation of research findings. Thus supporting the use of such a group in this design.

Diaries

As stated previously, the use of diaries as measures of activity has been supported by the research literature. Additionally, although sampling different times of the day on different days has been shown to produce representative data for direct observation methods (Landesman, 1987), the ‘time-sampling’ method is still time consuming and unlikely to be as cost effective as using diaries.

Concluding Comments

Quality of Life is neither a constant construct nor has it been clearly defined. In fact, Wolfensberger (1994) identifies seven problematic uses of the ‘Quality of Life’ term and calls for the term to be abandoned and related constructs be improved. Measuring such a construct is therefore difficult. It encompasses many aspects of an individual’s life, the subjective and the objective. This design has attempted to address these issues
and to provide a structure concurrent with the current research findings and recommendations. Additionally, the suggested measures allow a comparison of the findings to be made with those of Knapp et al and to be discussed in relation to the normalisation principles as defined by O’Brien’s five accomplishments.
References


Child and Adolescent Essay

Consider the utility of the diagnostic classification of Attention Deficit Disorder

Second Year PSYCHD
Introduction

Individuals with Attention Deficit Disorder (ADD) have been characterised as having a developmentally inappropriate degree of inattention, frequently accompanied by impulsivity and hyperactivity. It is thought to represent the most common 'neurobehavioural disorder' in children (Marchione, Shaywitz & Shaywitz, 1991). Shaywitz & Shaywitz (1991) found that ADD constituted over half of the referrals made to their sample of health professionals. Additionally, hyperactivity has attracted more attention than almost any other behaviour disorder of childhood (Achenbach, 1982). As this paper will show, one can not discuss the utility of diagnostic criteria of ADD without also considering the criteria for hyperactivity or hyperkinesis. This paper will summarise the relevant classification systems and the current evidence regarding the prevalence, cause, course, assessment and treatment of these difficulties. It will identify the advantages and disadvantages of the current diagnostic criteria in terms of clinical utility and the utility of labeling a child as having these difficulties.

Classification

ADD as a diagnosis does not literally exist. The current American classification system (DSM-IV; APA, 1994) refers to Attention Deficit Hyperactivity Disorder (ADHD) with or without hyperactivity. The European classification system (ICD-10; WHO, 1992) refers to Hyperkinetic Disorder.

Over the past several decades, ADHD has been defined and conceptualised in a number of ways, the first attempt to provide a category for a group of children who would now be considered to be displaying ADHD symptomatology is thought to be have been in 1902 (Still, 1902 cited in BPS, 1996). Since then there have been numerous revisions to the criteria used for the classification of the difficulties these children present with.

American Classification

In 1980 the American classification system (DSM-III; APA, 1980) departed from the
European diagnostic criteria (ICD-9; WHO, 1979) in creating subtypes of ADD with and without hyperactivity (ADD/+H and ADD/-H respectively). ADD/+H includes hyperactivity, impulsivity, and a tendency for more aggressive behaviour. The symptoms of ADD/-H include daydreaming, lethargy, sluggishness and distractibility. To qualify for the diagnosis of ADHD as an adult, the patient must have experienced symptoms as a child (DSM-IV).

Individuals diagnosed as having ADD/+H tend to experience greater social rejection and demonstrate difficulty sustaining attention on cognitive tasks (Barkley, DuPaul, & McMurray, 1991). There is also increased risk of hyperactive children developing symptoms of anxiety and depression (Taylor, 1991). Children diagnosed as having ADD/-H have a tendency to suffer learning disorders and social neglect (Kelly & Aylward, 1992). Attention deficit also implies impaired retrieval of verbally learned material, difficulty with focused attention and slower cognitive processing speed (Barkley, 1990; Kelly & Aylward, 1992; Barkley, DuPaul, & McMurray, 1991). Due to the reduced incidence of 'disruptive behaviour' in children displaying the symptomatology of ADD/-H they are less likely than their ADD/+H counterparts to receive a diagnosis in childhood (Fargason & Ford, 1994).

**European Classification**

Hyperkinetic disorder (ICD-10; WHO, 1992) can be defined as "an enduring disposition to behave in a restless, inattentive, distractible and disorganised fashion" (Taylor, 1994). Diagnostically there are three main groups of symptomatology: overactivity, inattentiveness and impulsiveness. Unlike the American criteria, where abnormalities need only be present on one axis, a diagnosis of Hyperkinetic disorder can only be made if there are abnormalities in both attention and overactivity. Hence, some professionals regard ADHD as a syndrome rather than a disorder, observing that the diagnostic criteria for ADHD are milder and broader than those of Hyperkinetic disorder (Cameron & Hill, 1996).
The differences between the two classification systems reflect international, inter- and intra-professional differences of opinion. Making the diagnosis of ADD appear inconsistent, unreliable and despite the continual revisions of criteria, diagnosis can appear confusing and unclear.

**Incidence and Prevalence**

Prevalence rates for ADHD vary but appear to range from over 2% to almost 10% (see BPS, 1996). Not surprisingly, due to the more stringent diagnostic criteria, Hyperkinetic Disorder has an estimated lower prevalence (e.g. Thorley, 1984). Prevalence rates are difficult to ascertain mainly due to changing diagnostic criteria and the BPS (1996) predict that as the criteria become more stringent, the prevalence rates will decrease.

**Cause of Difficulties**

Little evidence exists for a single causal agent for the difficulties these children present with (see Hinshaw, 1994). The contributions of diet (Carter, Urbanowicz, Hemsley, Strobel, Graham & Taylor, 1993), lead (Silva, Hughes, Williams & Faed, 1988) or neonatal or birth complications (Taylor, 1991) appear small and confined to a minority of cases. A body of evidence exists to suggest attention deficits are of organic origin (see Achenbach, 1985) and many organic, aetiological theories have been proposed (see Herbert, 1978). However, the research evidence is not conclusive and the BPS (1996) summarise that the majority of children diagnosed as having ADHD show no signs of neurological aetiology although some studies suggest that frontal lobes are implicated in some children. DuPaul & Stoner (1994) suggest ADHD is best viewed as a result of a poor "fit" between the biological endowment and characteristics of the child and the environment. This, coupled with the research evidence, suggests ADHD is not unitary phenomenon.
Course of Difficulties
The long term course of ADHD is quite variable (see Hinshaw, 1994) and a small number of studies suggest that hyperactivity and impulsiveness decrease during adolescence whilst inattention persists (see BPS, 1996). Having attention deficits and hyperactivity can predispose a child to display developmental difficulties, family disharmony and difficulties with achievement and aggression (see Hinshaw, 1994) and a proportion (perhaps one-third of ADHD cases; Barkley, 1990) will continue to have some signs of the disorder in adult life. There is also evidence to suggest that a childhood diagnosis of ADD has long-term ramifications for vocational and psychological functioning into adulthood (Wilson & Marcotte, 1996) and that hyperactivity in childhood increases the likelihood of problems in adulthood, particularly anti-social behaviour and substance abuse (e.g. Loeber and Keenen, 1994).

This evidence suggests ADHD has ramifications outside the difficulties cited in its diagnostic criteria. However, one must also consider the variation in the samples used by these studies, specifically the different diagnostic criteria. Additionally not all the participants’ difficulties followed the progressions described above. This indicates that the course of the difficulties is not consistent and one can only speculate whether this is due to differing diagnosis, differing treatment, differing external factors or due to the lack of existence of a unitary construct.

Assessment & Treatment
There is a body of evidence to suggest that ADHD may co-exist with a number of other disorders, for example, learning disabilities (range: 9-11% of ADD) and oppositional and conduct disorders (Marchione, Shaywitz & Shaywitz, 1991). Additionally, ADHD symptomatology is frequently a manifestation of affective illness (Nieman & Delong, 1987), primary disorder of vigilance, and/or developmental specific learning disorders (Weinberg & Emslie, 1991). A comprehensive assessment is therefore essential. It is not uncommon for a referred child to evidence ADHD symptoms only when depressed or
manifest ADHD symptoms prior to the onset of depression (e.g. Weinberg & Rehmet, 1983) and without a full assessment a child could easily be misdiagnosed.

There is no single assessment tool that can conclusively establish a diagnosis of ADHD and it cannot be diagnosed through interviewing the child alone (Sleator & Ullmann, 1981). A comprehensive approach to diagnosis is required, involving information from a number of sources, including parents and teachers (Marchione, Shaywitz & Shaywitz, 1991). Typically a behavioural assessment approach is employed including interviews, assessment questionnaires (e.g. the Connors' Rating Scales; Connors, 1989) and behavioural observations of the child across multiple settings and under variant task conditions (Barkley, 1990). Inattention can be a symptom of a number of psychiatric problems (Halperin, Matier, Bedi et al, 1992) and a diagnosis should only be given if another primary cause is not evident.

Management of ADD is ongoing and includes educational management, psychosocial support, behavioural procedures and pharmacotherapy. In this country the current drug of choice is a central nervous system stimulant, namely, Methylphenidate Hydrochloride (trade name: Ritalin). There are apparent differences between and within countries in the use of stimulant drugs (e.g. Valentine, Zubrick & Sly, 1996) and ‘many clinicians have in both Britain and America have remained committed to environmental explanations of behaviour’ (Levy, 1997) and thus, behavioural intervention. In terms of effectiveness of intervention, medication appears not to be a cure but in conjunction with psychological, educational and social support, can help facilitate appropriate and beneficial interactions between the child and their parents and teachers (see BPS, 1996).

Advantages of Diagnosis
It is evident that a great deal of confusion surrounds the concept of ADD. Differing definitions have led to confusion regarding correct diagnosis and evaluation procedures (Barkley, 1990). Without diagnostic criteria this confusion would be magnified. Specified
criteria help structure standardised assessment and aides the prediction of success of intervention, risk of concurrent or future behavioural difficulties and possible controlling variables (Barlow, 1981). Criteria also help guide selection of competing hypotheses that could account for the presenting symptomatology (DuPaul & Stoner, 1994).

Diagnostic criteria are research based. Thus, allowing professionals incorporate up to date empirical knowledge in their approach to diagnosis and treatment. Specified criteria also increase inter-professional agreement regarding diagnostic status (DuPaul & Stoner, 1994) and this should decrease the apparent heterogeneity of children diagnosed as having either ADHD or Hyperkinetic Disorder.

Another advantage of diagnosis is that it may help parents conceptualisation of the difficulties their child experiences and the research-based evidence of prognosis, may help parents adopt realistic expectations regarding their child. Working within a medical model and attributing behavioral problems to a biological basis may also be comforting to parents as otherwise these behaviours may be blamed on poor parenting or schooling (Weinberg & Emslie, 1991). Additionally, it may help dispel an unrealistic belief that the child will outgrow the difficulties without detriment.

Diagnosis can also aid intervention. Many clinicians use pharmacotherapy to treat ADD and medical intervention, specifically drug prescription, requires diagnostic criteria (BPS, 1996). In terms of behavioural treatment, having a symptom list can also aid the identification of a target behaviour on which to base intervention (DuPaul & Stoner, 1994). However, although having a pre-set symptom list may be an aid to the identification of the target behaviour, it should not exclude a thorough behavioural assessment.

Finally, ‘hyperactivity’ is often used as a general ‘wastebasket term’ for nuisance behaviour. Having specified criteria hopefully means flippant labelling will decrease.
Disadvantages of Diagnosis

Whilst providing a label to describe a child’s difficulties potentially clarifies the nature of the child’s problem, it may also result in additional problems for the child. For example, if the label results in the child also being labelled a ‘problem’ people may give up trying to help them, or react to them in a way which makes the behaviour worse (McGuire & Richman, 1988). Labelling raises fears that children will become stigmatised and when thought of as difficult in one setting, this label will remain with them wherever they go, and that any behaviour changes for the better will not be noticed (McGuire & Richman, 1988). Additionally, DuPaul & Stoner (1994) suggest labelling a child may compromise the child’s self-esteem as others view the child as having a disorder.

The classification of ADHD as a psychiatric disorder is also problematic. The use of a psychiatric classification system promotes a search for pathology which may lead to over-identification of children with behavioural difficulties, (i.e. the identification of false-positives; DuPaul & Stoner, 1994). The term ‘diagnosis’ also tends to be interpreted as pertaining to illness, for example Chambers Dictionary (Schwartz, Klein, Davidson et al, 1991) defines diagnosis as ‘the identification of a disease by means of its symptoms’. As the criteria for ADHD are developed in the context of a medical model it is implied the problem is within the child and even though there is a lack of evidence that ADHD is a result of a fixed psychological dysfunction, using a medical model may diminish attempts to assess environmental variables which may play a functional role in the maintenance or cause of the child’s difficulties.

The numerous revisions to the diagnostic criteria have resulted in their increased validity. However, the psychometric properties of the DSM criteria remain not well established (Gresham & Gansle, 1992) and the judgment as to when activity is excessive is still subjective. Neither DSM-IV nor ICD-10 specify standardised assessment protocols. Until they do, one can not be sure that professionals are diagnosing homogeneously.
Finally, the label ADHD encompasses a heterogeneous group of children and adolescents. Research on boys diagnosed as hyperactive has shown that they vary along two clearly separable dimensions of hyperactivity and aggression (e.g. Milich, Loney & Landau, 1982). It appears that one diagnosis does not mean one set of symptoms and this lack of homogeneity questions the validity of the diagnostic criteria.

**Concluding Comments**

A wide range of identifying labels have been applied to these children and this has lead to confusion with regard to diagnosis and treatment. It is evident that a great deal of confusion surrounds the concept of ADD and there continues to be disagreement about the diagnosis, cause, prevalence and treatment of ADHD and Hyperkinetic disorder.

The heterogeneity among the children who receive diagnoses of ADHD is worrying. This may reflect a true variation in the clinical presentation of the difficulties associated with ADD. However, the continuous revision of the diagnostic criteria is also likely to have played a functional role in these discrepancies. The BPS (1996) suggest that the recent developments in DSM and ICD criteria are promising in that they both intend to identify a small proportion of children with severe difficulties. The main problem with the current criteria is the lack of objective criteria for hyperactivity. Whilst the assessment and diagnosis of hyperactivity remains subjective, it is likely the heterogeneity of the children diagnosed as having ADHD or Hyperkinetic Disorder will continue.

Diagnosis is important in terms of fulfilling criteria for drug prescription but there appears to be a danger that diagnosis may lead to an automatic equation with pharmacological treatment. The research does not support Ritalin providing a cure for the difficulties these children present with and therefore serious consideration must be given to the utility of this treatment approach. A main problem with the diagnosis is that it stems from a medical model and historically this has implied medical treatment and a search for a biological cause. Psychological assessment and intervention can be beneficial to the prognosis of the
diagnosis and therefore it appears that both the criteria and the clinical approach to treatment require revision.

An advantage of diagnosis is that it may help parents and teachers conceptualisation of the difficulties the child experiences. However, labelling a child as having a problem has inherent difficulties. Before labelling a child as having a problem, the possible negative ramifications (see ‘Disadvantages of Diagnosis’) need to be considered. Positively, despite the confusion surrounding the classification of ADD, the diagnostic criteria do provide a framework in which clinicians can base their assessment and once a diagnosis has been made, the clinician can be guided by the research evidence as to the most suitable intervention.

In summary although the continuous revisions to the diagnostic criteria cause problems in assessing the homogeneity of the construct, the revisions have been based on empirical research. Unfortunately, the research is not conclusive and therefore the validity of the criteria and the clinical utility of the diagnosis, remains questionable.
References


Specialist Essay

A critical review of the evidence for the different theoretical functions of self-harm

Third Year PSYCHD
The conceptualisation of the origin of self-harm varies as a function of theoretical orientations or the discipline of the researcher. In their review of the literature, Kahan & Pattison (1984) list 28 labels used by clinicians to describe self-harm (e.g. self-mutilation, self-injury, focal suicide). They also list 40 proposed dynamics of self-harm (including control manoeuvre, acting-out and tension release). This critical review aims to consider the efficacy of the different theoretical functions of self-harm and their clinical application.

Deliberate Self-Harm (DSH) is defined as 'the deliberate destruction or alteration of body tissue without conscious suicidal intent' (Favazza, 1989; Favazza & Conterio, 1989). The five functions considered in this review are (i) DSH as a maladaptive coping strategy, (ii) DSH as an integral part of personality, (iii) DSH as a re-organiser of the environment, (iv) DSH as a form of communication and (v) DSH as a reaction to biological antecedents or reinforcers. Each function is considered in terms of its clinical application to the treatment of DSH. The review concludes with a review of the multimodal approaches to DSH.

**Function: Maladaptive Coping Strategy**

Cognitive behaviour theory has explained the behaviour as a result of restricted alternative coping mechanism for interpersonal and situational crisis (Ross & MacKay, 1979). These theorists view DSH as resulting from internalisation of anxieties and an inability to verbally express needs due to deficiencies in both social and relationship skills such as lack of assertiveness, low self-esteem or self-confidence (Walsh & Rosen, 1988). The behaviour is considered to be maintained through negative automatic thoughts relating the individuals’ ability to cope with life stresses and their perception of others’ lack of concern. Emphasis in Cognitive Behavioural intervention has been in teaching the individual to identify triggers leading to DSH and to train individuals in finding alternative coping strategies and methods of communicating their feelings (Walsh & Rosen, 1988).
Salkovskis, Atha & Storer (1990) randomly allocated 20 patients deemed to be at high risk of repeated suicide attempt(s) to a cognitive-behavioural problem solving group or a ‘treatment as usual’ control condition. At the end of treatment and at one year follow-up, the problem-solving group showed significant improvement on Beck’s measures of depression, hopelessness and suicidal ideation. This study is frequently referenced in the cognitive-behavioural and DSH literature. However its focus is on suicide attempters and its findings may not necessarily support the use of problem-solving strategies with patients who display DSH.

Within cognitive behaviour therapy, individuals who display DSH are considered to adopt the behaviour because they have no other means of coping with problem situations (Walsh & Rosen, 1988). Haines & Williams (1997) report that the DSH literature contains much support for the description of the behaviour as a maladaptive coping strategy which serves to ‘alleviate emotional distress in an effort to enhance psychological adjustment’ (p178). Based on this description of DSH as a coping strategy, Haines & Williams hypothesised that ‘individuals who self-mutilate would report fewer coping resources than comparison groups and would adopt more maladaptive coping strategies to deal with specific stressors’. Additionally, individuals who display DSH would ‘report poorer perceived problem solving skills’. They compared 19 male prisoners with a history of DSH, 13 male prisoners with no DSH history (prisoner controls) and 18 male undergraduates with no history of DSH or incarceration. Each participant completed three inventories; The Coping Response Inventory (CRI; Hammer, 1988); The Coping Strategies Inventory (CSI; Tobin, Holroyd & Reynolds, 1984) and The Personal Problem-Solving Inventory (Heppner & Petersen, 1982). In summary, when compared with both control groups, the DSH prisoner group were found to have significantly fewer self-reported cognitive coping resources, fewer spiritual/philosophical resources, more utilisation of problem avoidance and poorer self-perceived abilities to problem-solve. However, despite these results there was no clear evidence that the DSH group relied on ‘emotion-focused coping to the exclusion of problem-focused coping’ nor did the results support the
suggestion that individuals who self-mutilate have poor problem-solving skills (although they may perceive their skills to be poor).

**Function: Integral part of personality**

An alternative theoretical function is that DSH is part of a disordered personality. The two main domains which take this stance are found within the psychodynamic and personality disorder literature. The underlying rationale to these approaches is that if the personality is ‘treated’ then the DSH will be eliminated.

I) **Psychodynamic**

Within the field of psychodynamic theory interpretations of the *meaning* of DSH have included symbolic menstruation, masturbation (e.g. Emerson, 1914), castration and mother-infant unity. The behaviour has been viewed as guilt-ridden, autoerotic, cannibalistic, a focal suicide, a psychic bargain, and a manifestation of self-hatred (Walsh & Rosen, 1988). More continuity is found in discussions of the antecedents to DSH with numerous references and emphasis on loss as an antecedent to the act, for example, Kafka (1969) likened DSH to a child’s use of a transitional object.

Tantam & Whittaker (1992) described the role of analytic psychotherapy as ‘translating the action of self-wounding into feelings which supposedly express the fears of abandonment, powerlessness, hostility and dependence’. The task of therapy is to transfer all the destructive feelings, which are usually channelled into DSH, into the therapeutic relationship, where they can be contained, understood and mastered (Campling, 1996). Patients are expected to make behavioural changes based on increased understanding of identified conflicts (Barley, Buie, Peterson et al, 1993).

Unfortunately there is an absence of experimental evidence to corroborate the psychodynamic theories of DSH (Symons, 1995). Individual case reports (e.g. Collins, 1996) show some success in the decrease of DSH but the lack of translation of these theories into pragmatic therapeutic strategies makes evaluation and application difficult.
II) Personality Disorders
For a long time clinicians have associated DSH with Borderline Personality Disorder (BPD), for example, Gunderson & Singer (1975) noted that impulsivity and self harm were the characteristic most commonly and consistently associated with BPD. Schaffer, Carroll & Abramowitz (1982) studied a sample of self-mutilators and using Gunderson’s Diagnostic Interview for Borderlines (Gunderson, Kolb & Austin, 1981) found that the sample of self-mutilators was significantly more likely to be diagnosed as having BPD than a matched control sample. More recent studies have also indicated a strong relationship between DSH and BPD diagnosis (Sanasone, Wiederman & Sanasone, 1998). However these findings have to considered within the context of the diagnostic criteria used by the researchers. Two of the nine criteria for BPD involve self-harm behaviours (DSM-IV; APA, 1994), one is suicidal behaviour, threats or gestures or self-mutilation and the other is self-damaging impulsivity. Thus, by diagnostic definition, a link between BPD and DSH is likely to be present.

Drawing on Cognitive-Behavioural and Psychoanalytic theories, Cognitive Analytic Therapy (CAT; Ryle, 1997) has been applied to people with a diagnosis of borderline personality disorder. CAT views DSH as a coping strategy employed to deal with emotional distress. It is based solely on individual therapy and involves focusing on several treatment elements including flexibility in order to address a wide range of social, emotional and psychological difficulties and inclusion of an explicit problem solving component (Cowmeadow, 1994). Unfortunately, to date no randomly controlled clinical trials have been published and although individual case studies indicate a decrease in DSH (Ryle, 1997; Cowmeadow, 1994) the efficacy of the approach has yet to be fully explored.

Herpertz (1995) assessed 54 patients who displayed DSH, approximately half (N=28) of whom had a BPD diagnosis, using a semi-structured interview designed to collect 'information about the inner experience of the patients in connection with the injuring act including thoughts, emotions, perception, behaviours and situational characteristics'. A phenomenological analysis revealed no significant differences
between the BPD and Non-BPD subgroup with respect to these features. Herpertz suggests that poor affect regulation, and not disordered personality per se, is the underlying psychopathological dimension of DSH. This suggestion is in agreement with both Tantam & Whittaker (1992) and Kahan & Pattison (1984) who argue DSH should not be subsumed under the general category of ‘personality disorder’.

There is a plethora of literature identifying DSH as a disorder of impulse control (e.g. Herpertz, Sass & Favazza, 1997; Pattison & Kahan, 1983). Evans, Platts & Liebenau, (1996) administered the impulsiveness (I-V-E) questionnaire (Eysenck & Eysenck, 1991) to a sample of 185 people who displayed DSH and found scores were significantly higher than normative data. Using experimental design, Herpertz, Gretzer, Steinmeyer et al (1997) found patients suffering from PD with impulsive disorders reported a higher intensity of affective experience in an affect-stimulation experiment in relation to non-impulsive PD patients and normal controls. Despite the questionable ecological validity of this experimental design, its results support the growing literature on DSH as primarily an ‘act of impulsivity’.

Function: Reorganisation of Environment

The influence of location on clients’ display of DSH is well documented both within the behavioural (e.g. Adelinis, Piazza, Fisher & Hanley, 1997; Collins & Halman, 1996) and systemic literature. Systemic thinking views DSH as a symptom of the wider social context (Burrow, 1992; Aldridge, 1988). Symptoms such as DSH are theorised to stabilise the confusion caused by organisations with confused staff hierarchies. The behaviour is viewed as being maintained by the institutional conflict and the individuals involved in the implementation of treatment strategies (Figure 1).

Figure 1. The Circularity of Hierarchical Confusion and Resolution (Aldridge, 1988; p11)
These elements are viewed as recreations of a social system which replicates core aspects of the family system of the patient. Family dynamics are frequently referred to within the systemic, DSH literature (e.g. Walsh & Rosen, 1988). In a recent study (Tulloch, Blizzard & Pinkus, 1997) 52 adolescents who displayed DSH were compared with a group of hospital-based controls. An absence of a family confidant and poorer parent-adolescent communication were found to be strongly associated with self-harm.

The confused hierarchy hypothesis has received much anecdotal support with DSH being reported as a means of establishing environmental control (Liebling, Chipchase & Velangi, 1997a, 1997b; Favazza, 1989; Cookson, 1977). Treatment focuses on identifying conflicts within the institution or ward context rather than direct individual work. Aldridge's (1988) work supports the proposed hypothesis. He suggests focusing on empowering staff to work 'together and consistently' with strategies for management and engaging staff in an agreement to change behaviour. Unfortunately his sample size of four patients means the results can only be considered preliminary.

Incorporated in this theoretical approach is that the system can influence individuals' behaviour. Connected with this is the large amount of research into the timing and clustering of DSH within institutions (e.g. Swinton, Hopkins & Swinton, 1998; Burrow, 1992). Research evidence suggests DSH is frequently performed by individuals, with no previous history of DSH, when they are within inpatient treatment settings. Additionally DSH is often considered to occur in 'clusters' or 'epidemics' (e.g. Cookson, 1977).

Walsh & Rosen (1985) examined the frequency of behaviour such as physical aggression, substance abuse and encounters with the police as displayed by a sample of 25 'disturbed' adolescents receiving input from a community treatment team. The only significant clustering was that of DSH. In a later paper, Rosen & Walsh (1989) considered the clustering of DSH in terms of possible patient dyads involved in the contagion and found that such dyads existed. Using a similar procedure, Taiminen,
Kallio-Soukainen, Nokso-Koivisto et al (1998) studied 12 in-patient adolescents with a diagnosis of borderline personality disorder and depression. They too found clusters of DSH.

From their research findings, both sets of researchers made recommendations for clinical management of DSH, for example Taiminen et al suggested not placing depressed 'personality disordered' females together on same ward and Rosen & Walsh suggested interventions to reduce contagion may be most effective if the specific dyads, rather than the whole milieu, are targeted. Unfortunately there appears to be little, if any, empirical evaluation of these clinical strategies.

The social and physical environment influences on DSH are generally supported by the research literature. Unfortunately there is an absence of randomly allocated, controlled trials to support the implementation of defined clinical strategies. Additionally many studies, although not all (e.g. Hillbrand, Krystal, Sharpe & Foster, 1994) consider only female samples. Larger scale, more comprehensive studies are required before this theoretical function can be adequately analysed.

Function: Communication

Within the area of learning disabilities, DSH is more commonly referred to as Self-Injurious Behaviour (SIB). This review will not discuss this literature in detail as understanding and approaches to treatment of this population are generally more specific to learning disability and are well documented (e.g. Emerson, 1995).

In summary, Behavioural theorists propose SIB as a function of different sources of reinforcement (Carr, 1977). The behaviour is viewed as learnt and is seen as being maintained through the receiving of attention (positive reinforcement e.g. Derby, Wacker, Sasso, Steege, Northup, Cigrand & Asmus, 1992) or the removal of demand (negative reinforcement e.g. Emerson, 1990). The behavioural approach aims to identify the function of the behaviour by identifying how the behaviour is being
maintained (e.g. Iwata, Dorsey, Slifer et al, 1982). Once identified, either the reinforcers or the antecedents to the behaviour are altered.

**Function: Biological**
The medical model prescribes a biological origin of DSH. The model has received support from research into specific medical disorders. For example, extreme degrees of brain dysfunction, such as found in people with Lesch-Nyhan Syndrome, have been associated with DSH (Murphy & Oliver, 1987). However findings tend to be population specific, thus restricting the generalisability of the model.

The release of endorphins is frequently referred to, especially within the learning disability research. One hypothesis which has received some support is that DSH can instigate endorphin release, which is known to increase analgesia and have mood altering effects (e.g. Sandman, 1990/91), and thus the DSH has the function of self-controlled pain relief. Others have reframed the endorphin hypothesis within a biological reinforcement theory: the person displaying DSH becomes addicted to the increased levels of endorphins (Pies & Popli, 1995). Favazza & Conterio's (1989) finding that the majority of female habitual self-harmers (71% of a 240 sample) considered their self-injurious behaviour to be an addiction provides anecdotal support for the theory of addiction but not necessarily biological addiction.

The medical model has not received much support from the clinical application studies. For example, improvements through ECT, if they occur at all, tend to be short-lived (Feldman, 1988). In terms of pharmacological therapy, Tantam & Whittaker (1992) in their review of the literature conclude that "there is no evidence that the drugs have any direct effect on the propensity to harm the self" (p456).

**The Multimodal Approach**
With the exception of behaviour therapy for people with severe learning disabilities, none of the five functions described in this review have gained enough empirical
support to be adopted unilaterally for the treatment of DSH. An alternative approach is to tackle the problem of DSH using a variety of modalities.

Prokaletic therapy (Kraupl-Taylor, 1969) was one of the first therapies specifically developed for DSH. It was designed to combine behavioural, analytic and cognitive elements and focused on using interpretations for their aversive value (i.e. the therapist actively expressed his or her distaste at the 'masturbation' substitute). However there appears to have been no systematic evaluation or reported effectiveness for this approach (Tantam & Whittaker, 1992).

One multimodal psychotherapeutic approach which has been assessed in a randomised, controlled study is that of Liberman & Eckman (1981). Liberman & Eckman blended behavioural, cognitive and crisis intervention modalities and used a random allocation design for 24 adults with a collective suicidal attempt history of 70 incidents over a period of one year prior to treatment. Participants received treatment during a ten-day inpatient stay and all were followed up during the two years proceeding their admission. Patients were either allocated to a behaviour therapy package which comprised three main components (17 hours of social skills training, 10 hours of anxiety management training and 5 hours of family negotiation and contingency contracting) or to an insight-orientated therapy group (17 hours of individual therapy, 10 hours of psychodrama and group therapy and 5 hours of family therapy). Results indicated a significant decrease in suicide attempts for both groups (during the two years after admission only 11 attempts by five of the 24 participants were made) and the behavioural therapy group also presented greater and longer lasting improvement on suicidal ideation, urgency of ideation and suicidal plans when compared with the insight-orientated group.

Another multimodal approach which is becoming a popular choice of treatment for DSH is Dialectical Behavior Therapy (DBT). DBT is designed specifically for chronically parasuicidal individuals with conditions diagnosed as BPD (see Linehan, 1993). It is based upon a biosocial theory that views BPD as primarily a dysfunction of
the emotion regulation system. The acts of DSH are viewed as having the function of 'reducing painful emotions that cannot otherwise be regulated' (Shearin & Linehan, 1994). The consequences of the acts are proposed to be twofold, firstly they provide direct relief from emotional stress and secondly, they may also elicit needed environmental changes or communicate distress to others.

Outcome research based on single case studies, anecdotal reports and non-controlled studies have reported behavioural changes (Simpson, Pistorello, Begin et al, 1998; Kern, Khuehn, Teuber & Hayden, 1997; Barley et al, 1993). Additionally randomised controlled studies have supported DBT's application (Linehan, 1993; Linehan, Armstrong, Suarez et al, 1991).

In a randomised controlled study of DBT, a community sample of women with BPD diagnosis were randomly assigned to a one year long DBT group (N=22) or a one year 'treatment as usual group' (N=22). Participants were assessed pre-treatment, at 4 month intervals during treatment (Linehan et al, 1991) and at 18 and 24 month follow-up intervals (Linehan, 1993). The DBT group were significantly less likely to engage in parasuicidal behaviours during the treatment year and were less likely at each follow-up point. Additionally less medically severe acts of DSH were conducted by the DBT group. The DBT group were also less likely to drop out of treatment and spent fewer days as a psychiatric inpatient (an average 8.46 days per patient over a one year period compared with an average 38.86 days for the control group members). Interestingly, there was no significant between-group differences on measures of hopelessness, suicidal ideation or reasons for living. A third study, using similar methodology, assessed the efficacy of running DBT skills training without individual therapy. Results suggested that both DBT skills training group and individual therapy should be used with this client group (Linehan, 1993).

DBT addresses all five of the functions discussed in this review and the initial randomised, controlled studies have provided promising results. One drawback of the DBT approach is that it is specifically for individuals diagnosed as having a BPD and it
does not provide a framework for non-BPD people who display DSH. However the work of Liberman & Eckman does provide such a framework. Their study focused on suicide attempters rather than individuals with DSH. Further evaluation of the multimodal approaches to DSH is required.

**Concluding Comment**

Despite the plethora of literature on DSH, there is little systematic evaluation of the proposed treatment approaches. A number of studies have supported the link between poor affect regulation and DSH (e.g. Zlotnick, Donaldson, Spirito & Pearlstein, 1997) and the results of the controlled DBT studies support the emotional regulation hypothesis. This, coupled with the growing body of research on impulse control, suggests a move away from ‘treating the disordered personality’ and onto a more skills based focus. However further randomised controlled clinical trials of the suggested approaches are required.
References


Clinical Dossier

Placements are in ascending chronological order
Adult Mental Health Placement

First Year PSYCHD

September 1996 - February 1997
Clinical Psychology
Adult Mental Health Placement
for Louise Minchin
with Supervisor - Nigel Mills
Department of Psychology, Horsham Hospital

PLACEMENT CONTRACT

Overall Aims
To provide a training experience as a Clinical Psychologist within the area of Adult Mental Health.

Training will cover three main areas:-

1. Out-patient clinical work including Cognitive Assessments.
2. Longer Term Mental Health problems.
3. Organisational issues.

1. Outpatients Clinical Work

Aim To gain competence in applying psychological approaches to a range of adult mental health problems.

Objectives
At the end of the placement Louise will be able to:

(i) Demonstrate competence in working with clients who present with anxiety, depression, adjustment and adaptation difficulties, trauma from abuse, and, if available, clients with eating disorder, OCD and substance misuse. Somatic complaints, personality disorder, disability issues.

(ii) State hypotheses and formulations in each case.

(iii) Liaise with other professionals in written form and verbally.

(iv) Justify a method of intervention for each case.

(v) Discuss the differing contributions of cognitive, psychodynamic, Gestalt and Bioenergetic Models to a selection of her cases.

(vi) Demonstrate competence in selection and use of appropriate cognitive assessments.

(vii) Discuss the possible role of the subtle energy system in psychological therapy.
Methods

Louise will select with her supervisor cases from the Crawley Waiting List that seem appropriate for her training experience. Clients will be seen at Crawley Hospital out-patients department.

Louise will observe her supervisor on a range of cases and discuss strategy and rationale. Assisted by background reading provided by Nigel Mills. Louise will audio tape a variety of cases and video at least one. Supervisor will sit in on at least one case. In addition to individual supervision with Nigel Mills (mainly of a cognitive and Gestalt/Bioenergetic orientation). Louise will attend department supervision with Roger Squier (psychodynamic orientation).

Evaluation: As in placement handbook.

2. Longer Term Mental Health Problems

Aim

to achieve an understanding of the difficulties faced by people with long term mental health problems and how services can meet these difficulties.

To gain competence in applying psychological approaches in both group and individual settings.

Objectives

At the end of the placement Louise will be able to:-

(i) Describe the range of services available for people with longer term mental health problems within Crawley-Horsham Health Trust.

(ii) Describe how this service could be improved particularly in relation to care management, group homes and the 'Club-house' model.

(iii) Participate in a multi-disciplinary meeting on (a) acute ward (b) day hospital.

(iv) Describe the role of other professionals especially, psychiatrist, CPN, occupational therapist and social worker.

(v) Demonstrate some competence in applying psychological approaches to individuals with longer term mental health problems.

(vi) Facilitate a group for people with longer term mental health problems. (Possibly as at 30 October 1996).

(vii) Discuss how the needs of people with longer term mental health problems differ from the 'more able' clinical out-patient case load.
Methods

Attendance at Ward rounds/multi-disciplinary meetings on Rose Ward, Lavender Day Hospital, Weald Day Hospital. Meet with and hopefully observe CPN and OT. Background reading guided by Nigel Mills and Video of 'Fountain House'. Attend meetings of psychologists involved in this client group plus regional SIG. Select individuals from CMHT Waiting list for individual therapy. Visit user led provisions for social support.

Evaluation

As in placement handbook.

3. Organisational Issues

Aim: To understand the organisational climate within which psychologists in Adult Mental Health operate.

Objectives

At the end of the placement Louise will be able to:

1. Describe the role of the department monthly meeting.
2. Describe the management and supervision arrangements within the department.
3. Participate in the peer support seminars.
4. Describe the effect of GP fundholders on the functioning of the department and the Trust.
5. Describe the relationship between the Purchasers and the Trust.
6. Describe the role of the Special interests Groups in the region.
7. Describe the increasing importance of audit within the department.

Methods

Attendance at department psychology meetings, peer support seminars, department supervisions and, where possible, regional special interest groups.

Visit with supervisor GP fundholding practice to discuss contract.

Background reading guided by Nigel Mills on purchaser/provider relationships and audit.

Evaluation: As in placement handbook.
Recommended Reading for the Placement: available from Nigel Mills
(In addition to core references recommended by University).


Kempner, J. Body Processes


Weller, MPI & Muifen, M (1993) Dimensions of Community Mental Health Care

Supervision

Supervision will be on Fridays 12.30 - 2.30 pm.
In addition there will be opportunities for observation of Nigel Mills and joint working.
Adult Mental Health Case Study

Cognitive behavioural assessment and treatment of a client presenting with social phobia

Miss Pole, a twenty year old, final year, undergraduate student, was referred by her GP for help with 'recurrent bouts of anxiety/panic attacks'. Miss Pole described her 'panic attacks' as comprising of feelings of nausea and hot flushes. They appeared to occur in social situations where she described feeling trapped. At the time of referral, Miss Pole was actively avoiding social functions and was only tending to socialise with friends who knew about her 'problem'.

Miss Pole's difficulties were formulated and addressed using Clark's (1986) Cognitive Behavioural Model of Panic. Her Negative Automatic Thoughts (NAT's) and associated beliefs (as identified using a NAT/symptom diary) were challenged by identifying evidence for and against them. This intervention revealed Miss Pole's thoughts did not centre around the physical sensations she experienced but on the perceived impact of her behaviour on the thoughts and behaviour of others. The administration of the Social Phobia and Anxiety Inventory (SPAI) supported the possibility of social phobia as a main contributor to her panic attacks. Clark's model was adapted to include Miss Pole's fears of negative appraisal by others and additional therapeutic techniques of relaxation training and in vivo exposure were employed.

Miss Pole was seen for ten sessions over a period of fifteen weeks. On discharge her self-report experience of 'anxiety attacks' appeared to have substantially decreased. Both her anxiety (as measured by the Beck Anxiety Inventory) and her level of depression (as measured by the Beck Depression Inventory) had substantially reduced. She reported no longer actively avoiding social situations and was attending more social events than when she started attending therapy. On discharge, her SPAI score was within the normal range.

People with Learning Disabilities Placement

First Year PSYCHD

March 1997 - August 1997
Placement contract

People (Adults) with Learning Disabilities

Supervisor: Allan Davies
Trainee: Louise Minchin

Placement dates: 12.3.97 - 22.8.97
Base: Eversley House, 19 Horn Street, Seabrook, Hythe, Folkestone, Kent

Aims of Placement

• to become familiar with the organisation of learning disability service and the range of interprofessional and interagency work required, and, to develop competence in service organisational issues (especially to gain understanding of community care issues)

• to gain experience working with staff in different professions and settings.

• to develop professionalism and understanding of issues and philosophies of care particularly relevant to working with this client group

• to develop competency in the use of specific method (assessment) and therapeutic intervention skills with an appropriate range of clients, and, to develop ability to adapt techniques appropriately for this client group

• to develop ability to communicate psychological approaches both verbally (e.g. through a presentation or teaching) and in writing

• to develop ability to conduct service related research

• to continue to develop and use psychological models and clinical skills used in the previous ‘Adult Mental Health’ placement, for example, with clients suffering from anxiety or panic attacks

• to gain experience of using MAKATON (levels 1 & 2)

Clinical Work

At any one time, the trainee will work directly with no more than 5 or 6 clients and where appropriate other people involved in their care, e.g. families, other professionals and carers. This excludes contacts through group therapy work.

Where possible, the client group will include;
1. at least one client from each of the four life stages (adolescence, young adulthood, middle age and older people)
2. both sexes
3. clients from each of the following level of disability severity; mild, moderate, severe, profound and multiple handicap
4. at least one client from a different cultural and/or ethnic background
5. a range of presenting difficulties including,
   • sexuality issues (relationships, sex education and social skills, sexual awareness and sexual abuse)
   • bereavement and loss (including not just external losses but also internal changes, such as loss of function, and issues of transition)
   • skills teaching (including interpersonal skills, assertiveness and anger management)
   • challenging behaviour
6. at least one client who requires residential resettlement
7. at least one client who presents with long term mental health needs
8. at least one client who presents with eating difficulties, for example anorexia nervosa
9. at least one client who presents with suffering from OCD
If it is not possible to cover all these areas directly, the trainee will gain insight into the issues involved either through observation or joint work with another psychologist or professional, discussion of work, training events and / or visits.

The trainee will develop competency in

- identifying questions that can be answered by psychological assessment
- selecting, administrating and interpreting a range of assessments.
- The trainee will administer and interpret the WAIS-R or WISC-III, Leiter and BPVS and at least two of the HALO, Berce week Scale for Assessing Coping Skills, Vineland, Functional Performance Record, Star Profile
- feeding back to client and other relevant parties these findings
- selecting, modifying and implementing an appropriate therapeutic model and treatment approach
- evaluating clinical work

The trainee will co-lead at least one therapy group.

Some work will involve co-working with the supervisor and other members of the multidisciplinary team.

The trainee will work within a multidisciplinary framework, involving work with other agencies and indirect work through staff and staff support.

**Other**

The trainee will be involved in a presentation or teaching to the team or other support groups.
The trainee will attend meetings when appropriate and possible.
The trainee will conduct a small scale, service related research project.

**Supervision**

The trainee will receive a minimum of one and a half hours formal supervision each week. This will usually be on Thursdays between 0830 & 1000.

**Personal Study**

The trainee will have half a day per week for personal study. This will be every Friday afternoon.

**Reading**

The supervisor will identify and provide literature appropriate to the placement.

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Louise Minchin
Psychologist in Clinical Training

Allan Davies
Consultant Clinical Psychologist
People with Learning Disabilities Case Report

The re-settlement of a thirty-two year old man with profound learning disabilities and a history of challenging behaviour:

A psychological assessment

Clive, a thirty-two year old man with profound learning disabilities was referred to the Community Learning Disability team for a joint social service - health assessment prior to moving to a new residential home. Clive had lived in residential care since birth and had very limited expressive communication skills. One year prior to the referral Clive had been diagnosed as having a bilateral inoperable glioma. His condition was considered terminal.

The main focus of the intervention was a behavioural assessment of Clive’s long-standing Self-Injurious Behaviour (SIB). A number of organic and behavioural hypotheses were generated to explain Clive’s SIB and evidence was gathered through the applied behavioural approach of Functional Analysis (Emerson, 1995). Data gathered, post move, supported a non-organic maintenance of behaviour with the SIB being maintained through positive reinforcement. Assessment techniques included completion of activity diaries and ABC charts by residential staff, video recording and frequency tallies of SIB. Recordings were analysed graphically.

A Behaviour Modification Programme was devised on the basis of the Functional Analysis. The targeted behaviour was Clive’s head banging behaviour and the programme was based upon Differential Reinforcement of other/incompatible behaviours (a DRO/DRI programme). Additionally staff safety guidelines were devised to protect staff from Clive’s head butting behaviour. Staff compliance to the programme was also formulated using behavioural theory and staff were actively involved in the writing, administration and evaluation of Clive’s programme.

Child and Adolescent Placement

Second Year PSYCHD

October 1997 - April 1998
**CONTRACT FOR PLACEMENT FOR EXPERIENCE WITH CHILDREN AND ADOLESCENTS FOR THE UNIVERSITY OF SURREY DOCTORATE IN CLINICAL PSYCHOLOGY**

**LENGTH OF PLACEMENT:** 6 months
01.10.97. - 03.04.98.

**NAME OF TRAINEE:** Louise Minchin

**NAMES OF CO-SUPERVISORS:** Penny Bebbington, Shona Lowes

**ADDRESS:** Psychology Department, West Park Hospital, Surrey Heartlands NHS Trust, Horton Lane, Epsom, Surrey KT19 8PB

**TEL:** 01372 203310/3311

There will be a total of 2 hours each week supervision with both supervisors.

**AIMS OF THE PLACEMENT**

1. To achieve at least an acceptable standard in the core competencies as applied to Children and Adolescents as specified in the Clinical Placement Handbook.

2. To introduce the trainee to this client group and give experience within the full age and problem range.

3. To develop her awareness of their needs.

4. To have experience of the range of possible psychological assessments, therapeutic interventions and theoretical models.

5. To gain experience of the wider system of inter-professional and inter-agency net working.
OBJECTIVES

1. To observe children within the normal range of development in a variety of settings, individual and group.

2. To enable the trainee to communicate effectively with children at different developmental levels.

3. To select, use and interpret norm referenced and criterion referenced tests.

4. To plan and undertake at least part of therapeutic interventions in one model.

5. To develop formulation skills and communicate the formulation method and outcome of all intervention in writing.

6. To present a psychological intervention to multi-disciplinary group.

7. To observe the work of other professionals in multi-disciplinary teams to gain understanding of the interrelationship.

METHODS

A: Professional Development

1. To attend meetings of the Psychology Department held on alternate weeks.

2. To attend a range of meetings including the Child Clinical Psychology service and the District Child Development Team and the Child and Adolescent Psychiatry Team.

3. To attend a Child S.I.G. Meeting.

4. To present a case report to a multi-disciplinary group.

5. To give a Seminar to the department.

6. To develop awareness of Child Protection procedures.

B: Visits and Observations

1. To spend at least one hour observing children in a play group and a nursery.

2. To observe other professionals working therapeutically with children individually and in groups, including a Speech & Language Therapist, a Physiotherapist and Occupational Therapist.

3. To observe the work of another Psychologist in assessment and therapy sessions.
4. To attend sessions of the Junior Opportunity Group run for multiply disabled children.

5. To visit a special school or unit which includes children with special educational needs.

C: **Assessment**

1. To apply 3 norm-referenced tests including the WISC III and a pre-school test of development.

2. To take a detailed history of a psychological problem using a pre-planned structure.

3. To carry out an observational assessment using a structured format as a basis for behavioural analysis.

4. To construct a family tree for a child.

5. To participate in assessing a young person who is in-patient at the Regional Adolescent Unit.

6. To gain clinical experience of a variety of problem areas, including those of particular interest such as eating disorders, OCD and APHD.

D: **Intervention**

1. To carry through the process of treatment in 3 selected cases.

2. To be included in working with a child from a different ethnic background.

3. To participate in family interview and therapy sessions.

4. To work jointly with supervisors in assessment and intervention of a range of individual cases.

E: **Teaching**

1. To assist in a Workshop run for Health Visitors designed for sharing skills about behavioural/developmental problems.

Penny Bebbington
Clinical Psychologist

Louise Minchin
Clinical Psychologist in Training

Shona Lowes
Clinical Psychologist

Supervisors

slmfl037.doc 21.10.97.
Child and Adolescent Case Report

Assessment & intervention with a nine year old boy suffering from obsessive compulsive difficulties and engagement of his parents in therapy

Jonathan Picks, a nine year old boy, was referred by his GP for help with repetitive and ritualistic type behaviours. A Cognitive Behavioural assessment revealed Jonathan displayed a number of Obsessive Compulsive behaviours which included licking his hand after touching ‘contaminated’ objects, spitting a set number of times after brushing his teeth, excessively washing his hands after using the toilet and conducting activities a set number of times. The fear (belief) underlying the behaviours was that if he didn’t perform the compulsive behaviour either he or a member of his family, would become ill and die.

An Exposure with Response Prevention model (Salkovskis & Kirk, 1989) was applied to Jonathan’s presenting difficulties. Therapeutic techniques included Relaxation Training, creating a hierarchy for Graded Exposure and in-vivo Exposure. Full behavioural analysis of targeted behaviour was conducted prior to exposure. Cognitive intervention included the identification of coping statements and self-calming imagery. After ten sessions Jonathan and his parents reported an absence of spitting behaviour and a reduction in ‘licking behaviour’. At this juncture, the Psychologist left the service and Jonathan’s care was transferred to another Psychologist.

Initially Jonathan’s father was reluctant for Jonathan to attend therapy. Further assessment revealed Mr Pick’s had not previously disclosed a paternal family history of Obsessive Compulsive Disorder (OCD). In order to engage Jonathan’s parents in his treatment, Mr & Mrs Picks were offered fortnightly appointments in order to facilitate discussion within the family regarding Jonathan’s difficulties and to provide psychoeducation on the course and treatment of OCD. By the time Jonathan was transferred to another Health Professional, Mr Picks was happy for Jonathan to continue attending therapy.
Older Adult Placement

Second Year PSYCHD

April 1998 - October 1998
Placement Contract
OLDER ADULTS

Placement dates: 23.04.98 - 02.10.98
Name of trainee: Louise Minchin
Name of Supervisor: Sara Turner

Aims of Placement
1. To introduce the trainee to this client group and give experience within the full age and problem range.
2. To have experience of the range of possible psychological assessments, therapeutic interventions and theoretical models.
3. To gain experience of the wider system of inter-professional and inter-agency networking.
4. To develop the trainee's skills in transferring psychological skills and principles to clients, carers and other professionals and agencies.
5. To develop the trainee's assessment and intervention skills specifically in the areas of Cognitive Behavioural Therapy and Neuropsychological Assessment.

Objectives
1. Trainee will carry out interventions with between 6 and 10 clients (including group work). The clients will range in age from 60. Clients to include an appropriate mix of men and women.
2. Trainee will demonstrate clinical skills with both individual clients, couples, families and groups as well as carers and staff.
3. Trainee will carry out work in a range of different settings e.g. day hospitals, continuing care settings, client’s homes etc.
4. Trainees will become familiar with at least one intervention developed specifically for older people e.g. Validation Therapy, Reality Orientation, Reminiscence, Life Review.
5. Trainee will gain experience of direct or indirect service development.
6. The trainee will gain experience of the use of a variety of assessment tools; those designed for the general population (e.g. WAIS) and those specifically designed for an older adult client group (e.g. CAPE, MEAMS, HAD, etc.).
7. The trainee will gain experience of systems theory and theories of family functioning.
8. To become familiar with contribution of voluntary services to older adults.
9. To learn about the monitoring and audit of services to older adults.
10. To learn about and implement the Care Programme Approach.

Methods
1. The trainee and supervisor will jointly select suitable clients for the trainee.
2. The trainee will have direct experience with the problem areas described below; depression in old age, dementia, adjustment and adaptation difficulties as a result of dependency and or disability, the relevance of gender and ethnicity for older adults, mortality, strokes and challenging behaviour. Additionally the trainee will...
gain experience with clients suffering from physical health, organic difficulties and functional problems
3. The trainee will attend MDT meetings.
4. The trainee will observe other professionals working with the client group, including medics, social workers and occupational therapists.
5. The trainee will write a written psychologically based formulation for each client following assessment.
6. Clients permitting, the trainee will either observe or work directly with systemic theory with older adults.
7. Client presentation permitting, the trainee will work with one client where ethnic or cultural factors are salient to the work.
8. The trainee will co-lead one therapeutic group on the day hospital.
9. The trainee will visit a number of varying settings applicable to the work of older adults (e.g. day centres, residential homes etc.).
10. The trainee will observe the supervisor teaching a group of professional carers and will provide teaching to a group of carers or other professionals.
11. The trainee will follow the Care Programme Approach for each client they keywork.
12. The trainee will observe and become actively involved in the audit of a residential home.

Structure of time in placement
1. The trainee will have half a day study per week which will be for personal study.
2. The trainee will receive one and a half hours of supervision from the supervisor every week.

Louise Minchin
Psychologist in Clinical Training

Sara Turner
Consultant Clinical Psychologist
Older Adult Case Report

Neuropsychological assessment with an 80 year old woman presenting with 'memory problems'

Mrs Smith, an 80 year old woman, was referred for a neuropsychological assessment by her Community Psychiatric Nurse (CPN) following a query regarding her memory abilities. She had a history of depression and anxiety and two years prior to assessment had suffered a 'minor' cardiovascular accident (CVA) which affected the left-hand side of her body (Mrs Smith reported a full recovery). At the time of assessment, the clinical team no longer considered Mrs Smith to be suffering from clinical depression. She was being prescribed Lofepramine (a tricyclic antidepressant) and Tibalone (Hormone Replacement Therapy).

Cognitive assessment included clinical interview of both Mrs Smith and her husband and the administration of a number of standardised neuropsychological tests which covered the areas of general intellectual functioning, visuo-spatial and perceptual skills, memory functioning and verbal fluency. Non-standardised tests included drawing a clock face (to assess spatial neglect) and the completion of an Everyday Memory Questionnaire. Data was analysed using appropriate, age-related norms.

The atypical scatter of Mrs Smith's test scores suggested the possibility of underlying organic pathology and a CT scan confirmed an old infarct (from the CVA) and possibly small vessel disease. Although Mrs Smith identified her memory as a major area of concern, the cognitive assessment gave no clear evidence of memory impairment. However, as Mrs Smith continued to voice concerns, she was offered a finite number of sessions (4) in which to consider ways of improving her memory management. Due to the indication of underlying organic pathology, it was suggested that re-testing at a later date may provide useful information for future management.
Specialist (Forensic) Placement

Third Year PSYCHD

November 1998 - April 1999
Aims of Placement
1. To develop the trainee’s knowledge of legal requirements and legislation relevant to this client group.
2. To gain experience of the range of possible psychological assessments, therapeutic interventions and theoretical models. Consolidating previously applied models (i.e. CBT and Behaviourism) with alternative approaches (e.g. Systemic approach).
3. To gain experience of the wider system of inter-professional and inter-agency networking.
4. To develop the trainee’s skills in transferring psychological skills and principles to clients and other professionals and agencies.
5. To develop the trainee’s assessment and intervention skills specifically in relation to the forensic population.
6. To gain experience of working with clients who present with long term mental health difficulties.
7. To gain experience of working with clients who have lived within ‘institutions’ for a substantial part of their lives.
8. To develop the trainee’s theoretical and clinical knowledge and skills in developing and terminating the therapeutic relationship.

Objectives
1. Trainee will carry out interventions with between 3 and 6 clients (excluding group work). Clients to include an appropriate mix of men and women and an appropriate mix of index offences.
2. Trainee will demonstrate clinical skills with both individual clients and groups as well as staff.
3. Trainee will gain experience of direct or indirect service development.
4. The trainee will gain experience of the use of a variety of assessment tools; those designed for the general population (e.g. WAIS) and those specifically designed for the forensic and personality disordered population (e.g. sex offender assessment).
5. The trainee will gain experience of systemic ways of working.
6. The trainee will increase her working knowledge of the relevance of gender, ethnicity and social status for this client group.
7. The trainee will write one case report. This will be either based on a clinical assessment (not neuro-psychological) or intervention.
Placement Contract
FORENSIC placement @ Broadmoor Hospital

Methods
1. The trainee and supervisor will jointly select suitable clients for the trainee.
2. The trainee will have experience with the problem areas described below; eating disorder, self-harm, personality disorder, male survivors of sexual abuse and perpetrators of child and adult sexual abuse. Additionally the trainee will actively consider the relevance of gender, ethnicity and social status for this client group.
3. The trainee will attend MDT meetings.
4. The trainee will observe other professionals working with the client group, including medics, social workers and occupational therapists.
5. The trainee will provide a written psychologically based formulation for each client following assessment.
6. The trainee will either observe or work directly with systemic theory.
7. The trainee will co-lead one, ward based therapeutic group.
8. The trainee will discuss the process of therapeutic change with regards to every client with her supervisor.

Structure of time in placement
1. The trainee will have half a day study per week which will be for personal study. Work load permitting, this will be taken as a whole day every two weeks.
2. The trainee will receive at least one and a half hours of formal supervision from the supervisor every week.

Louise Minchin
Psychologist in Clinical Training

Pat Short
Consultant Clinical Psychologist
Specialist (Forensic) Case Report

Working with a forensic patient of afro-caribbean origin to assist in an understanding of his medical diagnosis

Mr Delisser, a 41 year old man of Afro-Caribbean origin and an inpatient at a maximum security hospital, was referred by his clinical team for individual work to promote ‘insight into his mental illness’ (paranoid psychosis/schizophrenia). Mr Delisser was admitted to hospital from prison following reports of bizarre and paranoid delusions and threatening behaviour towards prison staff. His presenting difficulty was that his clinical team believed he had a mental illness which they perceived to be the cause of his ‘dangerous behaviour’. Applying this linear model resulted in Mr Delisser being considered unsuitable for discharge until such a time that the symptoms of his mental illness could be reliably controlled. However, Mr Delisser did not perceive himself to have a mental illness and was therefore considered by the clinical team to be in ‘denial’ and of continuing risk of harm to himself and others.

People of black cultural backgrounds often have an intense mistrust and suspicion of mental health services and this fear is often linked to cultural beliefs about behavioural disturbance (MacCarthy, 1988). Applying an explorative, neutral, curious, Social Constructionist approach enabled Mr Delisser to enter into a dialogue about behaviours he’d previously not discussed. A major focus of this dialogue was how his cultural background and beliefs impacted on his appraisal of his past behaviour and present ‘predicament’ of being a hospital in-patient.

Mr Delisser was seen for nine sessions. Listening to the patient’s understanding of the term ‘mental illness’ and using semantics applied by the patient (e.g. ‘unruly’ instead of ‘aggressive’ behaviour), permitted an understanding of his consistent denial in terms of a protective coping strategy (i.e. protective of his sense of cultural, masculine identity). This understanding being different from the institution’s original understanding which construed the denial as being a ‘lack of insight’. Feedback to the clinical team highlighted the utility of using an explorative, neutral approach to empower the patient.
to narrate his story and hence enable the team and the patient to identify factors (environmental, biological or cognitive) required to decrease future risk. Additionally despite there being no record of Mr Delisser displaying positive psychotic symptoms since his hospital admission, he remained on psychotropic medication. This information was reiterated to the clinical team by raising the issue of whether the medication was controlling the manifestation of symptoms or whether outside of the prison environment, Mr Delisser would be asymptomatic. The aim of the report was to promote a discussion in the clinical team about Mr Delisser’s future clinical management both in terms of the relationship between his previous history of receiving ‘psychotic’ diagnoses, his previous ‘unruly’ behaviour and his strong masculine, Afro-Caribbean identity. The report was discussed with both Mr Delisser’s primary nurse and the ward link psychologist. Both parties planned to discuss the issues raised in the report at the next clinical team meeting.

Research Dossier

The following projects are presented in ascending chronological order
Research Literature Review

Who are the men who sexually abuse children?
A review of the research literature

First Year PSYCHD
Classification is generally recognised as underpinning all scientific research (Ghiselin, 1981; Hempel, 1965), as exemplified by Knight & Prentky (1990): “Whether the goal is making decisions about intervention, treatment and disposition, tracking down the developmental roots of a deviant behavioural pattern, or following the life course of this pattern, failure to take the taxonomic structure of a population into account can lead to serious practical, methodological and theoretical errors” (p23). As with any classification scheme, the development of a classification scheme for child molesters cannot rely on clinical intuitions or conjecture. Classification systems based on empirical research provide a framework from which clinicians can base their assessments and interventions and provide criteria from which interventions can be empirically evaluated and tested.

Legal, clinical and psychiatric definitions of sexual abuse vary. Sex offences against children include buggery, indecent assault, rape, unlawful sexual intercourse, procuration, incest and gross indecency (for legal definitions see Home Office, 1996). The present review defines child abusers as individuals who have sexually offended against a victim under the age of 16 years (Knight & Prentky, 1990) as this appears to be the most comprehensive definition available from the literature.

Criminal statistics are likely to underestimate the prevalence of child abuse as the majority of those who commit sexual offences, especially intra-familial abusers, are not prosecuted. To ascertain the number of abusers in the general population, there are potentially a variety of sources from which information can be gathered e.g. the police, social services, voluntary agencies. The prevalence within the general population of survivors of child sex abuse is reported to range from 3 - 36% (Christo, 1997). However, due to inconsistencies between studies and the populations they use, the prevalence of sex offenders is difficult to estimate (see Fisher, 1994).

It is a long-recognised fact that child abusers are predominately men (Finkelhor, 1986). Some commentators (e.g. Plummer, 1981; Sgroi, 1982) have speculated that the number of female sex offenders might be greatly obscured and underestimated because
of cultural biases against seeing the sexual behaviour of adult females towards children as abuse. However, data gleaned from the survivors of sexual abuse provides practically no evidence to support this theory (e.g. Finkelhor, 1984). Although the literature on female sex offenders is increasing, the majority of the sex offender literature focuses on adult male perpetrators. Therefore this review focuses on the male population who sexually offend against children. It draws on the adult and relatively new, young offender research.

The present review is divided into three sections, the first part predominately considers the aetiological factors associated with child abusers, the second part addresses the proposed classification schemes and the third part overviews the theories pertaining to explain why these men abuse. The conclusions which can be drawn from the empirical data are then discussed.

**Aetiological Factors**

There are four main aetiological areas referred to within the research literature; family and social histories, histories of sexual victimisation, learning difficulties and personality factors.

**Family and Social History**

Much research has been undertaken into the family background of adolescent sex abusers. Comparisons have been made between non-offenders, non-sexual offenders and within the sex offender samples, comparing child with peer or adult abusers. In general, sex abusers have been found to be have a significantly more violent family background, to have experienced more physical violence, to have a higher prevalence of maternal history of child sex abuse, to be more likely to have had discontinuity of parental care and to have experienced feeling rejected by the family (Williams & New, 1996; Morenz & Becker, 1995; Saunders, Awad & White, 1986). No significant groupings have been found when analysing socio-demographic data (family, ethnicity and religion; Ryan, Metzner & Krugman, 1990).
In addition to deficits in social competency (e.g. Morenz & Becker, 1995), abusers have also been found to have experienced isolation from peers and had poor relationships with family members (Awad & Saunders, 1989; Saunders, Awad & White, 1986; Deisher, Wenet, Paperny, Clark & Fehrenbach, 1982; Lewis, Shankok & Pincus, 1979).

**History of Sexual Abuse**

Several studies have suggested that many incarcerated sexual abusers have histories of sexual abuse (Gebhard, Gagnon, Pomeroy & Christenson, 1965; Groth, 1979; Langevin, Bain, Ben-Aron et al, 1985) with reported incident rates varying from 2 - 70% (Williams & New, 1996; Vizard, Monck & Misch, 1995).

Adult and adolescent sex offenders report high rates of childhood sexual victimisation (Friedrich, Beilke & Urquiza, 1988; Friedrich & Luecke, 1988; Ryan, Lane, Davis & Isaac, 1987; Seghorn, Pentky & Boucher, 1987). This has led to assumptions about a causal link between early victimisation and later abusive behaviour (Eisenman & Kristsonis, 1995; Berlin & Krout, 1986). It has been suggested that approximately 20% of male victims of sexual abuse become perpetrators of abuse during adolescence (Watkins & Bentovim, 1992).

However, there are problems with assuming a link between childhood victimisation and adult abusive behaviour. It has not been conclusively shown that childhood abuse is higher in the child abusing population than among non-abusing males (Finkelhor, 1986) and the majority of male victims of childhood abuse, do not become sexual offenders (Becker, 1988). Furthermore, although child abusers are predominately men (Finkelhor, 1986), many more girls are the victims of sexual abuse than boys (McLaughlin, 1982). If being sexually abused was a strong predisposing factor, one would expect more female abusers.
Learning Difficulties

Learning difficulties and poor school achievement are commonly noted in the adolescent sex offender literature (e.g. Morenz & Becker, 1995; Epps, 1991). However, the early adult studies generally found no differences in level of intellectual functioning between sex offenders and controls (e.g. Carroll & Fuller, 1971) and the variation of functioning appears to be representative of the general population (Abel & Rouleau, 1990). Nonetheless some adolescent offenders do appear to have significant communication problems and it has been suggested these may contribute to their social isolation (Vizard, Monck & Misch, 1995). It appears that having a learning disability may play a role in an individual sexually offending against a child but it can not be seen as a predisposing factor for all child abusers.

Personality

Erickson, Walbek & Seely (1987) found that incestuous stepfathers, incestuous biological fathers and extra-familial abusers all displayed serious difficulty in interpersonal relationships which the authors interpreted as underlying personality traits. The presence of an enduring personality trait is consistent with the findings of Wilson & Cox (1983) who, when comparing 77 adult members of a self-help club for men who are sexually attracted to children with 404 control males, found the paedophiles were significantly introverted and high on psychoticism and neuroticism, (as assessed by the Eysenck Personality Inventory; Eysenck & Eysenck, 1969). Paedophiles were more likely to be shy, sensitive, lonely depressed and humourless. Within the adolescent literature, indicators of shyness, timidity and withdrawal have been found to be significantly more frequent in male sex offenders than in delinquents of non-sexual crimes (De Natale, 1989).

However, Okami & Goldberg (1992) in their review of the literature related to personality correlates of paedophilia, did not show any differentiation in personality subtypes among child abusers. This lack of homogeneity was supported by Wilson & Cox (1983) who found individual variations within their sample of child abusers. Beckett, Beech, Fisher and Fordham’s (1994) British study of 59 convicted sex
offenders in community treatment programmes, used a range of psychometric measures. Compared with a non-offender comparison group, they found child abusers to be typically emotionally isolated individuals, lacking in self-confidence, under-assertive, poor at appreciating the perspective of others and ill-equipped to deal with emotional distress. Moreover, a significant proportion of their sample had little empathy for their victims, strong emotional attachments to children and a range of distorted attitudes and beliefs, where they portrayed children as able to consent to, and not be harmed by, sexual contact with adults. Using a modified version of Thornton’s ‘Risk Algorithm’ (in Fisher & Thornton, 1993) which identifies those men most at risk of re-conviction, Beckett et al found the men at most risk of reconviction were also the ones with the most problems in the above mentioned areas. The ‘low deviancy’ group of abusers differed from the ‘high deviancy’ group on offence specifics but, unlike the ‘high deviancy’ group, did not vary from the comparison group on personality variables.

The results of Beckett et al provide support for the heterogeneity of child abusers and suggest that personality inventories may be of use in identifying the highly deviant, possibly ‘fixated’ offenders who may be at high risk of re-offending.

In attempting to identify sub-groups of sex offenders, a large number of studies have used self-report inventories and projective tests. However Knight, Rosenberg & Schneider (1985) have criticised these as having ‘inadequate standardisation of instructions, problems with inter-rater and test-re-test reliability, poor internal consistency, spurious or illusory convergent validity and an absence of cross validation’. They conclude their critique by commenting that such methods have failed to produce a body of replicable, externally validated data.

The most widely used measure reported in the sex offender literature is the Minnesota Multiphasic Personality Inventory (MMPI; Hathaway & McKinley, 1951). Many studies have attempted to use the MMPI to provide a typographic picture of child abusers (e.g. Mann, Stenning & Borman, 1992; Kalichman, 1991; Langevin, Wright &
Handy, 1990a, 1990b; Erickson, Luxenberg, Walbeck & Seely, 1987; Hall, Maiuro, Vitaliano & Proctor, 1986; Langevin, Paitch, Freeman, Mann & Handy, 1978). However, despite extensive use of the MMPI, reviews have generally been critical of its utility (Marshall & Hall, 1995; Murphy & Peters, 1992; Hanson, Cox & Woszcsyna, 1991; Smith & Monastersky, 1987) pointing out that many of the studies are methodologically flawed, that findings are generally inconsistent and that there is a heterogeneity of responses among each type of sex offender and considerable overlap in response profiles between sex offenders and other samples. Thus there appears to be little empirical support for the MMPI’s use in identifying between and within group differences (Marshall & Hall, 1995; Hanson et al., 1991).

The Multiphasic Sex Inventory (MSI; Nichols & Molinder, 1984) is designed to measure the psychosexual characteristics of sex offenders. Schlank (1995) suggests that this measure is more effective than the MMPI in determining clinically different sub groups of sexual offenders. Using cluster analysis, Schlank identified seven subtypes and reported that three MSI scales (Social Sexual Desirability, Sexual Obsessions and Paraphilias) accounted for most of the differences. She argues that these subgroups provide evidence that a taxonomy of sex offenders can be developed based on empirical clinical data which is independent of the age and sex of the victim. However, Schlank acknowledged her sample was limited to convicted, non-mentally disordered offenders, and therefore further research would be required in order to test the generalisability of her findings. Nevertheless, Schlank’s sample (N=164) is substantially larger than the majority of studies in this area.

Classification schemes

The following section reviews the proposed child abuser classification schemes. In the study of sexual aggression the importance of taxonomic issues has been widely acknowledged (see Knight, Rosenberg & Schneider, 1985). There have been a number of classification systems proposed for child molesters, the majority of these have included types described as ‘fixated’ or ‘regressed’ offenders (Groth, 1982; Groth,
Hobson & Gary, 1982; Cohen, Boucher, Seghorn & Mehegan, 1979). The paedophile or ‘fixated’ offender is thought to have a primary sexual orientation toward children. Extra-familial offenders are often described as ‘fixated’. The incest or ‘regressed’ offender’s sexual involvement with a child is thought to be a clear departure, under stress, from a sexual orientation toward peers. This offender is most often associated with intra-familial (incest) offenders. Classifying offenders as either ‘regressed’ or ‘fixated’ or ‘extra’ or ‘intra’ - familial is a system which has been widely adopted by clinicians working in this field. However, even though some research has supported the ‘regressed’ versus ‘fixated’ classification (e.g. Hobson, Boland & Jamieson, 1985), other studies have cast doubt over this model, suggesting the cross over rates between these two categories are too high (e.g. Abel, Becker, Cunningham-Rathner, Rathner, Renlean, Kaplan & Reid, 1984) and therefore, the classification does not provide adequate discrimination between the sub-groups of child abusers.

Diagnostic Classification - the psychiatric scheme

Whilst DSM-IV (American Psychiatric Association, 1994) criteria for Paedophilia (appendix one) refer neither to ‘regressed’ nor ‘fixated’ types, they do ask for a specification of exclusive (attracted only to children) or nonexclusive. The criteria also require specification of the sex of the child the paedophile is attracted to and whether their behaviour is limited to incest. Unfortunately the criteria also require the ‘problem’ to be identified as being ‘recurrent and intense’ and ‘present for at least six months’. As many sex offenders “deny and minimise the true nature of their offending behaviour” (Morrison, 1994; p35), making such an identification can be difficult. In addition to this difficulty, the diagnostic criteria exclude child abusers who are;

1. aged younger than 16 years
2. attracted to post-pubescent children
3. attracted to children less than five years younger than themselves

The use of the diagnostic criteria of DSM-IV to classify child abusers appears unsatisfactory. Both clinical observations and empirical data corroborate the diversity of males who sexually abuse children (Williams & New, 1996; Kosky, 1989; Becker, 1988; Knight et al, 1985) yet DSM-IV does not recognise the heterogeneity of child
abusers and thus excludes a significant proportion. To summarise, the criteria are too restrictive and do not provide an appropriate structure into which all child abusers can be placed.

**The Psychometric Model: The Knight and Prentky (1990) classification scheme**

A number of typologies have been proposed which have intended to increase homogeneity and to inform clinical judgements (e.g. Fitch, 1962; Kopp, 1962; Gebhard et al, 1965; McCaghy, 1967; Swanson, 1971; Groth, 1978; Cohen et al, 1979). Yet most of these systems have remained only speculative models with little or no evidence of reliability or validity which raises questions as to their potential for enhancing the efficacy of clinical decisions.

One of the best known and best regarded typology is the classification scheme of Knight and Prentky (Knight, 1988; Knight, Carter & Prentky, 1989; Knight & Prentky, 1990). Knight et al (1985) suggested that an effective classification system should meet three criteria; reliability, homogeneity and coverage. If there are individuals who cannot be satisfactorily assigned to a subgroup within a system, then the system is considered inadequate. These criteria form the rationale on which Knight & Prentky developed their model.

Using the clinical descriptive literature, Knight (1988) employed both rational/clinical and empirical/clustering strategies simultaneously, hoping that the two approaches would dovetail and ultimately converge on valid taxonomic models. They conducted a comparative analysis of seven schemes (see Knight, Rosenberg & Schneider, 1985) and considered a number of possible discriminatory variables which they labelled sociological, legal, psychiatric, psychometric and physiological/behavioural. There was substantial agreement among researchers regarding the variables that seem important for differentiating subgroups of offenders and they concluded the model by Cohen et al (1979) posited the types most consistently described in the literature and that the four types; Fixated-Passive Offender; Regressed; Exploitative; Aggressive Paedophile had counterparts in many of the other systems. They then attempted to operationalise the
typology by testing the reliability of each on a sample of committed sexual offenders. The system, known as MTC:CM2, took into account both fixation/regression and social competence. Unfortunately they found a number of overlaps between the taxonomies, some types were too heterogeneous and some offenders did not fit into the system at all. Following this, the system was revised further and the current version, MTC:CM3 (appendix two) was developed.

Detailed records on 177 convicted child molesters were collected and then the information was rated by two to four senior clinicians who were familiar with both the population and the rating procedure. Due to the small numbers within their sample, Knight & Prentky excluded incest abusers. The classification procedure followed the decision sequence shown in appendix two. Both Axis I and Axis II involve making a number of hierarchical decisions. Axis I involves deciding the individual’s strength of sexual interest in children and their social competence. This gives four possible types (types 0 - 3). Axis II considers the amount of contact the individual has with children, the meaning of this contact and the degree to which this contact involves physical injury. This gives six possible types (types 1 -6).

Inter-rater reliability on Axis I was described as good but Axis II showed greater variation, with the inter-rater reliability being described as fair (using the guidelines for interpreting reliabilities proposed by Cicchetti & Sparrow, 1981). There were also some discrepancies regarding a number of sub-groups, specifically the high-injury sadism category which Knight, Carter & Prentky (1989) concluded required further work. They state that ‘although preliminary reliability and validity results on MTC:CM3 are promising, additional studies examining the relation of MTC:CM3 to victim-sex criteria, investigating the role of disinhibitors in the system, assessing the integration of the axes, generalising the system to a broader sample of child molesters and determining the relevance of this system to incest offenders are critical’. To date, no alteration of the MTC:CM3 system been published.
The Ideographic Approach: the RAPID classification scheme

Waterhouse, Dobash & Carnie (1994) developed a scheme to 'trace recognisable patterns out of an overwhelming diversity of information so that the behaviours and orientations of an individual be better understood'. The acronym RAPID represents the 4 types of sexual abusers identified in the study: Random Abusers, Paedophiles, Incest and Deniers.

The RAPID classification scheme was derived from 'qualitative' interviews with 53 convicted child sexual abusers. Forty-five out of the fifty-three men interviewed were chosen at random from the Scottish prison population of child sexual abusers. The remaining were either on probation (6) or parole (2). The sample were fairly evenly divided between intra-familial (48%) and extra-familial (52%) offenders. The interviews covered many areas including social, family and vocational background and offence specific details. In order to encourage truthful responses, the men were guaranteed anonymity and confidentiality and all voluntarily agreed to be interviewed.

Each of the four categories are said to represent 'different patterns of behaviour, different personal backgrounds, different explanations of the behaviour and different accounts of the children's alleged reaction to abuse'. The main differentiating factor between the categories is the type of offence committed. The backgrounds of the offenders are also considered and pen pictures of the men devised. A more detailed description of the categories can be found in appendix three, the following outlines the main classifying criteria.

**Random Sexual Abusers**

These men are described as men whose sexual abuse of the child is a random outcome from what was primarily intended to be non-sexual physical violence. They form approximately 10% of Waterhouse et al's population. Their offences tend to take place in public places and the victims are never related to them.
Paedophiles
These men are sexually attracted to and preoccupied with children. Within this category, there are three types of paedophiles; professional, committed and latent. Professional paedophiles are characterised by their use of children for financial reward. Like the professional, the committed are open in acknowledgement of their attraction to children but they use the children for personal pleasure, not financial gain. Latent paedophiles acknowledge their attraction to children but do not accept this as a critical characteristic of their sexual identity. Within Waterhouse et al’s population approximately 30% were categorised as being part of this group.

Incest Abusers
The incest abusers formed the largest sub-group within Waterhouse et al’s sample, about 50% of the group fell within this category. These men have sexual relations with a child, usually a girl, living in the same household.

Deniers
These men deny they have committed an offence and therefore little information could be gathered concerning their sexual preferences. This population constituted approximately 10% of Waterhouse et al’s sample.

Unfortunately Waterhouse and colleagues do not provide details regarding the statistical analysis of their data so it is difficult to comment on how they devised the RAPID scheme. It seems unlikely that the ideographically derived RAPID schema fulfils Knight et al’s classification criteria of reliability and homogeneity. The categories are not mutually exclusive and a certain amount of overlap exists between them. Nor do they account for men who are intra- and extra-familial abusers. Waterhouse et al acknowledge the categories are not to be interpreted or used as rigid labels, however the absence of strict category criteria results in a scheme of questionable validity. The study, like many other studies in this area, sampled convicted sex offenders. The use of such a sample means one can not be sure if the scheme fulfils Knight et al’s third criteria of coverage. In conclusion the categories are too vague as many offenders
could easily fit more than one category. It is therefore unlikely to be a particularly useful or meaningful classification system. However, unlike Knight & Prentky's scheme, Waterhouse et al attempt to provide a description of the men who commit these offences. Unfortunately, they rely on their own sample which questions the generalisability of the scheme.

**Why do men sexually abuse children?**

This review has focused on who the men are who abuse children. It has considered the empirical literature on aetiological factors and the taxonomies which have been developed based on the clinical and research data. However, a review on who the men are would not be complete without giving some consideration to why they abuse. Many single factor theories of abusing have been proposed from a variety of theoretical orientations, including psychoanalytical (Centerwall, 1992; Socarides, 1991; Cook & Howells, 1981; Bell & Hall, 1976), biological (Langevin, 1990; Bradford & Mclean, 1984), feminist (Herman, 1990) and behavioural (Freeman-Longo, 1986; Langevin et al, 1985; Alford, Morin, Atkins & Schoen, 1987; McGuire, Carlisle & Young, 1965). One of the most frequently mentioned single-factor theories is that concerning the abusers own sexual victimisation. However, attributing sexually abusive behaviour to one predisposing factor has been largely discredited (Finkelhor, 1986) and the limitations of single-factor theories have resulted in several multi-factorial models (e.g. Williams & New, 1996; Wolf, 1984).

From this review, one can see a wealth of literature exists regarding the aetiological factors associated with child abusers. Unfortunately, methods, results and interpretations vary, thus this data remains inconclusive. The question of why men abuse, is essentially a question of motivation. To date, the main model which has considered this issue is Finkelhor's (1984) sequential system of four pre-conditions which need to be met before sexual abusive behaviour can occur;

1. A potential offender needs to have some motivation to abuse a child sexually
2. A potential offender has to overcome internal inhibitions against acting on their motivations
3. A potential offender has to overcome external impediments to committing sexual offending
4. A potential offender, or some other factor, has to overcome the child's possible resistance to the sexual offence

(Finkelhor, 1987)

Numerous studies provide empirical support for this model. Research indicates many abusers are often immature, have strong dependency needs (Peters, 1976), low self-esteem (Panton, 1978; Wolf, 1984) and see children as weak non-threatening objects. Having a learning disability, immaturity, or low self-esteem may produce a fit between emotional need and satisfaction in relating to a child (Rowan, 1988). However, many people receive their emotional gratification from relating to children without turning the children into sexual partners (Finkelhor, 1986) thus this alone can not account for offending behaviour and we do know there is a difference in the emotional congruence fathers and non-fathers have with children (Beckett et al, 1994).

Child abusers may be unable to meet their sexual and emotional needs in adult relationships. Studies have indicated the presence of poor social skills, high degrees of sexual anxiety and a high fear of sex (Hammer & Gleuck, 1957; Wilson & Cox, 1983). It has also been suggested adult sexual opportunities may be blocked by traumatic experience, dysfunction or marital disturbance (Rowan, 1988).

Child abusers' sexual arousal to children has been largely supported by the studies using the penile plethysmograph (PPG; Freund, 1965). Whilst there are many methodological difficulties in using the PPG (Hall, 1989; Freund, Watson & Rienzo, 1988), including findings that non-sex offenders can show deviant arousal (Quinsey & Chaplin, 1984) and sex offenders can show normal arousal patterns (Marshall, 1990), generally results have indicated child abusers are sexually aroused by children (Barbaree & Marshall, 1989; Freund & Blanchard, 1989; Earls & Quinsey, 1985).
When arousal has not been detected, it is plausible that this is due to the methodology involved rather than its absence.

Finally, many theories have been proposed as to how individuals overcome inhibitions to having sex with children. Theories include poor impulse control (Groth et al, 1982; Knopp, 1982), societal conditioning (Rush, 1980; Armstrong, 1983) and cognitive distortions (Salter, 1988). The use of alcohol is well-established as a disinhibiting factor (Araji & Finkelhor, 1985) but disinhibition may also occur for characterological, organic or familial reasons (Rowan, 1988).

**Conclusions**

This paper has reviewed the aetiological, empirical findings regarding child abusers. It has presented the most recent taxonomic structures and outlined the theories and models pertaining to explain why men sexually abuse children.

Unfortunately, whilst a substantial amount of research exists on sexual abusers, this research is flawed with conceptual and methodological problems, providing good reason to question the findings of this accumulated work (Finkelhor, 1986). Most of the studies use incarcerated offenders with varying degrees of adequate comparison groups, creating strong scepticism about the generalisability of findings. For example, the findings that there is a relationship between alcoholism and sexual abuse (Gebhard et al, 1965; Rada, 1976) and that paedophiles are shy ineffectual and passive (Toobert, Bartelme & Jones, 1959; Langevin, 1983), may result from the fact that this sample of child molesters are more likely to be caught and convicted. Certainly, the models presented in this paper may only apply to the offenders who have been successfully prosecuted. As of yet, we do not know if there is another category of sexual offender who never proceeds through the forensic or social services. Additionally, given the small numbers in so many studies, there are concerns as to the representativeness of these samples.
The quality of the information gleaned from the offenders has to be questioned. It is highly unlikely that any person identified as a sexual offender will, without some pressure, reveal the true nature of their sexually deviant, illegal and inappropriate behaviours (Wolf, 1984) and interview findings may differ depending on the expertise of the researchers involved. The importance of offering confidentiality to sex offenders in terms of gaining more information was demonstrated by Kaplan (1985). This method was utilised by Waterhouse and her colleagues, however, it is not without controversy and it is not a method all workers in this field would agree on. In addition, comparing the results of studies is made difficult as few studies replicate the measures used by others (Vizard, Monck & Misch, 1995).

Knight & Prentky’s (1990) data strongly supports the subdivision of child abusers and indicates considerable explanatory power will be sacrificed if child abusers are considered a homogenous group. Their attempts at uncovering taxonomic structures for sexual offenders is an example of a general move in taxonomic research on criminals toward creating more particularised systems within relatively circumscribed behavioural domains (Brenen, 1987). They state that multiple structural variations need to be generated and tested and a constant eye has to be kept on empirical feedback for emergent, consistent patterns (Knight & Prentky, 1990). Their model is probably the most statistically sound model to be presented in this paper, it also allows for crossover between intra- and extra-familial abusers, which the RAPID scheme does not. Unfortunately, Knight & Prentky’s model excludes incest abusers. However, considering RAPID, incest abusers may require a separate classification system. Certainly Knight et al. (1985) point out that different classification systems may be useful for different purposes, such as predicting recidivism or identifying treatment needs, and therefore it may be necessary to use more than one system.

To summarise, no one taxonomic scheme has been devised which allows for the inclusion of all child abusers. The most promising work is that of Knight and Prentky although, as they acknowledge, this requires further refinement. It is noteworthy, that despite the wealth of literature available on the backgrounds and personalities of these
men, this data is not included in their classification scheme. The most reliable, replicable data we have on child abusers concerns offence specific details. Finkelhor's 'four pre-conditions' model is well supported by the clinical and research data and has face validity on which treatment can be based. However, the literature does not appear to have attempted to combine the taxonomic and motivational issues of offending. In order for classification to have an impact on clinical work the research on taxonomy needs to converge with the work considering why these men abuse.
References


## Appendices

<table>
<thead>
<tr>
<th>Appendix</th>
<th>Content</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appendix One</td>
<td>Diagnostic criteria for Paedophilia (APA, 1994)</td>
</tr>
<tr>
<td>Appendix Two</td>
<td>A flow diagram of the MTC:CM3 classification scheme</td>
</tr>
<tr>
<td></td>
<td>(Knight &amp; Prentky, 1990)</td>
</tr>
<tr>
<td>Appendix Three</td>
<td>The RAPID classification scheme</td>
</tr>
<tr>
<td></td>
<td>(Waterhouse et al, 1994)</td>
</tr>
</tbody>
</table>
Appendix One

Diagnostic Criteria for F65.4 Paedophilia (APA, 1994)

A. Over a period of at least 6 months, recurrent, intense sexually arousing fantasies, sexual urges, or behaviours involving sexual activity with a prepubescent child or children (generally age 13 years or younger).

B. The fantasies, sexual urges, or behaviours cause clinically significant distress or impairment in social, occupational, or other important areas of functioning.

C. The person is at least age 16 years and at least 5 years older than the child or children in Criterion A. Note: Do not include an individual in late adolescence involved in an ongoing sexual relationship with a 12 or 13 year old.

Specify if:
- Sexually Attracted to Males
- Sexually Attracted to Females
- Sexually Attracted to Both

Specify if:
- Limited to Incest

Specify if:
- Exclusive Type (attracted only to children)
- Nonexclusive Type
Appendix Two

A flow diagram of the decision process for classifying child molesters on Axis I and Axis II of MTC:CM3 (Knight & Prentky, 1990)

**AXIS I**

**DEGREE OF FIXATION**

- High Fixation
  - Low Social Competency
    - (Type 0)
  - High Social Competency
    - (Type 1)
- Low Fixation
  - Low Social Competency
    - (Type 2)
  - High Social Competency
    - (Type 3)

**AXIS II**

**AMOUNT OF CONTACT**

- High Amount of Contact
  - Meaning of Contact: Interpersonal
    - (Type 1)
  - Meaning of Contact: Narcissistic
    - (Type 2)
- Low Amount of Contact
  - Low Physical Injury
  - High Physical Injury
    - Non-Sadistic
      - (Type 3)
    - Sadistic
      - (Type 4)
    - Non-Sadistic
      - (Type 5)
    - Sadistic
      - (Type 6)
Appendix Three

RAPID classification scheme (Waterhouse, Dobash & Carnie, 1994)

Random Sexual Abusers
These men are described as men whose sexual abuse of the child is a random outcome from what was primarily intended to be non-sexual physical violence. They form approximately 10% of Waterhouse et al's population. They have generally experienced a disrupted and violent childhood, gained poor academic achievement and were the victims of sexual and physical abuse. As adults they are generally separated from their spouses, have violent relationships with women and have previous criminal convictions. Their offences tend to take place in public places and the victims are never related. They often minimise the sexual element of their offences and express little remorse.

Paedophiles
These men are sexually attracted to and preoccupied with children. Within this category, there are three types of paedophiles; professional, committed and latent. Professional paedophiles are characterised by their use of children for financial reward. Like the professional, the committed are open in acknowledgement of their attraction to children but they use the children for personal pleasure, not financial gain. Latent paedophiles acknowledge their attraction to children but do not accept this as a critical characteristic of their sexual identity. All three types have similar backgrounds, with disrupted childhoods, episodes in care, and sexual and physical abuse. Within Waterhouse et al's population approximately 30% were categorised as being part of this group.

Incest Abusers
The incest abusers formed the largest sub-group within Waterhouse et al's sample, about 50% of the group fell within this category. These men have sexual relations with a child, usually a girl, living in the same household. They tend to sexualise their relationship with the child but desexualise and minimise their behaviour. They generally do not see their behaviour as harming the child. Their histories suggest few have suffered childhood abuse. They tend to have adult heterosexual relationships, rarely have a criminal record and are generally employed in semi-skilled work.

Deniers
These men deny they have committed an offence and therefore little information could be gathered concerning their sexual preferences. Compared with the men from the other categories, this group tend to be better educated than the others, with higher career attainment. Previous convictions are not common. This population constituted approximately 10% of Waterhouse et al's sample.
Service Related Research

Development and evaluation of an urgency rating system
for a child psychology waiting list

Second Year PSYCHD

Supervised by: Jonathan Foulds (Senior Lecturer in Clinical Psychology)
Penny Bebbington (Consultant Clinical Psychologist)
Shona Lowes (Clinical Psychologist)

All identifiable information regarding the research participants i.e. names, dates of birth and residential location, has been omitted in order to respect confidentiality.
Abstract

Background: Waiting Lists are a common problem for clinical psychology departments (Skinner & Ball, 1997). This study evaluates an established, subjective urgency rating system designed to assess the urgency of child psychology referrals. It proceeds to develop and evaluate a system based on standardised, objective measures.

Method: Employing retrospective case note and referral data base analysis, waiting times and initial urgency ratings were evaluated. The retrospective sample comprised 44 clients, 29 (66%) were male. In the second stage of the study, 52 parents of referred children completed the Parenting Stress Index (PSI; Abidin, 1995) and the Pre-school Behaviour Checklist (PBCL; McGuire & Richman, 1988) prior to receiving an appointment. Of this sample, 32 (62%) of the referred children were male. After the initial assessment session, the severity of the child’s presenting difficulties were rated by the assessing clinical psychologist. Clients were aged, on average, 3 years 1 month.

Results: On average the non-urgent cases waited 81 days longer to be seen than the urgent cases. The PSI, PBCL and the department’s referral based rating provided different levels of agreement with the clinician’s rating of severity post assessment (82%, 57% & 60% respectively).

Conclusion: This study supports the use of a dichotomous urgency rating scale to determine length of time spent waiting for an initial appointment. Additionally data support the use of the PSI to detect urgent cases but concludes that referral information should also be taken into consideration.
Introduction

As the status of clinical psychology has increased, so too has the number of psychology referrals. Unfortunately, increased referrals has resulted in the development of waiting lists. The findings of a recent DCP survey (Skinner & Baul, 1997) indicate that across all psychology specialities, the average time a client is having to wait for an appointment is sixteen weeks. Unfortunately, children are generally having to wait longer. The survey indicates a child has to wait between 2 and 104 weeks for an appointment (average waiting time being 41 weeks).

The obvious inadequacy of this service provision has prompted much discussion within the profession (see Newnes, 1993). Unfortunately, most of the waiting list literature tends to focus on failure to attend initial appointments (e.g. Stern & Brown, 1994) rather than providing solutions to the excessive waiting times. The most consistent suggestion to help reduce waiting lists has been to offer initial assessment interviews prior to the client being seen or placed on a waiting list (e.g. Stevenson, Hill, Hill, Macleod & Bridgstock, 1997; Geekie, 1995; Shawe-Taylor, Richards, Sage & Young, 1994). This appears to have had partial success in that it has enabled the weeding out of inappropriate referrals.

This study focuses on an alternative approach to assessing a community-based, child psychology service waiting list and considers the plausibility of assessing urgency of cases prior to initial assessment. It assesses two main assumptions; firstly that prioritising urgent cases will ensure these clients are seen faster than the non-prioritised clients and secondly, referrals defined as non-urgent may improve without psychological input.

Within the research literature, there is scant exploration of how urgency can be rated. In Turton’s (1993) survey of clinical psychology departments in acute mental health, there appeared to be some consensus about what urgency meant, including factors such as suicide risk, acute relationship difficulties and otherwise at risk e.g. alcohol
dependence or PTSD. However many of these criteria do not apply to a client group aged below five years.

In an attempt to identify children who required urgent intervention the child psychology service in which this research was conducted, devised a subjective, dichotomous urgency rating scale. A rating of urgency was given if the referrer indicated (i) that the case was urgent, (ii) that the mother had suffered or was suffering from post natal depression, (iii) the presence of mental health difficulties within the family or (iv) the presence of a crisis within the family, for example, disharmony within the parental marriage. Additionally, a rating of urgent was given if a parent contacted the service directly and stated the problem was urgent. Each case was rated on receipt of the referral. This study aims to evaluate this rating system and to develop and evaluate an urgency rating system based on standardised measures. The study comprised of three distinct parts which aimed to;

(1) Evaluate the department’s pre-existing urgency rating system in terms of its effect on waiting time.

(2) Develop an urgency rating system using standardised measures and to compare this with the system devised by the department.

(3) Evaluate whether the two urgency rating systems correlate with the clinician's view of the problem post initial assessment interview.

**Study one** : Evaluation of Subjective Rating System

**Aim**
To evaluate whether the urgency rating system devised by the department ensured that urgent cases were seen quicker than non-urgent cases.

**Rationale**
There is no point in developing an urgency rating system if the system fails to ensure that urgent cases are seen quicker than non-urgent cases.
Hypothesis
Cases rated as urgent using the department's subjective measuring system will have been seen sooner than cases categorised as being non-urgent.

Method

Participants
The department had used their rating system over a period of 6 months and 21 days. A total of 81 clients were referred within this time period, 44 of whom received urgency ratings, (some cases were not allocated an urgency rating due to variations in available time to rate referrals). Of these 44, 29 (66%) were male. The average age at time of referral was 3 years 1 month (range: 4 months to 4 years & 10 months).

Procedure
Data was collected retrospectively using information contained on the department's referral data base and by referring to case notes.

Waiting time was defined as the number of days between the date the case was referred to the service and the date of the first offered appointment (Stern & Brown, 1994).

The data was divided into two groups depending on the urgency rating the referral had received. The data was then analysed using t-tests to determine whether the two groups differed in terms of age and time spent on waiting-list. A chi-squared analysis was undertaken to determine whether the sex of the child was associated with the allocated urgency rating. The difference between groups in terms of referral problem was also considered but numbers for each problem category were too small to conduct meaningful statistical analysis.
Results

During the period from which data was collected neither of the two clinical psychologists took long term sickness or maternity leave. None of the 44 clients attended group therapy and all were offered individual therapy.

Of the total 44 cases, 15 cases were rated as urgent and 29 as non urgent. The urgent and non-urgent groups significantly differed in terms of age ($t=2.91$, $df=42$, $p=0.01$). The average age of the cases rated as urgent was 3 years & 8 months (sd 0.7). For non-urgent cases, the average age was 2 years and 5 months (sd 1.3).

Table One: The number of clients given each urgency rating and the sex of these children.

<table>
<thead>
<tr>
<th>Rating</th>
<th>Male</th>
<th>Female</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Urgent</td>
<td>6</td>
<td>9</td>
<td>15</td>
</tr>
<tr>
<td>Non-Urgent</td>
<td>23</td>
<td>6</td>
<td>29</td>
</tr>
<tr>
<td>Total</td>
<td>29</td>
<td>15</td>
<td>44</td>
</tr>
</tbody>
</table>

Table 1 displays the sex of the children within the two groups and table 2 displays the distribution of referral problem. A chi-squared analysis revealed that a higher proportion of girls than boys were rated as urgent ($\chi^2=6.80$, $df=1$, $p<0.01$).

Table Two: The number of children referred for each category of problem, divided into rating of urgency.

<table>
<thead>
<tr>
<th>Referral Problem</th>
<th>Urgent</th>
<th>Non-Urgent</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sleep</td>
<td>2</td>
<td>6</td>
<td>8</td>
</tr>
<tr>
<td>Toiletting</td>
<td>5</td>
<td>7</td>
<td>12</td>
</tr>
<tr>
<td>Feeding</td>
<td>0</td>
<td>3</td>
<td>3</td>
</tr>
<tr>
<td>Behaviour</td>
<td>5</td>
<td>10</td>
<td>15</td>
</tr>
<tr>
<td>Communication</td>
<td>1</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Other</td>
<td>2</td>
<td>2</td>
<td>4</td>
</tr>
</tbody>
</table>

The average waiting time for the cases rated as urgent was 46 days (i.e. 6 weeks). The average waiting time for the cases rated as non-urgent was 127 days (i.e. 18 weeks). The two groups significantly differed in terms of time spent on waiting list ($t=-8.00$, $p<0.01$).
Therefore, on average, non-urgent cases waited 81 days longer to be seen (95% CI = 61, 102).

Summary
The results were not confounded by staff absenteeism or the use of group therapy as neither variables were present. The two groups significantly differed in terms of age and child gender was found to be associated with the allocated urgency rating. These findings could be due to bias at the point of referral or at the point of urgency rating allocation. Alternatively, the distribution of age and gender may be a true reflection of the referred population.

There was within group variation of referral problem with behaviour and toileting being the main reasons for referral. However, the type of referral problem was relatively evenly distributed between the two groups, suggesting that referral problem alone was not a significant factor in determining how quickly a child was seen.

Only approximately half of the cases referred to the department during the specified time period were allocated an urgency rating. Although this obviously decreases the amount of data available to analyse, it does not alter the significance of the findings. In terms of affecting the time clients spend on waiting lists, the analysed data supports the use of a dichotomous urgency rating scale. Cases rated as urgent were seen quicker than cases assessed as being non-urgent.

Study two : Development of an urgency rating system based on standardised measures.

Study one supported the efficacy of using a rating scale to determine the speed with which a client is offered an initial appointment. This part of the study focuses on implementing a measure of urgency based on standardised measures.
Parents were asked to complete questionnaires as part of the referral process. Concern was raised that asking parents to complete a questionnaire would result in parents not attending initial appointments. However, the research literature indicated that actively involving parents in requesting help for their children increases initial attendance rates (Adams, Underwood & Strirzaker, 1989). Additionally, clinicians have argued the importance of the client being informed of the referral procedure and being enabled to make an impact on this process (e.g. Seager, 1991).

Aims

- To develop an urgency rating system using standardised measures and to compare this with the system devised by the department.
- To evaluate whether the two urgency rating systems concur with the clinician's view of the problem post initial assessment interview.

Rationale

Using standardised measures prior to an initial assessment will provide a more accurate measure of urgency than the subjective measure currently in use.

Hypotheses

1. The parents who do not return the questionnaires will not require an appointment when their child reaches the top of the waiting list.

2. Referrals given a rating of urgent will score higher on the Parenting Stress Index (PSI) and Pre-School Behaviour Checklist (PBCL) than the referrals categorised as non-urgent.

3. The parents who score highly on the PSI are also likely to score highly on the PBCL.

4. Referrals defined as non-urgent will not present with severe difficulties on assessment by the psychologist.
5. The standardised measures will identify urgent cases (as identified post clinical assessment) with more accuracy than the department's original urgency rating system.

**Method**

**Participants**

Participants were recruited via referrals made to the child psychology service over a period of 6 months and 21 days (the same time period as in study one). Within this period a total of 55 clients were referred. Three of these clients did not participate, one because the child had a terminal illness which made participation clinically inappropriate and two due to clerical error. Of the 52 clients who did participate, 32 (62%) were male. The average age at time of referral was 3 years 1 month (range: 11 months to 4 years & 10 months).

**Measures**

Any assessment of pre-school 'behavioural dysfunction' needs to consider both (i) the type of problem and (ii) the environment in which the problem has arisen and in which it is being maintained (Herbert, 1991). Hence any objective measure of 'urgency' needs to consider both these issues.

(i) **Type of problem**

There are very few objective behaviour screening measures for the under five age group. Most objective measures are designed for use with school age children (e.g. Achenbach, 1988). An on-line literature search of PSYCHLIT revealed only one measure: The Pre-School Behaviour Checklist (PBCL; McGuire & Richman, 1988). The PBCL is designed for use within the nursery and aims to provide a systematic and objective description of behaviour. It measures the presence of conduct problems, emotional difficulties, social relations and contains five specific questions focusing on speech and language, habits, wetting and soiling.
The PBCL comprises 22 items and is estimated to take eight to ten minutes to administer. The maximum possible score is 44. A total score of 12 or above is said to indicate the child has behaviour problems which require further assessment.

(ii) Environment
The existing research demonstrates that by considering the course of a developing parent-child relationship, predictions about the child’s later adjustment can be made. There is a growing body of evidence to suggest difficulties in the early parent-child dyad result in longer term difficulties in the cognitive, emotional and social development of children (e.g. Bornstein & Tamis-LeMonda, 1989; Bakeman & Brown, 1986). Abidin (1995) suggests that by identifying parent-child systems under excessive stress, it may be possible to identify those systems at risk for the development of dysfunctional parenting behaviours or the display of 'problematic' child behaviours.

The Parenting Stress Index (PSI; Abidin, 1995) is designed as a screening and diagnostic tool to yield a measure of the relative magnitude of stress in the parent-child system. In a review of parenting assessment instruments Heinze & Grisso (1996) conclude that the PSI appears to be an internally consistent and temporally stable instrument. They also state that numerous studies attest to its concurrent, predictive and discriminate validity with approximately 200 studies having utilised the PSI.

Research suggests elevations on the PSI can be interpreted to suggest increased stress in parent-child interactions and increased likelihood of the child displaying or developing behaviour problems in this parent’s care. Heinze & Grisso (1996) recommend the use of the PSI as an initial screening tool to identify potential areas of stress or conflict between the child and parent.

There are two versions of the PSI. This study uses the short-form (PSI/SF) as this contains just 36 items and takes approximately 10 minutes to administer. Parents answer using a 5-point Likert-type scale. A parent gaining a total Stress score above
the raw score 90 (at or above the 90th percentile) are said to be experiencing clinically significant levels of stress.

(i) Part One

Procedure

On receipt of the referral the client was given an urgency rating using the departments original urgency rating system. This rating determined the speed with which clients were seen.

The waiting-list letter which usually followed a referral was amended to include a statement requesting parents to complete the PSI/SF and PBCL in order for their child’s referral to be processed (appendix one). A stamped addressed envelope was provided.

If the questionnaires had not been returned once the child had reached the top of the waiting list then an additional letter (appendix two) was sent informing the parent that the questionnaires had not been received and that their child was now at the top of the waiting list. They were informed that if the department did not hear from them within ten days then it would be assumed that they no longer required the service’s input and their child’s name would be removed from the waiting list.

The PSI and PBCL data was divided into two groups depending on the department urgency rating the referral had received. The PSI data was then analysed using a t-test and the PBCL data (which were unevenly distributed) was analysed using a Mann-Whitney test in order to determine whether the two ‘urgency’ groups differed in terms of scores gained on the questionnaires. Additionally the PSI and PBCL data was analysed using spearman’s rho to determine whether the two data sets positively correlated.
Results

Data collection ceased four months after the last referral included in this study’s cohort and at this juncture six clients remained on the waiting list. Three of these participants had not returned any questionnaires and three had been given appointment times. Of the 52 participants who were sent questionnaires, 34 (65%) returned at least one questionnaire.

Of the 18 who did not return any questionnaires (35% of the total sample), 15 had been contacted at the time data collection ceased. Nine of these fifteen (60%) withdrew their request for an appointment. Due inconsistency within the clinical team, only five of these fifteen received a follow-up letter before they were offered an appointment. Of these five, four no longer wanted to be seen. In total, 11 of the 46 (contacted) referrals withdrew their appointment request and two of these had been given a rating of urgent by the department.

The average PSI and PBCL scores are displayed in table three. The two sets of scores significantly correlated ($r^2 = 0.24, p<0.01$). The difference between the urgent and non-urgent groups’ PSI and PBCL scores was not significant ($t=-1.45, df=30, p=0.16$ and $u=117.5, p=0.65$, respectively).

<table>
<thead>
<tr>
<th>Urgency Rating</th>
<th>PSI Scores</th>
<th>PBCL Scores</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>N</td>
<td>Average Score</td>
</tr>
<tr>
<td>Urgent</td>
<td>12</td>
<td>81.65</td>
</tr>
<tr>
<td>Non-Urgent</td>
<td>20</td>
<td>92.69</td>
</tr>
</tbody>
</table>

Table Three. The average scores obtained on the PSI and PBCL within the two urgency groups

Of the 33 returned PBCL's, 76% (N=25) scored the same or above the suggested cut off score of 12. Of the 32 returned PSI's, 50% (N=16) scored the same or above the suggested cut off score of 90. Fourteen individuals scored the same or above the cut off points on both the PSI and the PBCL. Only 5 of these 14 were given a referral rating of 'urgent' by the department.
(ii) **Part Two**

**Aim**

To assess the level of severity of the referred case at the point of clinical assessment and to see if this concurs with the previous assessments (i.e. the standardised measures and the departments initial ratings).

**Procedure**

After the clinical psychologist had completed their initial assessment session, they rated how severe the child’s difficulties were on a frequency continuum ranging from 1 (high severity) to 5 (not severe). This rating was then compared with the initial ratings given by the department and the scores obtained on the standardised measures.

**Results**

At the time data collection ceased, 35 cases had been assessed by one of the three clinical psychologists working within the department. Of these 35, 28 had returned their PSI and 29 had returned their PBCL. The number of cases given each clinical rating score and their average PSI and PBCL scores are displayed in table four. The ratings given to the six cases which did not complete any questionnaires were as follows; not severe \(N=1\); low severity \(N=2\); medium-low severity \(N=2\); medium-high severity \(N=1\).

There was no significant difference in the clinical ratings given to the initial urgent and non-urgent groups \(t=112.5, p=0.28\). Of the 22 cases which had received a non-urgent rating, 7 (32%) received a clinical rating of either ‘medium-high’ or ‘high’ severity.

---

1 A rating of ‘1’ was given if it was considered the case required immediate intervention.
<table>
<thead>
<tr>
<th>Clinical Rating</th>
<th>Initial rating of urgency</th>
<th>Average PSI scores</th>
<th>Average PBCL scores</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 - High severity</td>
<td>Urgent (N=1)</td>
<td>112 (N=1)</td>
<td>7 (N=1)</td>
</tr>
<tr>
<td></td>
<td>Non-urgent (N=1)</td>
<td>18 (N=1)</td>
<td></td>
</tr>
<tr>
<td>2 - Medium-high severity</td>
<td>Urgent (N=5)</td>
<td>90.96 (N=5)</td>
<td>20.66 (N=5)</td>
</tr>
<tr>
<td></td>
<td>Non-urgent (N=6)</td>
<td>115.75 (N=6)</td>
<td>19.5 (N=6)</td>
</tr>
<tr>
<td>3 - Medium-low severity</td>
<td>Urgent (N=3)</td>
<td>83.77 (N=3)</td>
<td>16.2 (N=3)</td>
</tr>
<tr>
<td></td>
<td>Non-urgent (N=6)</td>
<td>95.75 (N=6)</td>
<td>15.28 (N=6)</td>
</tr>
<tr>
<td>4 - Low severity</td>
<td>Urgent (N=4)</td>
<td>68.43 (N=4)</td>
<td>15.5 (N=4)</td>
</tr>
<tr>
<td></td>
<td>Non-urgent (N=5)</td>
<td>66.07 (N=5)</td>
<td>11 (N=5)</td>
</tr>
<tr>
<td>5 - Not severe</td>
<td>Urgent (N=0)</td>
<td>89.87 (N=0)</td>
<td>11.37 (N=0)</td>
</tr>
<tr>
<td></td>
<td>Non-urgent (N=4)</td>
<td>11.37 (N=4)</td>
<td></td>
</tr>
</tbody>
</table>

Table four. The average PSI and PBCL scores of the cases given a severity rating, post assessment, by a clinical psychologist.

The PBCL scores did not significantly correlate with the allocated clinical ratings ($r^2 = 0.09$, $p=0.12$) but the PSI scores did ($r^2 = 0.16$, $p<0.01$). Further analysis of the PSI scores revealed that a cut-off point of 90 only provided 52% agreement between the clinicians rating of severity and the PSI’s assessment of the parent’s level of stress (see table 5a). Using the current data set, an optimal level of agreement of 82% can be achieved if this cut off point is raised to 106 (see table 5b).
Table five:
Number of cases given a clinical rating of either 'high or medium-high severity' (1-2) or 'medium-low or low severity or not severe (3-5) and the number of cases with a PSI score above and below 90 (8a) or 106 (8b).

**Discussion**

**Hypothesis One**

The parents who do not return the questionnaires will not require an appointment when their child reaches the top of the waiting list.

Of the 15 who did not return any questionnaires (excluding the 3 cases which had not been seen or contacted at the time data collection ceased), the majority (60%) withdrew their request for an appointment. These results are in the predicted direction and are consistent with previous findings which indicate that parents who do not return questionnaires, no longer require or request psychological input (Adams et al, 1989).

**Hypothesis two**

Referrals given a rating of urgent will score higher on the PSI and PBCL than the referrals categorised as non-urgent.

On average referrals categorised as ‘urgent’, did not score higher on the PSI or PBCL than referrals rated as non-urgent. In fact the non-urgent group, on average, scored higher on both measures. This suggests that either the standardised measures and the departments rating system were measuring different constructs or that one or both approaches were not accurate in their ability to identify urgent cases.
Hypothesis three

The parents who score highly on the PSI are also likely to score highly on the PBCL.

Although the parents who scored highly on the PSI generally scored highly on the PBCL, the correlation between the PSI and PBCL scores was particularly low ($r^2=0.24$). Thus the support for this hypothesis is weak.

Hypothesis four

Referrals defined as non-urgent will not present with severe difficulties on assessment by the psychologist.

A substantial amount (32%) of twenty-two cases initially rated 'non-urgent' were given a rating of 'medium-high' or 'high' severity post clinical assessment. This discrepancy may be due to the original rating being inaccurate or the original rating being accurate but the problem becoming more severe whilst the referral was on the waiting list. Either way, these results question the validity of a referral based assessment procedure.

Hypothesis five

The standardised measures will identify urgent cases (as identified post clinical assessment) with more accuracy than the department's original urgency rating system.

The three measures (i.e. the PSI, the PBCL & the dichotomous rating given by the psychology department) were assessed to see to what extent they agreed with the clinician's rating of severity post assessment. In terms of clinical significance it is not concerning if a referral originally rated as severe turns out not to be. However, it is concerning when a case originally rated as non-urgent (and therefore left on the waiting list for longer) is considered severe on assessment. If this occurs the rating system is considered to have failed in its objective of allowing urgent cases to be seen quicker than non-urgent cases.
For the PSI the suggested score of 90 (Abidin, 1995) only provided a 52% agreement between the clinician’s rating and the PSI’s assessment of parenting stress. Increasing the cut-off point to 106 provided a higher level of agreement (i.e. 82%). Using this cut-off point, the PSI’s failure rate was 15% (i.e. 4/27 cases were considered severe on assessment although they had originally received a rating of non-urgent).

The PBCL is designed for use by nursery school staff to help identify children with emotional and behavioural problems (McGuire & Richman, 1988). Therefore, it is not surprising that the majority of the referrals to the child psychology service (i.e. 76%) scored above the suggested cut-off score of 12. Using this 12-point cut-off provided a 57% agreement with the clinicians rating of severity. Unfortunately, it also presented a failure rate of 39%. Table six summarises the failure rates and level of agreement with the clinicians rating of assessment for all three measures. The department’s referral based urgency rating system gave an agreement level of 60% and a failure rate of 20%.

<table>
<thead>
<tr>
<th>Measure</th>
<th>Level of Agreement</th>
<th>Failure Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>PSI (cut off = 106)</td>
<td>82%</td>
<td>15%</td>
</tr>
<tr>
<td>PBCL (cut off = 12)</td>
<td>57%</td>
<td>39%</td>
</tr>
<tr>
<td>Referral based rating</td>
<td>60%</td>
<td>20%</td>
</tr>
</tbody>
</table>

Table six. Level of agreement and failure rate of the assessment measures when compared with the clinician’s rating of severity post assessment.

In summary, out of the three measures used, the PSI had the strongest relationship with the clinician’s assessment of severity post assessment and the lowest failure rate.

Conclusions

1. Reliability of measures

This study supports the use of a dichotomous urgency rating scale to determine length of time spent waiting for an initial appointment. Although the sample is relatively small and the findings can only be considered preliminary, the data provides tentative support for the use of the PSI to determine the urgency rating given to referred cases.
This study did not support the use of the PBCL as a measure for assessing the urgency and severity of referrals made to a psychology service. However, clinicians reported the measure provided further qualitative information. Hence, this measure is useful in helping gather clinically relevant information prior to assessment. This is also true of the PSI.

It appears an assessment procedure based solely on information provided by the referrer is unlikely to provide a valid and reliable rating of urgency. However, there are some benefits to using such a system. Firstly, a low score on the PSI does not necessarily indicate the absence of problems because in some cases the parent may be trying to create a good impression (Heinze & Grisso, 1996). Secondly, a low score may be obtained if a parent is unaware of their child’s difficulties. For example, the parents of a case considered ‘urgent’ by both the referrer and the Clinical Psychologist, did not consider there was a problem as they were unaware that their child was displaying behaviour on the autistic continuum. Thirdly, an assessment procedure based solely on questionnaire scores could not rate referrals for whom no questionnaires were returned. Yet this study shows that some parents who do not return questionnaires continue to request input.

2. Methodology and Referral Procedure
a) This study used the clinician’s post assessment clinical judgement as the standard by which urgency and severity were measured. This may not to 100% accurate and there could be inter-clinician disparities. Future studies would have to consider inter-rater reliability and possibly devise a more structured and comprehensive rating procedure.

b) This study also highlighted the importance of stringently applying referral procedures. The follow-up letter appeared a useful resource in identifying cases which no longer required input but the majority of cases were contacted prior to its use.
Concluding Comment

The accuracy of any rating system requires empirical assessment, especially as each misclassification could be highly clinically significant for the child concerned. Unfortunately it is unlikely that any rating system could guarantee 100% success. This study provides support for the use of the PSI and given the considerations mentioned above, it also highlights the importance of considering referral information. Hopefully, continuation of the study will provide further information regarding the validity of the PSI as tool for assessing urgency of child psychology referrals.

The results of this study were discussed with the child psychology department’s clinical psychologists (appendix three).
References


## Appendices

| Appendix One | - | Waiting-list letter |
| Appendix Two | - | Follow-up letter |
| Appendix Three | - | Letter from child psychology department following completion of study |
CONFIDENTIAL

Dear

We have received a referral for [redacted] to be seen by the Child Psychology Department. Unfortunately, because we have received a large number of referrals recently there will be a longer delay than usual in offering an appointment, but we shall endeavour to contact you in a few weeks to arrange this.

In the meantime, and in order for us to process the referral, please complete the enclosed questionnaires and return them in the provided envelope. The questionnaires form an initial part of our assessment procedure and we ask all parents to complete them prior to the first appointment.

If you have any queries or your child's difficulties have improved and you no longer require our services please phone me on

Yours sincerely

Clinical Psychologist
Dear

has now reached the top of the Child Psychology Department's waiting list. Unfortunately, we have not received the questionnaires we sent you with our original letter.

Please telephone me to state whether or not you still require our services. If we do not hear from you within ten days of this letter, I shall assume your child's difficulties have improved and will remove their name from our waiting list.

Yours sincerely

Clinical Psychologist
Appendix Three

_Better from child psychology department following completion of study_
Dear Louise,

Thank you for taking the time to come today to meet with us to feed back the findings from your research dissertation "Development and Evaluation of an Urgency Rating System for a Child Psychology Waiting List."

This was very informative and has provided our service with some options from which we can consider incorporating into our working practice. The main points which we have taken from this meeting are as follows:-

1. Placing children rated as urgent as a standing item on the agenda for our fortnightly child service business meeting.

2. Although the Problem Behaviour Checklist did not give reliable information about the urgency of the referral, we may still wish to continue to use it for qualitative purposes.

3. For this particular child population increasing the score of the parental stress index to 106 would give the best cut off point to discriminate between urgent and non-urgent referrals, based on the sample used in your research.

4. To increase identification of urgent referrals children who were not originally identified as urgent based on the clinical assessment at the first appointment could subsequently be included on the urgent list when their PSI arrived if they scored above 106.
5. We need to identify objective written criteria at the clinical assessment stage for rating of urgent and non-urgent referrals to increase reliability both within and between raters.

6. The urgency rating and PSI score should be included for each child on the total referral list.

7. There may be scope for a future research project on a larger sample of referrals.

Thank you for your contribution to our Child Clinical Psychology service particularly for its practical implications.

With kind regards.

Yours sincerely

Penny Bebbington
Shona Lowes
Dr. J. Nixon
Clinical Psychologists

cc File
Small Scale Research

Investigation into the reliability of a personality questionnaire

Second Year PSYCHD

Supervised by: Jonathan Foulds (Senior Lecturer in Clinical Psychology)
ABSTRACT

Background: Cognitive structures entitled 'Early Maladaptive Schema' (EMS) are theorised to play a central role in the development of people’s personality (Young, 1990). The Schema Questionnaire (revised and shortened by Young & Brown, 1994) is designed to assess the presence of EMS but there is no published evaluation of this version of the tool. This study assesses the test-retest reliability and internal consistency of the 15 scales contained within the 75 item schema questionnaire. The research is part of a larger scale project assessing Jeffrey Young’s assertion that people with Personality Disorder’s have Early Maladaptive Schemas (Young, 1994).

Method: Using postal recruitment, 45 clients on Primary Care and Community Mental Health Team psychology waiting lists were contacted. The average age of the 24 participants who responded was 38 years and 14 (58%) were female. One month later, the participants were asked to complete the questionnaire for a second time (18 participants responded).

Results: Due to the relatively small sample size, the findings of this study should be considered preliminary. However all 15 EMS scales showed both adequate internal consistency (α range: 0.82-0.95) and test-retest reliability (ρ range: 0.65-0.97), thus lending support to Young’s theory that EMS are stable and enduring cognitive structures.

Conclusion: Further assessment of the questionnaire’s psychometric qualities is recommended as is further assessment of the suggested relationship between personality disorder and EMS.
INTRODUCTION

WHAT IS A COGNITIVE SCHEMA?
Cognitive schemas are theorised to be stable and enduring cognitive structures which form the core of the individual’s self concept (Beck, 1967; Segal, 1988; Young, 1990). Within the cognitive therapy literature the term ‘schema’ has been defined in a number of different ways. For example, the term has been used to refer to (1) a hypothesised structure of cognition, such as a mental filter or template that guides the processing information (e.g. Landau & Goldfried, 1981) or (2) latent, core beliefs which are identified by their content e.g. ‘I am a bad person’ (Young, 1990). Whatever the exact definition, the cognitive therapy literature generally views schema as the basic rules the individual uses to adapt to life’s challenges and to organise his or her perceptions of the world, self and future (Layden, Newman, Freeman & Morse, 1993). Cognitive schemas consist of “organised elements of past reactions and experience that form a relatively cohesive and persistent body of knowledge capable of guiding subsequent perception and appraisals” (Segal, 1988; p147).

WHAT IS A PERSONALITY DISORDER?
The main classification systems utilised in current clinical practice are those of the American Psychiatric Association (1994; DSM-IV) and the World Health Organisation (1992; ICD-10). DSM-IV takes precedence in the research literature and divides the disorders into four clusters (appendix one). However, the comorbidity of personality disorder diagnoses and the degree of heterogeneity within diagnostic groups questions the validity of the current diagnostic approach to these disorders (Roth & Fonagy, 1996).

There are two important characteristics which differentiate individuals with personality disorder from individuals with other mental health diagnoses (Young & Lindemann, 1992). Firstly, there is a presence of enduring, inflexible traits. Millon (1981) in his identification of ‘Pathological Personalities’ emphasises this by highlighting the presence of adaptive inflexibility and a tendency to foster vicious circles (behaviourally
and cognitively). People with personality disorders are frequently characterised by a rigid, constricted and extreme pattern of interpersonal and cognitive behaviour (e.g. Kiesler, 1986). Secondly, *avoidance* is a distinguishing personality disorder characteristic. Patients with personality disorder do not have relatively free access to their thoughts and feelings and usually avoid painful memories and associations. Young & Lindemann (1992) argue that this chronic avoidance results in clients being unable to use short term cognitive therapy unless additional techniques are applied.

**SCHEMA THEORY & PERSONALITY DISORDER**

Although the concept of personality is well established (Tyrer, Casey & Ferguson, 1993), it remains difficult to define, with different theoretical orientations presenting different causal concepts and using different terminology. Stein & Young (1992) in their review of personality theory, argue that schema theory can usefully integrate the behavioural, analytic and learning views.

In his cognitive theory of depression, Beck (1967) theorised that schemas could account for the regularities and predictability's of behaviour. These core beliefs are hypothesised to play a central role in the maintenance of long-term mental health problems (Padesky, 1994).

Beck, Freeman & associates (1990) suggest that different types of schemas have different functions and that they can be viewed as operating in a logical linear progression. For example, when a stimulus is interpreted as dangerous (cognitive schema), the individual feels anxious (affective schema), wants to get away (motivational schema) and becomes mobilised to flee (instrumental schema). If the individual determines that running away is unhelpful, they may inhibit that impulse (control schema). (Example from Stein & Young, 1992).

The alternative schema theory for personality disorders is that of Early Maladaptive Schemas (EMS; Young, 1990). Theoretically there are key similarities between Beck and Young's schema. For example, both theories view schemas as being central to the
person’s sense of self with schemas guiding the way people think, behave, feel and relate to others. However, Young’s (1990) EMS differ from Beck’s schemas (core beliefs) in terms of the conditional status of the higher level belief they give rise to. Beck’s core beliefs give rise to underlying assumptions (conditional beliefs), for example, the core belief ‘I’m Bad’ could give rise to the conditional belief, ‘If anyone really knew me, he or she would reject me’ (Beck, 1996). Young’s EMS also give rise to higher levels of beliefs but these are unconditional, for example, ‘I’m Bad’ could give rise to the unconditional belief ‘No woman will ever want to marry me’ (Layden et al, 1993). Unlike Beck’s core beliefs, EMS do not give rise to ‘if-then’ propositions, they are absolute (Layden et al, 1993).

**Early Maladaptive Schema**

Early Maladaptive Schemas (EMS) are extremely broad and pervasive themes regarding oneself and one’s relationships with others which, by definition, are maladaptive to the person’s life situation. They originate in early childhood (as a result of cumulative dysfunctional experiences with parents, peers or siblings; Young, 1994) and develop as a result of ongoing noxious experiences, such as severe deprivation, rejection, abuse, instability, criticism or abandonment. The child’s attempts to try and avoid future pain and to make sense of his or her experiences result in deeply entrenched patterns of dysfunctional behaviour and distorted cognitions. Subsequently, the developed EMS interfere with the individual’s ability to satisfy his or her basic needs for stability and connection, autonomy, desirability and self-expression and to accept reasonable limits and boundaries in relationships with others (Bricker, Young & Flanagan, 1993).

Bricker et al (1993) identify fifteen schema which they clusters within five domains entitled ‘Instability and Disconnection’, ‘Impaired Autonomy’, ‘Undesirability’, ‘Restricted Self-Expression’ and ‘Impaired Limits’. The number and names of the domains and their schema differ depending on the date of publication (e.g. Young, 1990; Bricker et al, 1993; Young, 1994; Schmidt, Joiner, Young & Telch, 1995) However, Bricker et al (1993) provide a comprehensive description of schema
definitions, origins, characteristics and the relevant therapeutic strategies (see Table 1 for summary of the former).

EMS are capable of generating high levels of disruptive affect, extremely self-defeating consequences and/or significant harm to others (Young & Lindemann, 1992). They are deeply entrenched and are difficult to change (Young & Lindemann, 1992). They "retain their position of power by permeating every sphere of functioning: behavioural, cognitive, emotional and interpersonal" (Bricker et al, 1993). Young (1990; 1994) identifies three processes through which schema survive; Maintenance, Avoidance and Compensation. These three processes serve to reinforce the schema and to prevent the high levels of negative affect which are experienced when maladaptive schema are activated. To some extent, the processes overlap with the psychoanalytic concepts of resistance and defence mechanisms (Bricker et al, 1993). Schema Maintenance refers to the generation of behaviours (covert and overt) which keep the schema in tact. Schema maintenance is hypothesised to account for the rigidity characteristic of Personality Disorders (Young & Lindemann, 1992). Schema Avoidance refers to the cognitive, behavioural and emotional strategies employed by the individuals which serve to avoid activation of their maladaptive schemas. Schema Compensation refers to behaviours or cognitions which appears to be the opposite of what the schema suggests. The function of these over-compensatory behaviours is to avoid triggering the schema.

Schema Focused Cognitive Therapy
EMS are so fundamental to the individual's perceptions that they rarely notice the influence of schemas on their lives (Layden et al, 1993). This makes them difficult to assess and to access in treatment. Young (1990) developed Schema-Focused Cognitive Therapy (SFCT) specifically to address the needs of patients with long-standing characterological disorders.

SFCT integrates the strategies of short-term cognitive therapy with experiential (affective) and interpersonal interventions (for more detail see McGinn, Young &
<table>
<thead>
<tr>
<th>Schema Domain</th>
<th>Domain Characteristics</th>
<th>Domain Origins</th>
<th>Early Maladaptive Schema</th>
</tr>
</thead>
</table>
| Instability and Disconnection | Expectation that security, safety and nurturance needs will not be met in a consistent or predictable way within intimate or family relationships. | Early experiences of detached, explosive, unpredictable or abusive family environment. | • Abandonment/Instability  
• Abuse/Mistrust  
• Emotional Deprivation |
| Impaired Autonomy    | Expectation that others will abuse, cheat, humiliate, hurt, lie, manipulate or take advantage of one. | Family of origin is usually highly enmeshed with the parents being overprotective and frequently undermining the child’s judgement. | • Functional Dependence/Incompetence  
• Vulnerability to Harm and Illness  
• Enmeshment/Undeveloped Self |
| Undesirability       | Excessive involvement and emotional closeness with one or more significant other resulting in insufficient individual identity. | Early experiences of significant criticism and rejection by family or peers. | • Defectiveness/Shame  
• Failure to Achieve  
• Social Undesirability/Alienation*  
*subsumes Young’s (1990) 'social isolation/ alienation' & 'Social Undesirability' schemas |
| Restricted Self-Expression | Unusual restriction, suppression, or ignorance of one’s emotions or daily preferences. | Early environment where performance standards and self-control take precedence over pleasure and playfulness. | • Subjugation  
• Self-Sacrifice/Overresponsibility  
• Emotional Inhibition  
• Unrelenting/Unbalanced Standards |
| Impaired Limits       | Inadequate internal limits resulting in difficulties with respecting the rights of others or in meeting personal goals. | High incidence of permissiveness and indulgence in family of origin. | • Entitlement/Self-Centeredness  
• Insufficient Self-Control/Self-Discipline |

Table 1. Summary of Young’s Early Maladaptive Schema (Bricker et al, 1993).
Sanderson, 1995). The addition of the experiential and interpersonal strategies are proposed to deal with the high degree of rigidity, avoidance, and interpersonal dysfunction which are characteristic of personality disorders (Young & Lindemann, 1992). Bricker et al (1993) describe SFCT as extending the strategies of short-term cognitive therapy by including "the exploration of early childhood origins of client’s problems, the interpersonal aspects of the therapy relationship and the utilisation of imagery and other experimental techniques in both assessment and treatment". Unfortunately, there are no published controlled studies on SFCT. However, outcome research based on single case studies (e.g. Coon, 1994) supports the SFCT approach for people with personality disorder.

SCHEMA ASSESSMENT
Although the validity of self-rating schemas has been questioned, many clinicians find this a useful first step in the assessment of personality (e.g. Young & Lindemann, 1992). Outside the EMS literature questionnaires have been designed to assess the schema of clinical clients, for example, the Interpersonal Schema Questionnaire (Safran, Hill & Ford, 1988) and Beck’s (1990) Belief Questionnaire. However this study is concerned with the reliability of a self-report measure devised by Young and his colleagues; The Schema Questionnaire (SQ; Young, 1990; 1994).

The Schema Questionnaire
Research devoted to assessment of schemas is scarce and Schmidt et al (1995) provide the only published psychometric evaluation of the Schema Questionnaire (Young, 1990; revised 1991). The SQ was evaluated using five independent samples (total N = 1,564). In the first study, factor analysis was conducted using a student sample (n=1,129 undergraduates) and revealed 13 primary schemas (see Table 2). In addition to their factor analysis they used a population of 85 first year undergraduate psychology students and found the 13 primary subscales to possess adequate test-retest reliability and internal consistency (test-retest coefficients and alpha internal consistency coefficients ranging from .50 to .82 for test-retest and .83 to .96 for alpha).
In their second study they conducted factor analyses using an out-patient sample (n=187, 55% diagnosed as having a DSM-IV personality disorder). This analysis revealed 15 primary schemas (see Table 2). The ‘Fear of Losing Control’ factor which emerged using the student sample was not found to be present in this sample. Three primary schemas emerged (i.e. Subjugation, Entitlement & Social Isolation) using this sample which had not been present in the student sample.

<table>
<thead>
<tr>
<th>Early Maladaptive Schema</th>
<th>Student Population</th>
<th>Clinical Population</th>
</tr>
</thead>
<tbody>
<tr>
<td>Abandonment</td>
<td>1. Abandonment</td>
<td>1. Abandonment</td>
</tr>
<tr>
<td>Emotional Deprivation</td>
<td>2. Emotional Deprivation</td>
<td>2. Emotional Deprivation</td>
</tr>
<tr>
<td>Abuse/Mistrust</td>
<td>3. Mistrust</td>
<td>3. Abuse/Mistrust</td>
</tr>
<tr>
<td>Vulnerability to harm &amp; illness</td>
<td>5. Vulnerability</td>
<td>5. Vulnerability to harm &amp; illness</td>
</tr>
<tr>
<td>Defectiveness</td>
<td>7. Defectiveness</td>
<td>7. Defectiveness</td>
</tr>
<tr>
<td>Social Undesirability</td>
<td>8. Incompetence/inferiority</td>
<td>8. Failure to Achieve</td>
</tr>
<tr>
<td>Failure to Achieve</td>
<td>9. Emotional Inhibition</td>
<td>9. Subjugation</td>
</tr>
<tr>
<td>Subjugation</td>
<td>10. Self-sacrifice</td>
<td>10. Emotional Inhibition</td>
</tr>
<tr>
<td>Negativity/Pessimism</td>
<td>12. Unrelenting Standards</td>
<td>12. Unrelenting Standards</td>
</tr>
<tr>
<td></td>
<td>15. Social Isolation</td>
<td></td>
</tr>
</tbody>
</table>

Table 2. EMS as initially proposed Young (1990) and as found in a student and clinical sample (Schmidt et al, 1995) using the schema questionnaire (Young, 1990).

Schmidt et al hypothesised this was because these factors represent more extreme schemas which infrequently occur in a non-clinical population. Social Undesirability was the only proposed EMS which did not emerge in either of the samples used. The most recent version of the schema questionnaire (Young & Brown, 1994) is designed to assess the presence of the fifteen schema identified by Schmidt et al’s clinical population.
Schmidt et al's third study assessed the convergent and discriminant validity of EMS (as measured by the SQ) with respect to measures of psychological distress, self-esteem, cognitive vulnerability for depression and personality disorder symptoms (as measured by the Personality Diagnostic Questionnaire - Revised; PDQ-R; Hyler & Rieder, 1987). Using 163 undergraduates they found all the measured constructs to be associated with the measured EMS in the predicted directions and that high PDQ-R participants scored significantly higher on each of the SQ subscales¹.

RATIONAL FOR THIS STUDY

Schmidt et al, using a student population found the Schema Questionnaire (Young, 1991) to possess adequate test-re-test reliability and internal consistency. However since Schmidt et al's study, the schema questionnaire has been revised to it's present form: The Schema Questionnaire - Short Form (Young & Brown, 1994). The scale assessed by Schmidt et al contained 205 items and was designed to assess the presence of the 16 schema originally proposed by Young (see Table 2). The Schema Questionnaire - Short Form contains 75 items and is designed to assess the presence of the 15 schema identified by Schmidt et al's clinical sample.

This study aims to assess the test-retest reliability and internal consistency of the 75 item Schema Questionnaire. Unlike, Schmidt et al, the study assesses this reliability using a clinical sample. A clinical sample is chosen because;

1. the student sample used by Schmidt et al did not identify three of the schema contained in the present version of the questionnaire (i.e. Subjugation, Entitlement & Social Isolation). Hence Schmidt et al did not report reliability data for these three schemas.

2. EMS theory was devised specifically for personality disorder. If Young's theory is correct, a non-clinical population is likely to score low on the questionnaire, resulting in any calculation of reliability being subject to possible floor effect. Using a clinical sample will hopefully reduce this possibility.

¹ as identified by Schmidt et al's initial student sample (see Table 2).
3. A clinical population is more likely than a student population to fluctuate in terms of severity of presenting mental health difficulties. However, without treatment EMS are unlikely to change (Bricker et al, 1993). Therefore, if Young's EMS theory is correct, the subscales of the Schema Questionnaire should show high test-retest reliability over a relatively short period of time.
METHOD

Participants
Participants were recruited via South London Primary Care and Community Mental Health Team psychology waiting lists. A total of 45 waiting list clients were contacted, 24 returned the questionnaires (a response rate of 53%). The average age of respondents was 38 years (ranging from 21 to 54 years) and of these 24, 14 (58%) were female. The majority of respondents described their ethnic background as white (83%) and all bar 4 respondents were born in England.

<table>
<thead>
<tr>
<th>Presenting Difficulty</th>
<th>N (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anger</td>
<td>1 (4)</td>
</tr>
<tr>
<td>Anxiety or panic attacks</td>
<td>4 (17)</td>
</tr>
<tr>
<td>Bereavement</td>
<td>3 (13)</td>
</tr>
<tr>
<td>Compulsive difficulties</td>
<td>2 (8)</td>
</tr>
<tr>
<td>Depression</td>
<td>4 (17)</td>
</tr>
<tr>
<td>Depression &amp; Anxiety</td>
<td>4 (17)</td>
</tr>
<tr>
<td>Exhaustion (mental &amp; physical)</td>
<td>1 (4)</td>
</tr>
<tr>
<td>Intra-familial relationship difficulties</td>
<td>2 (8)</td>
</tr>
<tr>
<td>Loss of confidence</td>
<td>2 (8)</td>
</tr>
<tr>
<td>Stress</td>
<td>1 (4)</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>24 (100)</strong></td>
</tr>
</tbody>
</table>

Table 3. Participants presenting difficulties (as described by the participant).

On average, participants described the duration of their difficulties as 3 years 7 months (sd = 3 years 3 months). Half of the participants stated they were seeing their GP for help with their ‘problem’ and 29% (N=7) reported not seeing anybody. No-one reported currently seeing a psychologist and a third (N=8) were prescribed anti-depressant medication. Table 3 displays a summary of the participants’ descriptions of their difficulties.

All 24 participants completed the General Health Questionnaire (GHQ-28; see ‘measures’). All bar three respondents scored above the (case detector) threshold score of 23. Participants generally scored higher on the ‘anxiety & insomnia’ and ‘social
dysfunction' subscales than on the subscales entitled 'somatic symptoms' and 'severe depression'.

Although four respondents (17%) gained a PERI (see 'measures') score above 11, their descriptions of their difficulties were not that of psychosis, for example one respondent stated they had Obsessive Compulsive Disorder. Hence based on the information given, it seems likely that, at the time of this study, none of the participants were suffering from positive psychotic symptoms.

Measures
(1) The Schema Questionnaire - Short Form (Young & Brown, 1994; appendix two). This seventy-five item, self-report questionnaire is designed to assess the presence of fifteen Early Maladaptive Schema (as listed in the third column of Table 2). It contains five items per schema which the respondent rates on a frequency continuum ranging from 'completely untrue of me' (1) to 'describes me perfectly' (6).

(2) A questionnaire covering duration and onset of difficulties, description of difficulties, current and previous treatments and basic demographic details (appendix three).

(3) The General Health Questionnaire -28 (GHQ-28; Goldberg, 1978). This 28 item self-report questionnaire contains four subscales designed to measure the presence of somatic symptoms, anxiety and insomnia, social dysfunction and severe depression. It's validity as a screening tool has been supported by a large number of studies (e.g. Banks, 1993; Goldberg, Gater, Sartorius, Ustun et al, 1997) and its relative shortness results in it being a useful research tool. Using Likert scoring (0, 1, 2, 3), the range of possible scores per subscale is 0-21. In research the GHQ can be used as a potential case detector and a total GHQ score above 23 is considered high (Goldberg et al, 1997).
(4) The Psychiatric Epidemiology Research Interview (PERI) - Psychotic Symptom Scale (Dohrenwend, Shrout, Egri & Mendelsohn, 1980) is a 13-item scale originally designed as a research interview. However, since its design, the PERI has been administered in written form (e.g. Shrout, Lyons, Dohrenwend, Skodol, Solomon & Kass, 1988) and has been used by a number of researchers to identify the presence of positive psychotic symptoms (e.g. Link & Steuve, 1994). Each item is measured on a frequency continuum ranging from very often (4) to never (0). Susser & Struening (1990) used ten of the items and found a score of 12 or greater suggested the presence of positive psychotic symptoms (as measured by a diagnostic interview, the SCID-PD; Spitzer & Williams, 1985).

Procedure
Participants were recruited via out-patient, Clinical Psychology waiting lists. They were sent a letter asking them to participate (appendix four), an information sheet explaining the reason for the research and what their involvement would entail (appendix five), the four questionnaires detailed above and a consent form (appendix six). All participants were sent a self-addressed envelope in which to return the four questionnaires and the consent form. If the potential participants did not reply within ten days, a follow-up letter (appendix seven) was sent. After an interval of four weeks, respondents were asked to complete another copy of the SQ and PERI (appendix eight).
RESULTS

Response Pattern

All 24 respondents completed all 75 items on the Schema Questionnaire. As the questionnaire contains five items per schema, the minimum possible schema score is 5 and the maximum is 30. Table 4 displays the range of responses and the average scores (N=24) per schema.

<table>
<thead>
<tr>
<th>EMS Score range</th>
<th>EMS Score range</th>
</tr>
</thead>
<tbody>
<tr>
<td>EMS Mean (Sd)</td>
<td>EMS Mean (Sd)</td>
</tr>
<tr>
<td>Min.</td>
<td>Max.</td>
</tr>
<tr>
<td>1. Emotional Deprivation</td>
<td>5</td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>5</td>
</tr>
<tr>
<td>3. Mistrust/Abuse</td>
<td>6</td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>5</td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>5</td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>5</td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>5</td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>6</td>
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</tbody>
</table>

Table 4. Response pattern on the Schema Questionnaire.

Internal Consistency

The responses of the 24 participants were analysed to assess the internal consistency of the fifteen schema scales. All of the scales showed adequate (i.e. α>0.7; Kline, 1993) internal consistency as measured by Cronbach’s Alpha ranging from 0.82 to 0.95 (Table 5).

<table>
<thead>
<tr>
<th>EMS</th>
<th>α</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Emotional Deprivation</td>
<td>0.86</td>
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<tr>
<td>2. Abandonment</td>
<td>0.93</td>
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<tr>
<td>3. Mistrust / Abuse</td>
<td>0.85</td>
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<tr>
<td>4. Social Isolation</td>
<td>0.87</td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>0.82</td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>0.95</td>
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<tr>
<td>7. Functional Dependence</td>
<td>0.92</td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>0.83</td>
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</table>

Table 5: Cronbach’s Alpha (α) for the items in the questionnaire designed to assess the presence of each Early Maladaptive Schema.
Divergent construct validity of EMS' as measured by the Schema Questionnaire

The data from the 24 respondents were analysed for inter-schema correlations. Table 6 displays the correlation matrix for the fifteen schema, (p-values greater than 0.53 are significant at the 0.01 level, two tailed).

<table>
<thead>
<tr>
<th>Schema</th>
<th>Emotional Deprivation</th>
<th>Abandonment</th>
<th>Mistrust/Abuse</th>
<th>Social Isolation</th>
<th>Defectiveness/Shame</th>
<th>Failure to Achieve</th>
<th>Functional Dependence</th>
<th>Vulnerability to Harm</th>
<th>Enmeshment</th>
<th>Self-sacrifice</th>
<th>Subjugation</th>
<th>Emotional Inhibition</th>
<th>Unrelenting Standards</th>
<th>Entitlement</th>
<th>Insufficient Self-control</th>
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<td>2.</td>
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<td>.170</td>
<td>.071</td>
<td>.051</td>
<td>.149</td>
<td>.188</td>
<td>.411</td>
<td>.105</td>
<td>.434</td>
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</tbody>
</table>

Table 6. Inter-schema correlation coefficients (p).

Test-retest reliability

Of the 24 participants who returned the first batch of questionnaires, 18 (75% of the sample) returned the retest questionnaire. The average time period between completion of the two questionnaires was 32 days (sd=4).
Due to the data being unevenly distributed (Skewness range: -0.37 to 2.49; Kurtosis range: -1.49 to 6.21), the test-retest data were analysed using Spearman’s Rho ($\rho$). The total scores for all of the fifteen schema significantly correlated (at the .01 level; see Table 7). However, four of the schema (Social Isolation, Functional Dependence, Self-sacrifice & Insufficient Self-control) had correlation coefficients below the suggested minimum value of 0.8 (Kline, 1993).

<table>
<thead>
<tr>
<th>EMS</th>
<th>$\rho$ value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Emotional Deprivation</td>
<td>0.885**</td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>0.916**</td>
</tr>
<tr>
<td>3. Mistrust / Abuse</td>
<td>0.914**</td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>0.718**</td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>0.970**</td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>0.894**</td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>0.765**</td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>0.940**</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>EMS</th>
<th>$\rho$ value</th>
</tr>
</thead>
<tbody>
<tr>
<td>9. Enmeshment</td>
<td>0.865**</td>
</tr>
<tr>
<td>10. Subjugation</td>
<td>0.881**</td>
</tr>
<tr>
<td>11. Self-sacrifice</td>
<td>0.750**</td>
</tr>
<tr>
<td>12. Emotional Inhibition</td>
<td>0.920**</td>
</tr>
<tr>
<td>13. Unrelenting Standards</td>
<td>0.934**</td>
</tr>
<tr>
<td>14. Entitlement</td>
<td>0.834**</td>
</tr>
<tr>
<td>15. Insufficient Self-control</td>
<td>0.654**</td>
</tr>
</tbody>
</table>

**Correlation is significant at the .01 level (2-tailed)

Table 7: The test-retest reliability coefficients for the items in the questionnaire designed to assess the presence of each Early Maladaptive Schema.
DISCUSSION

There are a number of key differences between this study and that of Schmidt et al (1995), namely;

1. Schmidt et al assessed internal consistency and test-retest reliability using a student population. This study’s sample consisted of clinical clients awaiting psychological intervention.

2. Schmidt et al used an earlier version of the questionnaire (Young, 1990; revised 1991) and not the most recent version which was used in this study (i.e. Young & Brown, 1994).

3. Schmidt et al’s student sample did not identify three of the EMS contained within the questionnaire assessed in this study (i.e. Subjugation, Entitlement & Social Isolation). Hence, Schmidt et al did not generate data on the reliability of these three constructs (as measured by the questionnaire).

Despite these differences, there are number of similarities between the findings of the two studies. The present study found all of the subscales on the schema questionnaire showed adequate internal consistency. This finding is consistent with the findings of Schmidt et al (1995) who also found the internal consistency of the subscales of the earlier scale to be adequate.

Like Schmidt et al, this study found all the test-retest values for the EMS subscales to be significant at the .01 level. Additionally, all of the test-retest correlation coefficients for the EMS were higher in this study than those found by Schmidt et al (see appendix nine), including the four EMS (Social Isolation, Functional Dependence, Self-sacrifice & Insufficient Self-control) whose retest correlation coefficients were slightly less than the suggested value of 0.8.

Although many of the EMS subscales inter-correlated significantly with other subscales, only one p-value was above 0.8, i.e. Emotional Inhibition correlated significantly with Vulnerability to Harm. This finding is not consistent with Schmidt et al who found an intercorrelation p-value of 0.47 for these two EMS. Nor is it
consistent with Bricker et al (1993), who place the two EMS within different schema domains. However perhaps it is not surprising that people who feel they are vulnerable to harm try to keep their emotions to themselves. It is possible that such a strategy is their way of coping with their fear that they are destined to come to harm. Exploration with clients who present with both schema may generate anecdotal support for this suggested link between the two EMS.

**Future Research**

The schema questionnaire was designed to help assess the presence of EMS in people with personality disorder. However, although Schmidt et al found high PDQ-R participants scored significantly higher on each of the SQ subscales, there is no published evaluation of the short form of the questionnaire. It has not been established that people with personality disorders score higher on the schema questionnaire than people without personality disorders. In order to evaluate Young’s EMS theory further, it is essential such research is conducted.

Additionally, and as stated earlier, the possible relationship between the ‘Emotional Inhibition’ and ‘Vulnerability to Harm’ EMS needs to be explored and the reliability of the ‘Social Isolation’, ‘Functional Dependence’, ‘Self-sacrifice’ & ‘Insufficient Self-control’ EMS subscales requires further investigation.

**Conclusion**

Due to the relatively small sample size, the findings of this study should be considered preliminary. However the adequate level of internal consistency of all the EMS subscales is promising, as are the test re-test reliability coefficients. This study lends support to Young’s theory that EMS are stable and enduring structures and provides evidence which positively attests to the reliability of this version of the Schema Questionnaire.
REFERENCES


<table>
<thead>
<tr>
<th>Appendix</th>
<th>-</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appendix One</td>
<td>-</td>
<td>Personality disorder diagnostic criteria (APA, 1994)</td>
</tr>
<tr>
<td>Appendix Two</td>
<td>-</td>
<td>Schema Questionnaire (Young &amp; Brown, 1994)</td>
</tr>
<tr>
<td>Appendix Three</td>
<td>-</td>
<td>Demographic details questionnaire</td>
</tr>
<tr>
<td>Appendix Four</td>
<td>-</td>
<td>Recruitment letter</td>
</tr>
<tr>
<td>Appendix Five</td>
<td>-</td>
<td>Client information sheet</td>
</tr>
<tr>
<td>Appendix Six</td>
<td>-</td>
<td>Consent form</td>
</tr>
<tr>
<td>Appendix Seven</td>
<td>-</td>
<td>Follow-up letter</td>
</tr>
<tr>
<td>Appendix Eight</td>
<td>-</td>
<td>Retest recruitment letter</td>
</tr>
<tr>
<td>Appendix Nine</td>
<td>-</td>
<td>Test-retest reliability coefficients</td>
</tr>
</tbody>
</table>
APPENDIX ONE

General diagnostic criteria for a Personality Disorder (DSM-IV; APA, 1994)

A. An enduring pattern of inner experience and behaviour that deviates markedly from the expectations of the individual's culture. This pattern is manifested in two (or more) of the following areas:
   (1) cognition (i.e. ways of perceiving and interpreting self, other people and events)
   (2) affectivity (i.e. the range, intensity, lability, and appropriateness of emotional response)
   (3) interpersonal functioning
   (4) impulse control

B. The enduring pattern is inflexible and pervasive across a broad range of personal and social situations.

C. The enduring pattern leads to clinically significant distress or impairment in social, occupational or other important areas of functioning.

D. The pattern is stable and of long duration and its onset can be traced back at least to adolescence or early adulthood.

E. The enduring pattern is not better accounted for as a manifestation or consequence of another mental disorder.

F. The enduring pattern is not due to the direct physiological effects of a substance (e.g. a drug of abuse, a medication) or a general medical condition (e.g. head trauma).

Summary of DSM-IV Personality Disorders

<table>
<thead>
<tr>
<th>Cluster</th>
<th>Personality Disorder</th>
<th>Main traits</th>
</tr>
</thead>
<tbody>
<tr>
<td>Odd-Eccentric</td>
<td>Paranoid</td>
<td>pattern of distrust and suspiciousness such that others' motives are interpreted as malevolent</td>
</tr>
<tr>
<td></td>
<td>Schizoid</td>
<td>pattern of detachment from social relationships and restricted range of emotional expression</td>
</tr>
<tr>
<td></td>
<td>Schizotypal</td>
<td>pattern of acute discomfort in close relationships, cognitive or perceptual distortions and eccentricities of behaviour</td>
</tr>
<tr>
<td>Dramatic-Erratic</td>
<td>Antisocial</td>
<td>pattern of disregard for, and violation of, the rights of others</td>
</tr>
<tr>
<td></td>
<td>Borderline</td>
<td>pattern of instability in interpersonal relationships, self-image and affects and marked impulsivity</td>
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<tr>
<td></td>
<td>Histrionic</td>
<td>pattern of excessive emotionality and attention seeking</td>
</tr>
<tr>
<td></td>
<td>Narcissistic</td>
<td>pattern of grandiosity, need for admiration and lack of empathy</td>
</tr>
<tr>
<td>Anxious-Fearful</td>
<td>Avoidant</td>
<td>pattern of social inhibition, feelings of inadequacy and hypersensitivity to negative evaluation</td>
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<tr>
<td></td>
<td>Dependent</td>
<td>pattern of submissive and clinging behaviour related to an excessive need to be taken care of</td>
</tr>
<tr>
<td></td>
<td>Obsessive-Compulsive</td>
<td>pattern of preoccupation with orderliness, perfectionism and control</td>
</tr>
<tr>
<td>Other</td>
<td>Not Otherwise Specified</td>
<td>(i) pattern meets the general criteria for a personality disorder (PD) and traits of several PD are present, but the criteria for any specific PD are not met</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(ii) pattern meets the general criteria for a PD, but the individual is considered to have a PD that is not included in the classification (e.g. passive-aggressive PD)</td>
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</table>
APPENDIX TWO

Schema Questionnaire

INSTRUCTIONS: Listed in this booklet are statements that a person might use to describe himself or herself. Please read each statement and decide how well it describes you. When you are sure, base your answer on what you emotionally feel, not on what you think to be true. Choose the highest rating from 1 to 6 that describes you and write the number in the space before the statement.

RATING SCALE:

1 = Completely untrue of me
2 = Mostly untrue of me
3 = Slightly more true than untrue
4 = Moderately true of me
5 = Mostly true of me
6 = Describes me perfectly

Date

1. Most of the time, I haven’t had someone to nurture me, share him/herself with me, or care deeply about everything that happens to me.
2. In general, people have not been there to give me warmth, holding and affection.
3. For much of my life, I haven’t felt that I am special to someone.
4. For the most part, I have not had someone who really listens to me, understands me, or is tuned into my needs and feelings.
5. I have rarely had a strong person to give me sound advice or direction when I’m not sure what to do.
6. I find myself clinging to people I’m close to because I’m afraid they’ll leave me.
7. I need other people so much that I worry about losing them.
8. I worry that people I feel close to will leave me or abandon me.
9. When I feel someone I care for pulling away from me, I get desperate.
10. Sometimes I am so worried about people leaving me that I drive them away.
11. I feel that people will take advantage of me.
12. I feel that I cannot let my guard down in the presence of other people, or else they will intentionally hurt me.
13. It is only a matter of time before someone betrays me.
14. I am quite suspicious of other people’s motives.
15. I’m usually on the lookout for people’s ulterior motives.
16. I don’t fit in.

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17. I'm fundamentally different from other people.
18. I don't belong; I'm a loner.
19. I feel alienated from other people.
20. I always feel on the outside of groups.
21. No man/woman I desire could love me once he/she saw my defects.
22. No one I desire would want to stay close to me if he/she knew the real me.
23. I'm unworthy of the love, attention, and respect of others.
24. I feel that I am not loveable.
25. I am too unacceptable in very basic ways to reveal myself to other people.
26. Almost nothing I do at work (or school) is as good as other people can do.
27. I'm incompetent when it comes to achievement.
28. Most other people are more capable than I am in areas of work and achievement.
29. I'm not as talented as most people at their work.
30. I'm not as intelligent as most people when it comes to work (or school).
31. I do not feel capable of getting by on my own in everyday life.
32. I think of myself as a dependent person, when it comes to everyday functioning.
33. I lack common sense.
34. My judgement cannot be relied upon in everyday situations.
35. I don't feel confident about my ability to solve everyday problems that come up.
36. I can't seem to escape the feeling that something bad is about to happen.
37. I feel that a disaster (natural, criminal, financial or medical) could strike at any moment.
38. I worry about being attacked.
39. I worry that I'll lose all my money and become destitute.
40. I worry that I am developing a serious illness, even though nothing serious has been diagnosed by a physician.
41. I have not been able to separate myself from my parents(s), the way other people my age seem to.
42. My parent(s) and I tend to be overinvolved in each others lives and problems.
43. It is very difficult for my parent(s) and me to keep intimate details from each other, without feeling betrayed or guilty.
44. I often feel as if my parent(s) are living through me - I don't have a life of my own.
45. I often feel that I do not have a separate identity from my parents or partner.
46. I think if I do what I want, I'm only asking for trouble.
RATING SCALE:

1 = Completely untrue of me  
2 = Mostly untrue of me  
3 = Slightly more true than untrue  
4 = Moderately true of me  
5 = Mostly true of me  
6 = Describes me perfectly

47. I feel that I have no choice but to give in to other people’s wishes, or else they will retaliate or reject me in some way.

48. In relationships, I let the other person have the upper hand.

49. I’ve always let others make choices for me, so I really don’t know what I want for myself.

50. I have a lot of trouble demanding that my rights be respected and that my feelings be taken into account.

51. I’m the one who usually ends up taking care of others more than of myself.

52. I am a good person because I think of others more than myself.

53. I’m so busy doing for the people that I care about that I have little time for myself.

54. I’ve always been the one who listens to everyone else’s problems.

55. Other people see me as doing too much for others and not enough for myself.

56. I am too self-conscious to show positive feelings to others (e.g. affection, showing I care).

57. I find it embarrassing to express my feelings to others.

58. I find it hard to be warm and spontaneous.

59. I control myself so much that people think I’m unemotional.

60. People see me as uptight emotionally.

61. I must be the best at most of what I do; I can’t accept second best.

62. I try to do my best; I can’t settle for “good enough”.

63. I must meet all my responsibilities.

64. I feel there is constant pressure for me to achieve and get things done.

65. I can’t let myself off the hook easily or make excuses for my mistakes.

66. I have a lot of trouble accepting “no” for an answer when I want something from other people.

67. I’m special and shouldn’t have to accept many of the restrictions placed on other people.

68. I hate to be constrained or kept from doing what I want.

69. I feel that I shouldn’t have to follow the normal rules and conventions other people do.

70. I feel that what I have to offer is of greater value than the contributions of others.

71. I can’t seem to discipline myself to complete routine or boring tasks.

72. If I can’t reach a goal, I become easily frustrated and give up.

73. I have a very difficult time sacrificing immediate gratification to achieve a long-range goal.

74. I can’t force myself to do things I don’t enjoy, even when I know it’s for my own good.

75. I have rarely been able to stick to my resolutions.

PLEASE ENSURE YOU HAVE ANSWERED EVERY QUESTION.

Thank you
APPENDIX THREE

Investigation into the reliability of a personality questionnaire.

Please answer all of the following questions.

Date of Birth: ............................  Age: ............................

Gender
Please tick as appropriate
Male........................................
Female...................................

Country of Birth
Please tick as appropriate
England............................
Scotland............................
Wales..............................
Northern Ireland................
Irish Republic....................
Elsewhere..........................
If elsewhere, please write in the present names of the country.

Ethnic Group
Please tick as appropriate
White....................................
Black-Caribbean...................
Black - African.....................
Black - other......................
Please describe....................
Indian...............................
Pakistani............................
Bangladeshi.......................
Chinese.............................
Any other ethnic group.........
Please describe....................

Please briefly describe the difficulties you are currently experiencing.
How long have you been experiencing these difficulties?


Please list all the people you are seeing because of these difficulties (e.g. counsellor, nurse etc.) and list any treatment you are currently receiving (e.g. psychological therapy, medication etc.)?


Have you seen anybody in the past to help you with these difficulties? Have you ever received any treatment (e.g. psychological therapy, medication etc.)?


---------- * ----------
Dear

I am writing to request your participation in a questionnaire based research project which is currently running within the NHS Trust. Your participation in the study would be of great help in allowing us to assess the reliability of a clinical questionnaire. I must stress that this research is not related to your assessment or future care in anyway and your choice to participate is totally voluntary.

What am I asking you to do?

- Enclosed is an information sheet explaining the purpose of the research and details of what participating in the study entails. Please read this information.
- Complete the consent form and the enclosed questionnaires.
- Return the questionnaires together with the consent form in the provided envelope. A speedy response would be gratefully received.
- In approximately four weeks time I will forward another copy of the ‘Schema Questionnaire’ and ‘PERI’ for you to complete and return.

Confidentiality

- The questionnaires are for research purposes only.
- Once the study is complete, all questionnaires will be destroyed.

Your participation in this study will be gratefully received and I thank you in advance for your help. If you have any queries or concerns please do not hesitate to contact me.

Yours sincerely

Louise Minchin
Psychologist in Clinical Training
APPENDIX FIVE

Investigation into the reliability of a personality questionnaire

CLIENT INFORMATION SHEET
Thank you for taking the time to read this information sheet. I am writing to request your participation in a study into the reliability of a clinical questionnaire which has been developed in the USA.

What Is This Study About?
This study is interested in assessing the reliability of a questionnaire designed to assess factors which may be significant in the development of people's personality. It is a questionnaire which was developed in the United States of America in the early 1990's and to date, little information has been collected in Great Britain. Once the study has been completed, we will be able to identify whether the questionnaire is a reliable measure and therefore of use in the assessment and treatment of future clients.

What Will Happen During The Study
Enclosed are four questionnaires which, if you agree to participate in the study, need to be completed and returned in the provided stamped addressed envelope.
Four weeks following your return of the questionnaires, the questionnaires entitled 'Schema Questionnaire' and 'PERI' will be sent again. These need to be completed and returned (a stamped addressed envelope will be provided).
In total, the questionnaires will take approximately forty minutes to complete.

What Will Happen To Your Questionnaires?
The questionnaires you complete will be for research purposes only. They will not be part of your assessment by the Clinical Psychologist and no one apart from the researcher will have access to the information you provide.
HENCE, THE INFORMATION YOU PROVIDE WILL NOT AFFECT HOW QUICKLY YOU ARE OFFERED AN APPOINTMENT NOR WILL IT AFFECT THE SERVICE OFFERED TO YOU.

How Long Will The Study Last
This study is due for completion by the end of November 1998. At this point a letter will be sent to all participants summarising the research results. This and the final write-up of the study will contain no information regarding your identity.

Refusal To Participate/Withdrawal From The Study
Participation in this study is completely voluntary. You may withdraw from the study at any time. Not participating or withdrawing from the study will not affect your future care in any way.

Your participation in this study will be gratefully received and I thank you in advance for your help

If you have any queries or concerns please do not hesitate to contact me:
Louise Minchin, Psychologist in clinical training

The Local Research Ethics Committee has approved the above statement
Date: 30.6.98   Ref:
APPENDIX SIX

CONSENT FORM

Investigation into the reliability of a personality questionnaire

I, ______________________ have read and understood the client information sheet which describes this research and I have been given a copy of this to keep. The nature, purpose and possible consequences of taking part in this research project has been explained to me and my queries have been satisfactorily answered. I have had enough time to consider and decide whether I wish to take part.

I understand that I am entering this project of my own free will, that I may withdraw from this study at any time without necessarily giving any reasons, and that the future management of my care will not be affected.

Signed:........................................................................................................................

Date:........................................................................
Dear

Investigation into the reliability of a personality questionnaire.

As you may remember, I wrote to you approximately two weeks ago to request your participation in a questionnaire based research project which is currently running within the NHS Trust. I am writing as I have not yet received your completed questionnaires.

If you have decided to help with this study I would be very grateful if you could return the questionnaires. Once the study has been completed, we will be able to identify whether the questionnaire is a reliable measure and therefore of use in the assessment and treatment of future clients. Your participation in the study is of great help in allowing us to assess this reliability.

This research is not related to your assessment or future care in anyway.

I thank you in advance for your help and if you have already returned the questionnaires I thank you for your speedy response.

Yours sincerely

Louise Minchin
Psychologist in Clinical Training
Dear

Thank you very much for helping with this research. Your participation in the study is of great help in allowing us identify whether the enclosed questionnaire is a reliable measure and therefore of use in the assessment and treatment of future clients.

**Please complete the enclosed questionnaires and return them in the provided envelope.** As stated previously, the questionnaires are for research purposes only and once the study is complete, all questionnaires will be destroyed.

Your participation in this study is gratefully received and I thank you in advance for your help. If you have any queries or concerns please do not hesitate to contact me.

Yours sincerely

Louise Minchin
Psychologist in Clinical Training
### APPENDIX NINE

**Test-retest reliability coefficients of the subscales on the schema questionnaire**

<table>
<thead>
<tr>
<th>EMS</th>
<th>This Study* ρ value</th>
<th>Schmidt et al’s Study** r value</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Emotional Deprivation</td>
<td>0.885</td>
<td>0.82</td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>0.916</td>
<td>0.67</td>
</tr>
<tr>
<td>3. Mistrust / Abuse</td>
<td>0.914</td>
<td>0.78</td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>0.718</td>
<td>(not assessed)</td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>0.970</td>
<td>0.73</td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>0.894</td>
<td>0.74</td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>0.765</td>
<td>0.50</td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>0.940</td>
<td>0.57</td>
</tr>
<tr>
<td>9. Enmeshment</td>
<td>0.865</td>
<td>0.57</td>
</tr>
<tr>
<td>10. Subjugation</td>
<td>0.881</td>
<td>(not assessed)</td>
</tr>
<tr>
<td>11. Self-sacrifice</td>
<td>0.750</td>
<td>0.74</td>
</tr>
<tr>
<td>12. Emotional Inhibition</td>
<td>0.920</td>
<td>0.74</td>
</tr>
<tr>
<td>13. Unrelenting Standards</td>
<td>0.934</td>
<td>0.68</td>
</tr>
<tr>
<td>14. Entitlement</td>
<td>0.834</td>
<td>(not assessed)</td>
</tr>
<tr>
<td>15. Insufficient Self-control</td>
<td>0.654</td>
<td>0.66</td>
</tr>
</tbody>
</table>

*used the 75-item questionnaire (Young & Brown, 1994)

**used the 205 item questionnaire (Young, 1990)
Final Year Thesis

The Early Maladaptive Schema model of personality disorder
An assessment of Young & Brown’s Schema Questionnaire (short form)

Third Year PSYCHD

Supervised by: Estelle Moore (Principal Clinical Psychologist)
Jonathan Founds (Senior Lecturer in Clinical Psychology)
Sean Hammond (Reader in Psychology)
ABSTRACT

Aims: To assess the psychometric properties of Young & Brown’s (1994) Schema Questionnaire and assess Young’s assertion that people with personality disorder have Early Maladaptive Schema (EMS).

Method: Participants comprised three groups. Two groups were recruited from a clinical sample detained in a maximum security hospital. Thirty participants met the criteria for personality disorder (the PD group) and thirty-one met the criteria for mental illness (the MI group). The average age of this inpatient sample was 39 years 1 month and 54 (89%) were male. The third group (N=24) was recruited from a clinical psychology waiting list (Minchin, 1999). The average age of this sample was 38 years 8 months and 10 (42%) were male. All three groups completed the Schema Questionnaire and the GHQ-28. The inpatient sample also completed the MCMI-III.

Results: All 15 EMS scales showed adequate internal consistency (α range: 0.74-0.94) and eight of the fifteen scales were found to be reasonably discrete. A Discriminant Function Analysis revealed one function which reliably discriminated the three groups. A correlational analysis provided support for there being a link between clusters of EMS and personality styles.

Conclusion: This study found Young’s schema questionnaire to have questionable validity as a reliable, independent research tool. However this does not mean the questionnaire lacks clinical utility. The schema based model of personality disorder provides a rational and basis for clinical intervention.
1. INTRODUCTION

1.1 THE COGNITIVE SCHEMA CONCEPT

The cognitive schema concept is derived from established cognitive psychology literature (Stein & Young, 1992). It comprises two parts: the cognitive structures (entitled 'schema') and information processing theory (Fiske & Linville, 1980). Cognitive schema are theorised to be stable and enduring cognitive structures which form the core of the individual's self concept (Beck, 1967; Segal, 1988; Young, 1990). They are the fundamental, enduring beliefs which cognitive therapists hypothesise play a central role in the maintenance of long-term psychiatric problems (Padesky, 1994). Segal (1988) defines schema as "organised elements of past reactions and experience that form a relatively cohesive and persistent body of knowledge capable of guiding subsequent perception and appraisals" (p147).

According to information processing theory, schema develop as part of normal cognitive development (Pretzer & Beck, 1996). Early in their development, children strive to make sense of their world. In order to organise the massive amount of data they are receiving, they develop cognitive structures, entitled schema. Such schema enable them to process new information in a way that facilitates their understanding of what they are experiencing (Beck, 1996). All new information is channelled and organised through these cognitive structures which means schema play an essential role in determining what information and stimuli are attended to and what is remembered of experiences. In summary, schema are storage units for rudimentary cognitive and emotional material which allow for rapid and efficient information processing.

1.1.1 Schema

The term 'schema' has been widely used within clinically orientated theory. In addition to cognitive (Beck, 1967) and schema-focused (Young, 1990) approaches, the term has been presented within the context of a variety of theoretical orientations. For example, psychodynamic (Kernberg, 1982), client-centred (Rice, 1984) and interpersonal psychotherapy (Chrzanowski, 1982) approaches have utilised the schema
term. The literature is thwarted by a lack of clear definitions and the use of alternative terms for similar concepts, for example Kelly (1955) used the term ‘personal constructs’, Bandura (1978) used the term ‘self-systems’ and Abelson (1981) used the term ‘scripts’. This thesis is concerned with the theoretical and clinical concept of cognitive schema.

1.2 COGNITIVE SCHEMA AND PSYCHOPATHOLOGY
Cognitive therapists view schema as the basic rules the individual uses to adapt to life’s challenges and to organise perceptions of the world, the self and the future (Layden, Newman, Freeman & Morse, 1993). Through information processing, schema facilitate the way the individual structures their experience, and this determines the way they respond to different situations. According to this cognitive model, inaccurate attributions (caused by maladaptive schema) will result in maladaptive and dysfunctional responses. Hence presenting psychopathology is largely a response to the way the individual is construing and interpreting their inner and outer world.

Since Beck (1967) used this model to explain the cause and maintenance of depression, the cognitive approach has been applied to a wide range of presenting mental health problems (e.g. Hawton, Salkovskis, Kirk & Clark, 1989). In more recent years, the cognitive model has been applied to working with and understanding clients diagnosed as suffering from personality disorders (e.g. Beck, Freeman & associates, 1990; Young, 1990).

1.3 COGNITIVE SCHEMA AND PERSONALITY DISORDERS
The cognitive view of ‘personality disorder’ is that this is the term used to refer to individuals with ‘pervasive, self-perpetrating cognitive-interpersonal cycles’ that are dysfunctional enough to come to the attention of mental health services (Pretzer & Beck, 1996; p55). Consistent with schema theory, people who carry a personality disorder diagnosis have also formed schema which enable them to make sense of their experiences and thus respond in an adaptive way. However, although the schema were probably adaptive in the childhood environment, in later life, when their environment
has changed, the schema become dysfunctional. Once established, schema result in the individual selectively attending to experiences that are consistent with their preconceptions, and result in a tendency to interpret their experiences in a way that confirms these preconceptions. Contradictory experiences are overlooked, discounted, or misinterpreted whilst, at the same time, interpretation of events and interpersonal behaviour result in experiences which seem to confirm underlying beliefs and schema (Pretzer & Beck, 1996). The schema, which at one time resulted in adaptive responses to a damaging environment, now result in maladaptive, psychopathological responses.

There are a number of characteristics which differentiate individuals with a personality disorder from individuals with other mental health diagnoses (Young & Lindemann, 1992). Firstly, they present with enduring, inflexible traits and are frequently characterised by a rigid, constricted and extreme pattern of interpersonal and cognitive behaviour (e.g. Kiesler, 1986). Secondly, patients with a personality disorder diagnosis often actively avoid (or have limited access to) their painful memories, associations and feelings. As short term cognitive therapy assumes patients have relatively free access to their thoughts and feelings, chronic avoidance is one of the hypothesised reasons why short term cognitive therapy is proving less effective with these individuals (Young, 1994; Young & Lindemann, 1992). Their suitability for short-term cognitive therapy is further confounded by the fact that their presenting problem is frequently ill-defined (vague) but pervasive, and their interpersonal difficulties make forming a ‘collaborative relationship’ within a few sessions nearly impossible (McGinn, Young & Sanderson, 1995; Young, 1994). There is increasing evidence that standard, short-term cognitive behaviour therapy (CBT) frequently proves ineffective or counterproductive for individuals with personality disorder diagnoses (Pretzer & Fleming, 1989) and the need to modify the standard CBT approach with this population is well recognised (e.g. Pretzer & Beck, 1996; Young, 1994; Lockwood, 1992).

1.4 PERSONALITY DISORDER DIAGNOSIS

Individuals are considered to have a personality disorder when their construal and interpersonal behaviour are particularly rigid and restricted, and when their
characteristic style of interpretation and interacting cultivates vicious cycles which both perpetrate and intensify their difficulties (Safran & McMain, 1992). The multi-axial classification system of the American Psychiatric Association (DSM-IV; APA, 1994) divides the disorders into three main clusters. Table 1 displays a summary of the main traits of the DSM-IV diagnoses.

<table>
<thead>
<tr>
<th>Cluster</th>
<th>Personality Disorder</th>
<th>Main traits</th>
</tr>
</thead>
<tbody>
<tr>
<td>Odd-Eccentric (A)</td>
<td>Paranoid</td>
<td>pattern of distrust and suspiciousness such that others’ motives are interpreted as malevolent</td>
</tr>
<tr>
<td></td>
<td>Schizoid</td>
<td>pattern of detachment from social relationships and restricted range of emotional expression</td>
</tr>
<tr>
<td></td>
<td>Schizotypal</td>
<td>pattern of acute discomfort in close relationships, cognitive or perceptual distortions and eccentricities of behaviour</td>
</tr>
<tr>
<td>Dramatic-Erratic (B)</td>
<td>Antisocial</td>
<td>pattern of disregard for, and violation of, the rights of others</td>
</tr>
<tr>
<td></td>
<td>Borderline</td>
<td>pattern of instability in interpersonal relationships, self-image and affects and marked impulsivity</td>
</tr>
<tr>
<td></td>
<td>Histrionic</td>
<td>pattern of excessive emotionality and attention seeking</td>
</tr>
<tr>
<td></td>
<td>Narcissistic</td>
<td>pattern of grandiosity, need for admiration and lack of empathy</td>
</tr>
<tr>
<td>Anxious-Fearful (C)</td>
<td>Avoidant</td>
<td>pattern of social inhibition, feelings of inadequacy and hypersensitivity to negative evaluation</td>
</tr>
<tr>
<td></td>
<td>Dependent</td>
<td>pattern of submissive and clinging behaviour related to an excessive need to be taken care of.</td>
</tr>
<tr>
<td></td>
<td>Obsessive-Compulsive</td>
<td>pattern of preoccupation with orderliness, perfectionism and control</td>
</tr>
<tr>
<td>Other</td>
<td>Not Otherwise Specified</td>
<td>(i) pattern meets the general criteria for a personality disorder (PD) and traits of several PD are present, but the criteria for any specific PD are not met</td>
</tr>
<tr>
<td></td>
<td></td>
<td>(ii) pattern meets the general criteria for a PD, but the individual is considered to have a PD that is not included in the classification (e.g. passive-aggressive PD)</td>
</tr>
</tbody>
</table>

Table 1. Summary of DSM-IV personality disorders (APA, 1994).

In order for an individual to receive a DSM personality disorder diagnosis, they must present as having ‘an enduring pattern of inner experience and behavior that deviates markedly from the expectations of the individual’s culture’, that is ‘pervasive and inflexible’, ‘stable over time’, and ‘leads to distress or impairment’ (APA, 1994; p629).

The DSM criteria are largely developed from descriptive, clinical impressions rather than empirically based research (Jackson & Livesley, 1995; Millon & Davis, 1995). The origins of the categories vary (Tyrer, Casey & Ferguson, 1993). For example
Antisocial personality disorder was derived from longitudinal studies of children into later adult life (e.g. Robins, 1966), and the Borderline and Narcissistic personality disorders were principally derived from dynamic theory and psychotherapy (e.g. Kernberg, 1975).

Empirical evaluation of the diagnostic categories has generated limited support for their validity. The criteria are vague and global, and require much inference on the part of the diagnostician (Young & Gluhoski, 1996). This may, in part, explain the high level of heterogeneity which is found within diagnostic groups. Another explanation is that the criteria are overly inclusive. For example, in the DSM-IV, nine criteria are listed for the Borderline personality disorder (BPD), five of which are required for diagnosis. Hence two individuals might receive a diagnosis of BPD but only have one feature in common. The degree of comorbidity of personality diagnoses is also presented as evidence against the validity of the DSM criteria. BPD is particularly noted for its comorbidity with affective disorders such as anxiety (e.g. Berelowitz & Tarnopolsky, 1993). However, of more significance in terms of the validity of the personality disorder diagnoses is the considerable overlap between the personality disorders (Derksen, 1995). Zimmerman & Coryell (1990) for example, report that in their community sample paranoid, avoidant and borderline personality disorders were almost always comorbid and in forensic populations, patients diagnosed with personality disorder typically meet criteria for more than one personality disorder diagnosis (Coid, 1992). In summary, the comorbidity of personality disorder diagnoses and the degree of heterogeneity within diagnostic groups strongly questions the validity of the diagnostic approach (Roth & Fonagy, 1996; Tyrer, 1992).

In addition to these concerns, Westen & Shedler (1999) highlight the dichotomisation of the criteria. The criteria are designed to assess the presence or absence of features which may be more accurately described along a continuum. Westen & Shedler also highlight the failure of the system to consider personality strengths which may contraindicate a personality disorder diagnosis. Many researchers (e.g. Parker, 1998; Jackson & Livesley, 1995) are recognising the need for an empirical overhaul of the current
classification system and a systematic, research-based approach to understanding and classifying personality disorders.

1.5 CLINICAL INTERVENTION FOR PERSONALITY DISORDERS
Since Beck and his colleagues introduced the cognitive model of treatment (Beck, 1967; Beck, Rush, Shaw & Emery, 1979), the therapeutic techniques and model have been expanded and supplemented for use with personality disorders (e.g. Davidson & Tyrer, 1996; Arntz, 1994; Alden, 1992; Safran & McMain, 1992; Beck et al, 1990; Young, 1990).

1.5.1. Cognitive Interventions Based On Beck’s Work
Beck et al (1990) suggest that each personality disorder is characterised by specific irrational beliefs (schema) that are far more pronounced than the beliefs of non-personality disordered clients. These dysfunctional beliefs (maladaptive schema) influence interpretation and recall of events and the coping strategies employed to handle those events. These strategies tend to be used inflexibly or overused in order to compensate for a negative self-view (Beck, 1993). If these compensatory strategies fail then schema are activated and this often leads to psychological distress like depression and psychosomatic disorders like insomnia (Beck, 1993; Young, 1990). Using adaptations recommended by Beck et al (1990), Nelson-Gray, Johnson, Foyle et al (1996) examined the effectiveness of cognitive therapy for depressed persons with different personality disorders. In a series of nine case studies, in which treatment lasted 12 weeks, cognitive therapy was found to be more effective for alleviating symptoms of depression than of the primary personality disorder. However, at three month follow up, five participants did not qualify for their targeted personality disorder (as assessed by structured clinical interview).

1.5.2 Schema Focused Therapy: Young’s Work
The alternative schema theory for personality disorders, and the focus of this thesis, is that of Early Maladaptive Schema (EMS; Young, 1990). Young proposes that core schema are developed in early childhood as a result of ongoing noxious experiences,
such as severe deprivation, rejection, abuse, instability, criticism or abandonment (Bricker, Young & Flanagan, 1993). These experiences are strongly linked with the child’s experiences of significant others, primarily their parents (Young, Beck & Weinberger, 1993). It is the child’s efforts to make sense of their experiences and to avoid further pain that become elaborated over time into deeply entrenched patterns of distorted thinking and dysfunctional behaviour (Bricker et al, 1993). The resulting schema interfere with the individual’s ability to satisfy his or her basic needs for stability and connection, autonomy, desirability and self-expression and to accept reasonable limits and boundaries in relationships with others (Bricker, et al, 1993). If left untreated, the maladaptive schema and the associated dysfunctional patterns of behaviour, continue throughout life (Young & Lindemann, 1992). McGinn et al (1995) define EMS as ‘extremely rigid, pervasive patterns of thinking, affect and behaviour in relation to oneself and one’s relationship with others that develop during early childhood as a result of on-going noxious experiences, such as severe deprivation, rejection, abuse, instability, criticism or abandonment and that are significantly dysfunctional’.

Schema fight for survival and retain their position of power by permeating every sphere of functioning: behavioural, cognitive, emotional and interpersonal (Bricker et al, 1993; Young & Lindemann, 1992). Young (1990; 1994) identifies three processes through which schema survive; Maintenance, Avoidance and Compensation. These three processes serve to reinforce the schema and to prevent the high levels of negative affect which are experienced when maladaptive schema are activated. To some extent, the processes overlap with the psychoanalytic concepts of resistance and defence mechanisms (Bricker et al, 1993). Schema Maintenance refers to the routine processes which keep the schema in tact; the cognitive distortions and self-defeating behaviour patterns that directly serve to perpetuate a schema. Schema maintenance is hypothesised to account for the characteristic rigidity response in some of the personality disorders (Young & Lindemann, 1992). Schema Avoidance refers to the cognitive, behavioural and emotional strategies employed by the individuals which serve to avoid triggering a schema and the related intense affect. Schema
Compensation is another strategy which serves to avoid triggering an EMS. When using schema compensation the individual behaves in a manner which appears to be the opposite of what the schema suggests in order to avoid triggering the schema.

Bricker et al (1993) identify fifteen schema which they cluster within five domains entitled ‘Instability and Disconnection’, ‘Impaired Autonomy’, ‘Undesirability’, ‘Restricted Self-Expression’ and ‘Impaired Limits’. However the number and names of the domains and their schema differ depending on the date of publication (e.g. Young, 1990; Bricker et al, 1993; Young, 1994; Schmidt, Joiner, Young & Telch, 1995). Table 2 summarises the 18 schema and five schema domains currently being applied by Young. In terms of the relationship between Young’s model and DSM categories, some of the diagnoses described in DSM-IV are hypothesised to be underpinned by particular schema, whilst others might be better understood in terms of schema processes. Young & Gluhoski (1996; p310) provide the following examples: (i) Dependent personality disorder reflects schema maintenance in the impaired autonomy and performance domain; (ii) Avoidant personality disorder represents schema avoidance in the disconnection and rejection domain; and (iii) Narcissistic personality disorder is linked to the Entitlement schema, usually as compensation for defectiveness or emotional deprivation. Narcissism thus operates in two domains: disconnection and rejection, and impaired limits.

Young & Lindemann (1992) identify five qualitative differences between clinical issues at the schema level and those related to automatic thoughts (AT’s) and underlying assumptions: (i) ‘schema are more pervasive than AT’s and underlying assumptions’. Schema ‘concern basic life themes of autonomy, intimacy, social adjustment, standards and limits’; (ii) EMS are grouped in accordance with the developmental issues they have in common (e.g. impaired autonomy) and require differential therapeutic strategies; (iii) as core human ‘needs’ are involved, higher levels of affect are evoked when working with schema; (iv) the pain associated with EMS result in patients resorting to schema avoidance and schema compensation in order to protect themselves. Thus, distinctive therapeutic strategies are required to address and
<table>
<thead>
<tr>
<th>Schema Domain</th>
<th>Domain Characteristics</th>
<th>Domain Origins</th>
<th>Early Maladaptive Schema</th>
</tr>
</thead>
</table>
| Disconnection & Rejection | Expectation that the need for security, safety, stability, nurturance, empathy, sharing of feelings, acceptance, respect and belonging in intimate or family relationships will not be met in a consistent or predictable way. | Early experiences of detached, unpredictable, explosive, rejecting, punitive, unforgiving, withholding, inhibited or abusive family environment. | • Emotional Deprivation  
• Abandonment/Instability  
• Mistrust/Abuse  
• Social Isolation / Alienation  
• Defectiveness/Shame |
| Impaired Autonomy & Performance | Expectations about self and environment that interfere with perceived ability to separate, survive, function independently, recognise and express needs or perform successfully. | Family of origin is usually highly enmeshed with parents being overprotective, controlling and frequently undermining the child’s confidence. | • Failure  
• Dependence /Incompetence  
• Vulnerability to danger  
• Enmeshment/Undeveloped Self |
| Other-Directedness     | Excessive emphasis the desires, feelings and responses of others at the expense of own needs in order to gain love and approval. | Early environment where parents’ emotional needs and desires are valued more than the child’s. | • Subjugation  
• Self-Sacrifice  
• Approval-Seeking/ Recognition-Seeking |
| Overvigilance & Inhibition | Excessive focus on controlling spontaneous feelings, impulses and choices in order to meet own performance expectations. | In the family of origin, performance standards, self-control, pain and sacrifice take precedence over pleasure, expressiveness and playfulness. | • Unrelenting Standards / Hypercriticalness  
• Negativity/Pessimism  
• Emotional Inhibition  
• Punitiveness |
| Impaired Limits        | Inadequate internal limits resulting in difficulties respecting the rights of others, making commitments or meeting personal goals. | High incidence of permissiveness and indulgence in family of origin. | • Entitlement/Grandiosity  
• Insufficient Self-Control/Self-Discipline |

Table 2. Summary of Young’s Early Maladaptive Schema (adapted from Young, 1998).
counteract these processes; and (v) schema are developed and maintained through interpersonal experience. Consequently they can best be modified by working closely with the patient’s current relationships (including the therapeutic relationship) rather than by adopting a primarily individual or ‘intrapsychic’ cognitive approach.

1.5.3. Similarities And Differences Between The Two Models
Theoretically there are key similarities between Beck’s and Young’s schema theories. Both theories are based on a cognitive model of personality disorder which postulates that the characteristic use of avoidance and rigidity are due to maladaptive schema formed in childhood. They both consider schema to be responsible for guiding the way people think, behave, feel and relate to others and they also consider the schema to be central to the individual’s sense of self. Additionally, both approaches consider it common for schema to be out of awareness, with the potential to lie dormant until a life event stimulates and activates the schema. Once the schema is activated, the patient categorises, selects and encodes information in such a way that the schema is maintained (Young et al, 1993). The activation of the schema leads to a high level of affect which directly or indirectly leads to psychological distress such as depression, panic, addictions like alcohol or overeating or psychosomatic disorders (McGinn et al, 1995).

However there are also a number of fundamental differences between the two approaches. Firstly, Young’s Early Maladaptive Schema (EMS) differ from Beck’s core beliefs because they considered to be absolute and do not necessarily give rise to ‘if-then’ propositions (Layden et al, 1993). For example, according to Beck’s model, the core belief ‘I’m bad’ could give rise to the conditional belief, ‘If anyone really knew me, he or she would reject me’ (Beck, 1996), but according to Young, ‘I’m bad’ could give rise to the unconditional belief ‘no woman will ever want to marry me’ (Layden et al, 1993). Secondly, both Beck’s and Young’s schema are theoretically linked to personality disorder diagnoses but only Beck’s are designed to be isomorphic with DSM personality disorder categories. Young’s EMS are divided into domains determined by childhood experiences. Thirdly, the two models apply different
adaptations and additions to standard cognitive techniques (see below for an overview of Young's approach).

1.5.4 Schema Focused Therapy

Schema Focused Therapy (SFT) was developed specifically to address the needs of patients with long-standing characterological disorders (Young, 1990) and is designed to offer an integrated set of strategies for dealing with the high degree of rigidity, avoidance, and interpersonal dysfunction characteristic of personality disorders. It differs from short-term, standard cognitive therapy by integrating the strategies of short-term cognitive therapy with additional experiential (affective), cognitive, behavioural and interpersonal interventions (Young & Lindemann, 1992). It emphasises the therapeutic relationship as a vehicle of change rather than just considering a good therapeutic relationship as a necessary component of therapy (Safran, 1990). It actively explores early childhood origins of client's problems and utilises experiential techniques (e.g. imagery and role-playing) to address and assess early, childhood issues and later life problems. The use of imagery is particularly important to SFT, as according to Young's model, schema content can be encoded at a pre-verbal stage of the individual's development and therefore not easily accessible verbally. Unlike traditional cognitive therapy which uses a guided discovery approach, SFT applies more active confrontation of cognition and behaviour patterns. It places a greater emphasis on identifying and overcoming cognitive and behavioural avoidance and finally, due to the greater resistance to change, length of therapy is substantially longer than 12 weeks (McGinn et al, 1995; Young, 1994).

The assessment phase in SFT comprises six parts and no one component is considered sufficient on its own (McGinn et al, 1995). The procedure includes Pattern identification (an analysis of presenting problem), the Schema Questionnaire, the Multimodal Life History Inventory (Lazarus & Lazarus, 1991), thought records, diaries, mood logs (such as the Daily Record of Dysfunctional Thoughts; Beck et al, 1979), triggering schema and affect through imagery, dialogues, role-plays and observing patterns in the therapy relationship. The other inventories also applied are
designed to assess schema processes and coping strategies; the Young-Rygh Avoidance Inventory (Young & Rygh, 1994) and the Young Compensation Inventory (1995). The reader is referred to McGinn et al (1995) and McGinn & Young (1996) for more explicit, detailed accounts of SFT. To date, like Beck et al’s (1990) Cognitive Therapy for personality disorders, there are no published controlled studies on SFT. However, anecdotal reports and outcome research based on single case studies (e.g. Coon, 1994) supports the SFT approach in the treatment of people with personality disorder.

1.6. ASSESSMENT ISSUES
Schema are so fundamental to patient’s perceptions that they rarely notice the influence of schema on their lives, hence they are difficult to assess and to access in treatment (Young & Gluhoski, 1996; Layden et al, 1993). The following section reviews the current schema assessment literature, paying particular attention to the assessment of Young’s Early Maladaptive Schema.

1.6.1. Methods Of Assessing Schema
Beck (1967) identified five processes through which schema content can be inferred: (i) from an analysis of the individual’s characteristic ways of structuring specific kinds of experiences; (ii) from the recurrent themes in free associations and ruminations; (iii) from the characteristic thematic content of dreams; (iv) from direct questioning about attitudes, prejudices, superstitions and expectations; and (v) from responses to psychological tests designed to pinpoint stereotyped conceptions of self. Since this original work on schema and depression, many procedures have been designed and applied to the assessment of schema content and presence. For example, Segal (1988) suggested using Stroop tests to identify schema content, Rogers, Kuiper & Kirker (1977) applied the Self-Referent Encoding Task (SRET, Craik & Tulving, 1975, which involves the categorical identification of self-descriptive adjectives from a serial presentation of personal adjectives) and Rowe (1978) used repertory-grids.
The two most commonly used methods within research and cognitive therapy are *self-report diaries* such as the Daily Record of Dysfunctional Thoughts (Beck et al, 1979) and the Schema Identification Worksheet (Tinch & Friedberg, 1998) and *self-report inventories* such as the Dysfunctional Attitude Scale (DAS; Weissman, 1979) and the Interpersonal Schema Questionnaire (Safran, Hill & Ford, 1988). Many clinicians recognise self-report inventories as a practical source of information regarding clients' thoughts, and assumptions (e.g. Pretzer & Beck, 1996; Stein & Young, 1992). However self-report is open to a wide range of potential biases and distortions. As an approach it has been criticised because people may not provide an open and honest account of how they think, feel and behave (Furnham, Forde & Cotter, 1998). Additionally self-report schema inventories are designed to assess the presence and content of long-standing cognitive structures which have a significant influence on personality traits. However it is generally agreed that many cognitive interventions are most meaningful when done in the context of affective arousal (e.g. Padesky, 1994; Young, 1990; Beck, 1967). Thus if inventories are completed by clients who are not experiencing strong affect, the responses may represent 'intellectualised approximations of schema content' rather than accurate accounts of the schema (Tinch & Friedberg, 1998).

Two self-report inventories which have been specifically designed to assess the presence of schema in people with personality disorders are Beck's Belief Questionnaire (BQ; Beck, 1990) and Young's Schema Questionnaire (Young, 1990; Young & Brown, 1994). Trull, Goodwin, Schopp et al (1993) evaluated the psychometric properties of the Belief Questionnaire (BQ). With their sample of 188 non-clinical college undergraduates, their results indicated that the questionnaire'ssubscales were internally consistent and relatively stable over a 1-month period. Validity results however were not so strong. The BQ scales were highly positively inter-correlated and only moderate correspondence between BQ scores and corresponding scores from a personality disorder inventory and a personality disorder questionnaire was found.
1.6.2 Young’s Schema Questionnaires

Young’s schema questionnaire was specifically designed to assess the presence of Early Maladaptive Schema (EMS) in people with personality disorders. The second edition of the questionnaire (the current long-form version) was published in 1990 and reprinted in Young, 1994. The 205 items of the long-form questionnaire were based upon clinical experience with ‘chronic and/or difficult psychotherapy patients’ (Schmidt et al, 1995). Each item is rated on a frequency continuum ranging from ‘completely untrue of me’ (1), to ‘describes me perfectly’ (6). The modal number of items per schema scale is nine but the range of items is nine to eighteen per schema scale (see Young, 1994). To date there is no published normative data available for the questionnaire. Young (verbal communication, June 1999) suggests the more items scored 5 or 6, the more likely the client is to have that schema. Table 3 displays a list of the schema scales contained in the long-form of the questionnaire.

<table>
<thead>
<tr>
<th>Early Maladaptive Schema</th>
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<tbody>
<tr>
<td>1. Emotional Deprivation</td>
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<td>2. Abandonment</td>
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<tr>
<td>3. Mistrust / Abuse</td>
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<tr>
<td>4. Social Isolation</td>
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<tr>
<td>5. Defectiveness / Shame</td>
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<tr>
<td>6. Social Undesirability</td>
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<tr>
<td>7. Failure to Achieve</td>
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<tr>
<td>8. Functional Dependence / Incompetence</td>
</tr>
<tr>
<td>9. Vulnerability to Harm &amp; Illness</td>
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<tr>
<td>10. Enmeshment</td>
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<td>11. Subjugation</td>
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<tr>
<td>12. Self-sacrifice</td>
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<tr>
<td>13. Emotional Inhibition</td>
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<tr>
<td>14. Unrelenting Standards</td>
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<tr>
<td>15. Entitlement</td>
</tr>
<tr>
<td>16. Insufficient Self-control / Self-Discipline</td>
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Table 3. The EMS scales of the Schema Questionnaire - Long Form (Young, 1990)

Schmidt et al (1995) conducted three studies to assess the psychometric properties of this version of the schema questionnaire. They excluded 12 items from analysis as they were principally measuring life-events or symptoms. In the first study, factor analysis was conducted using a non-clinical, undergraduate, student sample (n=1129; 63%
female). A Principal Components Analysis (PCA) revealed 13 primary schema, including 12 of the originally hypothesised 16. They labelled the thirteenth schema ‘Fear of Losing Control’. Although Young (1991) proposed a five domain, hierarchical model of EMS, the hierarchical factor analysis performed by Schmidt et al revealed only three higher-order factors (Disconnection, Overconnection & Exaggerated Standards). The Insufficient Self-control factor loaded highly and equally on all three higher-order factors. Using a sample of 85 first year undergraduate psychology students, Schmidt et al found that 13 primary subscales were found to possess adequate test-retest reliability and internal consistency: test-retest coefficients and alpha internal consistency coefficients ranged from 0.50 to 0.82 for test-retest and 0.83 to 0.96 for alpha reliabilities.

In their second study Schmidt et al conducted factor analyses using a clinical (outpatient) sample (n=187, 52% female). At the point of intake, 61% had received an Axis I diagnosis and 55% had received a diagnose of DSM-IV personality disorder (method of diagnosis unspecified). The PCA revealed 15 of the 16 primary schema which the questionnaire was designed to measure. The ‘Fear of Losing Control’ factor which emerged using the student sample was not found to be present in this sample. Three primary schema emerged (Subjugation, Entitlement & Social Isolation) using this sample which had not been present in the student sample. Schmidt et al hypothesised this was because these factors represent more extreme schema which infrequently occur in a non-clinical population. Neither of the two studies found evidence to support Young’s schema scale of Social Undesirability.

Using a non-clinical, undergraduate, student sample (n=163), Schmidt et al’s third study assessed the discriminant validity of the schema scales with respect to measures of psychological distress, self-esteem and cognitive vulnerability for depression. The Personality Diagnostic Questionnaire - Revised (PDQ-R; Hyler & Rieder, 1987) was used as the criterion measure to assess convergent validity. In summary, the total schema scale scores significantly correlated with levels of measured psychological distress, self-esteem and cognitive vulnerability for depression. The total schema
questionnaire score significantly correlated with total PDQ-R score \( (r = 0.71) \) and high scoring PDQ-R subjects scored significantly higher on each of the \( (13) \) schema scales.

The 205-item questionnaire continues to be applied clinically, however since its development, a short form containing 75 items has been designed (Young & Brown, 1994). It comprises 15 scales designed to assess the schema identified by Schmidt et al’s clinical sample. Each scale contains five items and is scored using the same continuum as the longer version. Table 4 displays a list of the schema scales contained in the short-form of the questionnaire.

<table>
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</tr>
<tr>
<td>15. Insufficient Self-control</td>
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</tbody>
</table>

Table 4. The EMS scales of the Schema Questionnaire - Short Form (Young & Brown, 1994)

Currently there is no published empirical evaluation of this questionnaire’s psychometric properties but preliminary findings (Minchin, 1999) indicate the schema scales display adequate internal consistency \( (\alpha \text{ range: } 0.82-0.95) \) and remain relatively stable over a one-month period \( \text{(test-retest reliability; } \rho \text{ range: } 0.65-0.97) \). This thesis aims to assess the validity and reliability of this assessment tool. In order to assess its validity in terms of Young’s model, the questionnaire will be compared with personality traits and diagnoses of the study’s clinical sample. The next section of the introduction reviews the diagnostic tools currently available for personality disorder research.
1.6.3 Instruments For Assessing Personality Disorder

There is a plethora of research literature regarding the assessment of personality disorder (Zimmerman, 1994). The two main approaches are structured interview schedules (e.g. the Structured Clinical Interview for DSM-II-R personality disorders, SCID-II; Spitzer, Williams, Gibbon & First, 1990) and self-report questionnaires (e.g. the PDQ-R). Although some researchers rate the diagnostic accuracy of structured interviews as greater than self-report questionnaires (e.g. Hunt & Andrews, 1992), other studies have reported the two approaches yield similar results (Zimmerman, 1994). Additionally differences have been found between tools which use the same approach, for example, Hyler, Skodol, Kellman et al (1990) found two structured interviews (the SCID-II and the Personality Disorder Examination; Loranger, Susman, Oldham & Russakoff, 1987) produced different rates of diagnostic classification. Comparing studies which evaluate the clinical reliability of these diagnostic tools is problematic because studies have used different participant populations, applied different procedures and have assessed the reliability and validity of different diagnostic instruments. This lack of a uniform approach makes it difficult to choose a suitable research tool. However survey data indicates the self-report Millon Clinical Multiaxial Inventories (Millon, 1997) are among the most popular personality assessment instruments used in current clinical practice (Piotrowski, 1997). Now in its third edition (MCMI-III; Millon, Millon & Davis, 1994), the MCMI is considered to be one of the most useful diagnostic instruments for screening larger groups (Derksen, 1995).

1.6.4 The Millon Clinical Mutiaxial Inventory (MCMI)

Two particular strengths of the MCMI as a diagnostic tool is that firstly, it has been specifically designed to measure personality traits in concordance with DSM-IV criteria for personality disorders, and secondly, it’s design is grounded in established personality theory, namely the biosocial model (Millon, 1981).

Millon defines personality as ‘a complicated mix of biological dispositions and experimental learnings’ (Millon, 1981; p8). His biosocial model of personality represents a combination of temperament (‘biologically based dispositions which
underlie the energy level and colour the moods of the individual; p6) and social learning theory. One axis of his model is the active-passive dimension of personality; the second axis is reinforcement style (dependent, independent, ambivalent and detached). This system leads to eight possible personality types, for example, active-dependent, active-independent, active-ambivalent. Millon describes the personality disordered (pathological personalities), as distinguished from their counterparts, by their rigid use of coping behaviours, their tendency to foster vicious circles (behaviourally and cognitively) and their tenuous stability in stressful situations.

The MCMI-III is a 175-item, true-false self-report inventory which attempts to predict the dichotomous presence or absence of clinical disorders. In addition to its 24 clinical scales which are clustered into four groups (personality scales, severe personality patterns, clinical syndromes and severe clinical syndromes), it contains four indices designed to assess ‘fake bad’ protocols (the Disclosure & Debasement indices), the tendency to portray oneself in a good light (the Desirability index), and the possibility of a random response style (the Validity scale). Table 5 displays a summary of the ways of functioning which are characteristic of the MCMI-III personality patterns (this includes the personality scales and the severe personality patterns). The MCMI applies weighted (Base Rate) scores which are anchored on the prevalence of particular attributes within the psychiatric population. Hence normative data and transformation scores are only applicable to individuals who evidence psychological problems or who are currently undergoing psychotherapy or psychodiagnostic assessment or treatment (Millon & Davis, 1996).

Despite the MCMI-III being designed to co-ordinate with the official DSM taxonomy of personality disorders, both Choca & Van Denburg (1997) and Birtchnell (1991) warn against interpreting high scores on the original eight personality scales as indicators of psychopathology. Both of the MCMI-III’s predecessors (the MCMI-I and the MCMI-II) have been shown to over pathologise respondents (see Choca & Van Denburg, 1997; p103). Instead Choca & Van Denburg (1997) recommend interpreting ‘profiles’ of responses based on collections of elevated base rate scores.
### Table 5: Summary of the Characteristics of the MMPI-III Basic Personality Styles (Scales S, C, & P)

<table>
<thead>
<tr>
<th>Scale</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>S</td>
<td>Avoidant Personality; A lack of desire and an inability to experience deeply pleasant or painful sensations. Tendency to be apathetic, listless, distant and sociable. Minimal needs for affection and emotional support.</td>
</tr>
<tr>
<td>C</td>
<td>Narcissistic Personality; A tendency to be overly sensitive to rejection and to maintain a distance from others. Feelings of inferiority and self-doubt.</td>
</tr>
<tr>
<td>P</td>
<td>Depressive Personality; A tendency to be overly sensitive to rejection and to maintain a distance from others. Feelings of inferiority and self-doubt.</td>
</tr>
</tbody>
</table>
Initial evaluations of the psychometric properties of the MCMI-III's Clinical Personality and Severe Personality Pattern scales, have revealed both adequate internal consistency (α range: 0.66 to 0.89) and test-retest reliability (correlation coefficients ranging from 0.85 to 0.93; Millon et al, 1994). There is some evidence to suggest that the scales lack sufficient discreteness (Davis & Hays, 1997), but it is unclear whether this is primarily due to the design of the inventory or to the accuracy and discreteness of the nosology employed by the psychiatric classification system on which the MCMI is largely based. The criterion validity of the MCMI-III has yet to be clearly established. Retzlaff (1996) reported uniformly poor Positive Predictive Power (PPP) but these disappointing results were not replicated by Davis, Wenger & Guzman (1997) who found the majority of the personality scales to have a PPP greater than 60%.

The research literature offers little consensus on the most appropriate diagnostic tool for assessing personality disorders. The published research data as a collective, questions the accuracy of many, if not all, of the currently available diagnostic instruments, including the MCMI. However, the fact that it is founded established personality theory, its concordance with DSM-IV criteria, and ease of administration, ensures that the MCMI is one of the most widely used diagnostic research tools.

1.7 RESEARCH WITH MENTALLY DISORDERED OFFENDERS
The majority of the sample of this study were recruited from a maximum security, special hospital. If this service is functioning as intended, this setting provides a service to those with the most serious mental health problems and diagnoses, who present a grave and immediate risk to others. Typically contact with other services has failed or been rejected (Taylor, 1997). A special hospital population (N=480) includes approximately one quarter with a diagnosis of personality disorder and personality is routinely assessed on admission (Moore, 1999). A review of the growing research literature on the assessment of personality disorders in offender populations, and its relation to violent offending, is presented in Blackburn (1999). The present aim is to study personality characteristics and self-identified schema in a forensic sample, since
this group might be predicted to evidence significant distress linked with personality disorder diagnosis.

Research suggests the special hospital population comprises a heterogeneous group of clinical diagnoses and behavioural presentations (e.g. Coid, 1992; Blackburn, Crellin, Morgan & Tulloch, 1990). Using a retrospective case-note analysis, Jones, Thomas-Peter, Warren & Leadbeater (1998) investigated the personality characteristics of mentally disordered offenders detained under the legal categories of Psychopathic Disorder (PD) and Mental Illness (MI). Although the two groups differed in terms of psychiatric diagnoses, with the exception of the antisocial scale, the two groups (MI & PD) did not significantly differ on any of the personality or clinical syndrome scales of the MCMI (Millon, 1983). Jones et al argue that even the antisocial difference is weak (the average psychopathic disorder group score was below the suggested base rate of 84). Hence the two forensic groups used in the present thesis are unlikely to constitute homogenous samples.

1.8 AIMS OF THE PROJECT
There is a vast amount of literature on the role of belief systems and presenting psychopathology. Young and Brown’s (1994) Schema Questionnaire is designed to assess the presence of EMS but to date, there is no published evaluation of the questionnaire. Although Young recommends the use of the long-form for the clinical assessment of clients, he states that the short form is designed for research purpose (verbal communication, June 1999). This project aims to assess the psychometric properties of the questionnaire using a clinical sample of patients detained in a maximum security hospital, who meet the criteria for mental illness and personality disorder diagnoses, and a clinical waiting list comparison group.

Additionally, Young’s model asserts that the reason people with personality disorders do not benefit from short-term, standard, cognitive therapy, is that they have Early Maladaptive Schema. Following their evaluation of the long form of the questionnaire, Schmidt et al (1995) concluded further studies are required to explore the relationship
between (DSM) personality disorders and EMS. This thesis aims to assess the assertion that people with personality disorders have EMS by analysing the responses of this clinical sample to the schema questionnaire and the MCMI-III.

1.9 HYPOTHESES
The following predictions were made on the basis of previous research findings:

1.9.1 Psychometric Properties
H1. Young’s schema questionnaire (short form) will show adequate internal consistency.
H2. The scales of the questionnaire will show adequate construct validity.

1.9.2 Personality Disorder And EMS
H3. On the basis of cognitive schema theory, it is predicted that participants diagnosed as having a personality disorder will score higher on the schema scales than those diagnosed as suffering from a mental illness.
H4. On the basis of the enduring nature of difficulties experienced by special hospital patients, it is predicted that the maximum security inpatient sample will score higher on the schema scales than those in the waiting list comparison group.
H5. The Schema Questionnaire will reliably discriminate the participant groups and will therefore display good positive predictive validity.
H6. Participants who score highly on the personality scales of the MCMI-III will also score highly on the Schema Questionnaire.
H7. Identifiable schema will correspond to identifiable personality styles as measured by the MCMI-III.
2. METHOD

2.1 DESIGN
Between subject comparison design conducted on a cross-sectional sample of patients from two services.

2.2 PARTICIPANTS
Participants were recruited from either a community Clinical Psychology waiting list or from within a maximum security hospital. The latter sample were assigned to either a 'Mental Illness' or 'Personality Disorder' group depending on their legal category and psychiatric diagnosis.

2.2.1 Maximum Security Inpatients
The inpatient sample was drawn from a Special Hospital population. Special Hospitals (maximum security hospitals) were established under the Mental Health Act 1959. Their remit was elaborated under section 4 of the National Health Service Act 1977 to provide for "persons subject to detention under the Mental Health Service Act 1959 who ... require treatment under conditions of special security on account of their dangerous, violent or criminal propensities" (HMSO, 1977). Patients are compulsorily detained and are either classified as suffering from a Mental Disorder as defined by the current Mental Health Act (MHA 1983) or are being assessed to ascertain the presence of Mental Disorder. Patients were excluded from the study if they had a dual personality and mental illness diagnosis. Sixty-one participants were drawn from this population. Each participant either had a severe mental illness diagnosis (e.g. schizophrenia) or a diagnosis of personality disorder.

2.2.2 Waiting List Comparison
Twenty-four participants were recruited in a previous study (Minchin, 1999) via South London Primary Care and Community Mental Health Team out-patient Clinical Psychology waiting lists. The majority of participants (51%) described their presenting difficulties as either being anxiety, depression or a combination of the two. At the time
of data collection, none of the participants presented as suffering from positive psychotic symptoms, as measured by the PERI Psychotic Symptom Scale, a self-report inventory designed to assess the presence of positive psychotic symptoms (Dohrenwend, Shrout, Egri & Mendelsohn, 1980; Susser & Struening, 1990).

2.3 MEASURES

(1) The *Schema Questionnaire - Short Form* (Young & Brown, 1994). This 75 item, self-report questionnaire is designed to assess the presence of fifteen Early Maladaptive Schema (as listed in Table 4, p217). It contains five items per schema which the respondent rates on a frequency continuum ranging from 'completely untrue of me' (1) to 'describes me perfectly' (6).

(2) The *Millon Clinical Multiaxial Inventory-III* (MCMI-III; Millon, Millon & Davis, 1994). This 175-item, true-false self-report questionnaire is designed for diagnostic screening or clinical assessment of psychiatric patients. Its items are designed to assess the presence of diagnostic criteria as defined by the latest edition of the American DSM (DSM-IV; APA, 1994). The MCMI-III has 24 clinical scales which are clustered into four groups (personality scales, severe personality patterns, clinical syndromes and severe clinical syndromes). This study is concerned with the 14 scales designed to assess personality styles and pathologies. The MCMI-III also contains a validity scale which is composed of three blatantly implausible items and allows detection of questionnaires which have been randomly answered. The protocol is considered invalid if two or more of these items are endorsed.

(3) The *General Health Questionnaire -28* (GHQ-28; Goldberg, 1978). This 28 item self-report questionnaire contains four subscales designed to measure the presence of somatic symptoms, anxiety and insomnia, social dysfunction and severe depression. Using Likert scoring (0, 1, 2, 3), the range of possible scores per subscale is 0-21. It is designed for use as a screening tool for possible clinical cases. A total GHQ score above 23 is considered high, and represents the case detector threshold (Goldberg,
2.4 PROCEDURE

2.4.1 Maximum Security Inpatient Group
Following approval from Broadmoor Hospital’s Research and Ethics Committee (Appendix One), 279 hospital files were checked and patients were included in the potential research sample if they did not have a dual diagnosis or a mental impairment. Hence patients were excluded if they had any of the following:
1. a current legal category which implied a dual diagnosis (i.e. ‘Mental Illness’ and ‘Psychopathic Disorder’).
2. a current dual (medical) diagnosis of personality disorder and mental illness (namely some form of psychosis).
3. a mental impairment (i.e. an IQ below 70).
The above information was obtained from the most recent reports held within the patient’s medical records (i.e. Case Conference, Mental Health Review Tribunal, Psychiatric or Psychological reports). Of the 279 hospital files which were checked, 65 patients were excluded as they did not meet the selection criteria.

Permission to approach the patients was then sought from each patient’s Responsible Medical Officer (RMO; Appendix Two). Following RMO consent, the appropriateness of approaching the patient to participate in research was discussed with each patients’ ward Clinical Nurse Leader (CNL). A further 62 patients were excluded as the CNL considered it clinically inappropriate for these patients to be approached for research. Reasons for exclusion included patients being considered acutely unwell or presenting as ‘unsettled’ on the ward.

Of the remaining 152 patients, 120 were asked by a ward nurse, if they would discuss the possibility of participating in research being conducted in the hospital. Seventy-seven agreed to discuss their participation with the researcher.
Patients were given a verbal and written explanation of the purpose of the study and what their participation would entail (Appendix Three). At this juncture eight patients chose not to participate in the study. The remaining 69 agreed to participate and gave their written consent (Appendix Four). A further eight withdrew their consent prior to completing the questionnaires (no reason offered), resulting in a sample of 61 inpatients.

Participants were either offered an immediate appointment in which to complete, either via oral administration or in the presence of the researcher, the three questionnaires detailed above (section 2.3) or they were asked if they would prefer to complete the measures in their own time and return them by post. The duration of administration ranged from 30 to 120 minutes, most appointments lasted for approximately 60 minutes. Patients who had completed the MCMI-III as part of a recent clinical assessment were not asked to repeat the procedure and their scores were obtained from their hospital file.

In total 61 patients (51% of the 120 who were approached) participated in the study. Demographic details and information regarding their index offence, and current length of stay in hospital were obtained from their medical records.

2.4.2 Waiting List Comparison Group
Using postal recruitment, participants were recruited via out-patient, Clinical Psychology waiting lists (Minchin, 1999). Participants were asked to provide self-report details of their presenting difficulties, their demographic details and to complete the Schema Questionnaire, the GHQ-28 and the PERI Psychotic Symptom Scale (Dohrenwend et al, 1980; Susser & Struening, 1990).

2.5 STATISTICAL ANALYSIS
Data were collated on SPSS and were analysed in three stages. Firstly, the internal consistency and discreteness of the fifteen schema scales were assessed. The second stage of analysis explored inter-group schema score differences and the predictive
validity of the Schema Questionnaire. Thirdly, the relationship between personality styles (as measured by the MCMI-III) and schema scale scores was explored.
3. RESULTS

3.1 DEMOGRAPHIC DETAILS OF PARTICIPANTS

Demographic details of the three participant groups are presented in Tables 6 and 7. Table 6 illustrates that the three groups are of similar age but the Waiting List (WL) comparison group comprises a higher proportion of females. The WL sample report higher levels of distress as measured by the GHQ-28 (see section 3.1.2).

<table>
<thead>
<tr>
<th>Group</th>
<th>N</th>
<th>Mean Age (Sd) in years</th>
<th>Mean GHQ-28 (Sd)</th>
<th>Sex</th>
<th>Ethnic Background</th>
</tr>
</thead>
<tbody>
<tr>
<td>Personality Disorder (PD)</td>
<td>30</td>
<td>37.2 (11.3)</td>
<td>22.6 (16.6)</td>
<td>26 Males 4 Females</td>
<td>28 White 1 Black-Caribbean 1 Other</td>
</tr>
<tr>
<td>Mental Illness (MI)</td>
<td>31</td>
<td>41.0 (8.8)</td>
<td>17.5 (10.4)</td>
<td>28 Males 3 Females</td>
<td>24 White 3 Black-Caribbean 1 Black-African 1 Other</td>
</tr>
<tr>
<td>Waiting List (WL)</td>
<td>24</td>
<td>38.7 (11.7)</td>
<td>39.4 (16.3)</td>
<td>10 Males 14 Females</td>
<td>20 White 1 Black-Caribbean 2 Indian 1 Pakistani</td>
</tr>
<tr>
<td>Total Sample</td>
<td>85</td>
<td>39.0 (10.6)</td>
<td>25.8 (17.0)</td>
<td>75% Male 25% Female</td>
<td>85% White 6% Black-Caribbean 1% Black African 2% Indian 1% Pakistani 5% Other</td>
</tr>
</tbody>
</table>

Table 6. Demographic Details of all three Participant Groups

3.1.1 Maximum Security Inpatients

Personality Disorder Group

The ‘Personality Disorder Group’ comprised 30 patients detained under the legal category of Psychopathic Disorder. The average length of time these participants had been in-patients at the maximum security hospital was 5.7 (Sd 5.5) years and the
majority (60%) were detained under section 37/41 of the Mental Health Act (1983): hospital restriction order, without limit of time.

**Mental Illness Group**

Thirty-one patients detained under the legal category of Mental Illness participated in the study. The average length of time these participants had been in-patients at the maximum security hospital was 7.4 (Sd 6.7) years and the majority (65%) were detained under section 37/41 of the Mental Health Act (1983).

Table 7 presents the medical record diagnoses and index offences of those in each of the inpatient groups. The ‘Personality Disorder’ (PD) sample were more likely to have a history of sexual offending than the ‘Mental Illness’ (MI) group. Both groups had similar frequency of convictions for murder or manslaughter. Only the MI group contained participants admitted to maximum security without conviction because their behaviour was considered highly dangerous or unmanageable in other settings.

<table>
<thead>
<tr>
<th>Group</th>
<th>Current Diagnosis</th>
<th>N</th>
<th>Index Offence</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Personality Disorder (PD)</td>
<td>Personality Disorder (PD)</td>
<td>15</td>
<td>Sexual Offence</td>
<td>11</td>
</tr>
<tr>
<td></td>
<td>Multiple PD diagnoses</td>
<td>9</td>
<td>Murder or Manslaughter</td>
<td>10</td>
</tr>
<tr>
<td></td>
<td>Borderline PD</td>
<td>3</td>
<td>Interpersonal Violence</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>Antisocial PD</td>
<td>1</td>
<td>Arson</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td>Schizoid PD</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>PD &amp; ADHD</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mental Illness (MI)</td>
<td>Paranoid Schizophrenia</td>
<td>6</td>
<td>Sexual Offence</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>Psychotic Illness</td>
<td>19</td>
<td>Murder or Manslaughter</td>
<td>11</td>
</tr>
<tr>
<td></td>
<td>Schizo-Affective Disorder</td>
<td>6</td>
<td>Interpersonal Violence</td>
<td>9</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Arson</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Theft or Damage to</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>property</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>No Offence</td>
<td>3</td>
</tr>
</tbody>
</table>

Table 7. Demographic Details of in-patient sample.

**3.1.2 Comparison of Participant Groups**

When data did not fulfil the criterion of normal distribution, non-parametric analyses were conducted. Using Analysis of Variance, the three participant groups did not significantly differ in terms of age (F = 1.04, p<0.36) but the Waiting List Group had
significantly more females than both the Personality Disorder and Mental Illness groups (as assessed by a Chi-square test; \( \chi^2 = 20.20, p<0.01 \)).

Eighty-eight percent of the Waiting List Group, compared with 35% of the Mental Illness and 20% of the Personality Disorder groups, scored above the GHQ-28 threshold of 23. Using a Kruskal-Wallis test, there was a significant difference between groups on total GHQ score (\( \chi^2 = 26.28, p<0.01 \)).

The Mental Illness and Personality Disorder participant groups did not significantly differ in terms of their length of hospital admission (MI average was 7.4 years, PD average was 5.7 years; Mann-Whitney: \( U = 397, p<0.33 \))

### 3.2 EXPLORATION OF THE PSYCHOMETRIC PROPERTIES OF THE SCHEMA QUESTIONNAIRE

#### 3.2.1 Internal Consistency

In total 85 participants completed the schema questionnaire. Table 8 presents the average schema scale scores. All of the scales showed adequate internal consistency (i.e. \( \alpha > 0.7 \) Kline, 1993) as measured by Cronbach’s Alpha, ranging from 0.74 to 0.94 (Table 8). The 15 scales comprise five items each, and this level of consistency is unusual for such small item pools (Kline, 1993). This raises the suspicion that each scale may be drawing its items from one homogenous item pool. In order to check that this consistency was not simply due to one general domain from which these items were randomly selected, a Principal Components Analysis (PCA) was conducted. This follows the procedures adopted by Schmidt et al (1995) and was conducted to verify the extent to which the constructs did not overlap (i.e. to verify the 'distinctiveness' of the scales).
Table 8. Mean scores and internal consistency (Cronbach’s Alpha; \( \alpha \)) for the 15 scales on the Schema Questionnaire.

<table>
<thead>
<tr>
<th>Schema Scale</th>
<th>N</th>
<th>Mean</th>
<th>Sd</th>
<th>( \alpha )</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Emotional Deprivation</td>
<td>85</td>
<td>17.21</td>
<td>7.22</td>
<td>0.88</td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>85</td>
<td>12.95</td>
<td>7.19</td>
<td>0.91</td>
</tr>
<tr>
<td>3. Mistrust / Abuse</td>
<td>85</td>
<td>14.94</td>
<td>7.18</td>
<td>0.90</td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>84</td>
<td>13.99</td>
<td>7.20</td>
<td>0.89</td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>85</td>
<td>11.75</td>
<td>6.87</td>
<td>0.89</td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>85</td>
<td>12.28</td>
<td>7.55</td>
<td>0.94</td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>85</td>
<td>11.13</td>
<td>5.68</td>
<td>0.81</td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>85</td>
<td>12.16</td>
<td>7.08</td>
<td>0.87</td>
</tr>
<tr>
<td>9. Enmeshment</td>
<td>85</td>
<td>9.09</td>
<td>5.75</td>
<td>0.87</td>
</tr>
<tr>
<td>10. Subjugation</td>
<td>85</td>
<td>13.69</td>
<td>6.64</td>
<td>0.84</td>
</tr>
<tr>
<td>11. Self-sacrifice</td>
<td>85</td>
<td>16.05</td>
<td>6.49</td>
<td>0.86</td>
</tr>
<tr>
<td>12. Emotional Inhibition</td>
<td>85</td>
<td>14.53</td>
<td>6.71</td>
<td>0.86</td>
</tr>
<tr>
<td>13. Unrelenting Standards</td>
<td>85</td>
<td>16.64</td>
<td>7.05</td>
<td>0.85</td>
</tr>
<tr>
<td>14. Entitlement</td>
<td>85</td>
<td>12.65</td>
<td>5.35</td>
<td>0.74</td>
</tr>
<tr>
<td>15. Insufficient Self-control</td>
<td>85</td>
<td>13.40</td>
<td>6.06</td>
<td>0.82</td>
</tr>
</tbody>
</table>

3.2.2 Principal Components Analysis

A Principal Components Analysis (PCA) was chosen over the more standard Factor Analysis as PCA is more robust to smaller samples and is more appropriate when analysing inter-item correlation. However, a sample size of 85 is small for a PCA, hence the results should be considered exploratory in nature. Schmidt et al (1995) used a Varimax rotation. At this stage of analysis, however, there was no reason to assume the scales were independent of each other, hence the current study conducted a PCA with oblimin rotation. Fifteen components were extracted, accounting for 78.95% of the common variance. However, the pattern matrix reported in Appendix Five demonstrates that only eight of the schema scales emerge in an easily identified way. This analysis raises concerns regarding the construct validity of the 15 scales. Although all 15 scales appear internally consistent, the underlying structure does not appear to fit the proposed 15 factor questionnaire and does not support all 15 scales as discrete measures.

The PCA explores the structure of the schema questionnaire at item level. Analysis of inter-scale correlations explores the questionnaire’s structure at scale level. In Table 9, the correlations between the scales and the factor scores are presented. While the
<table>
<thead>
<tr>
<th>Components</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
<th>10</th>
<th>11</th>
<th>12</th>
<th>13</th>
<th>14</th>
<th>15</th>
</tr>
</thead>
<tbody>
<tr>
<td>Schema Scales</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. Emotional Deprivation</td>
<td><strong>1.00</strong></td>
<td>-0.18</td>
<td>-0.03</td>
<td>-0.01</td>
<td>-0.03</td>
<td>0.07</td>
<td>0.04</td>
<td>0.05</td>
<td>0.07</td>
<td>0.09</td>
<td>-0.09</td>
<td>-0.01</td>
<td>-0.15</td>
<td>0.03</td>
<td>-0.03</td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>0.11</td>
<td><strong>1.00</strong></td>
<td>0.25</td>
<td>0.13</td>
<td>-0.19</td>
<td>-0.13</td>
<td>-0.16</td>
<td>-0.14</td>
<td>-0.06</td>
<td>-0.13</td>
<td>0.19</td>
<td>0.13</td>
<td>0.24</td>
<td>0.14</td>
<td>0.13</td>
</tr>
<tr>
<td>3. Mistrust/Abuse</td>
<td>0.28*</td>
<td>0.51*</td>
<td><strong>1.00</strong></td>
<td>0.11</td>
<td>-0.22</td>
<td>-0.22</td>
<td>-0.16</td>
<td>-0.18</td>
<td>0.15</td>
<td>-0.12</td>
<td>0.11</td>
<td>0.05</td>
<td>0.26</td>
<td>0.08</td>
<td>0.09</td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>0.30*</td>
<td>0.43*</td>
<td>0.72*</td>
<td><strong>1.00</strong></td>
<td>-0.03</td>
<td>-0.06</td>
<td>-0.16</td>
<td>0.03</td>
<td>-0.13</td>
<td>0.15</td>
<td>0.13</td>
<td>0.15</td>
<td>0.07</td>
<td>0.09</td>
<td></td>
</tr>
<tr>
<td>5. Defectiveness/Shame</td>
<td>0.37*</td>
<td>0.53*</td>
<td>0.63*</td>
<td>0.64*</td>
<td><strong>1.00</strong></td>
<td>0.15</td>
<td>0.18</td>
<td>0.15</td>
<td>-0.15</td>
<td>0.14</td>
<td>-0.18</td>
<td>-0.12</td>
<td>-0.24</td>
<td>-0.24</td>
<td></td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>0.16</td>
<td>0.50*</td>
<td>0.56*</td>
<td>0.49*</td>
<td>0.63*</td>
<td><strong>1.00</strong></td>
<td>0.15</td>
<td>0.05</td>
<td>-0.14</td>
<td>0.16</td>
<td>-0.12</td>
<td>-0.13</td>
<td>-0.19</td>
<td>-0.11</td>
<td>-0.08</td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>0.16</td>
<td>0.58*</td>
<td>0.44*</td>
<td>0.40*</td>
<td>0.56*</td>
<td>0.72*</td>
<td><strong>1.00</strong></td>
<td>0.23</td>
<td>-0.20</td>
<td>0.21</td>
<td>-0.12</td>
<td>-0.32</td>
<td>-0.27</td>
<td>-0.31</td>
<td></td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>0.13</td>
<td>0.60*</td>
<td>0.66*</td>
<td>0.65*</td>
<td>0.57*</td>
<td>0.67*</td>
<td>0.57*</td>
<td><strong>1.00</strong></td>
<td>-0.09</td>
<td>0.16</td>
<td>-0.17</td>
<td>-0.13</td>
<td>-0.17</td>
<td>-0.23</td>
<td>-0.23</td>
</tr>
<tr>
<td>9. Enmeshment</td>
<td>0.09</td>
<td>0.43*</td>
<td>0.29*</td>
<td>0.11</td>
<td>0.30*</td>
<td>0.42*</td>
<td>0.60*</td>
<td>0.42*</td>
<td><strong>1.00</strong></td>
<td>-0.07</td>
<td>0.04</td>
<td>0.02</td>
<td>0.07</td>
<td>0.18</td>
<td>0.16</td>
</tr>
<tr>
<td>10. Subjugation</td>
<td>0.25</td>
<td>0.60*</td>
<td>0.69*</td>
<td>0.61*</td>
<td>0.64*</td>
<td>0.71*</td>
<td>0.70*</td>
<td>0.71*</td>
<td>0.55*</td>
<td><strong>1.00</strong></td>
<td>-0.17</td>
<td>-0.10</td>
<td>-0.22</td>
<td>-0.14</td>
<td>-0.17</td>
</tr>
<tr>
<td>11. Self-sacrifice</td>
<td>0.07</td>
<td>0.40*</td>
<td>0.59*</td>
<td>0.43*</td>
<td>0.46*</td>
<td>0.52*</td>
<td>0.48*</td>
<td>0.58*</td>
<td>0.50*</td>
<td>0.68*</td>
<td><strong>1.00</strong></td>
<td>0.19</td>
<td>0.16</td>
<td>0.17</td>
<td>0.22</td>
</tr>
<tr>
<td>12. Emotional Inhibition</td>
<td>0.19</td>
<td>0.51*</td>
<td>0.51</td>
<td>0.56*</td>
<td>0.45*</td>
<td>0.56*</td>
<td>0.40*</td>
<td>0.66*</td>
<td>0.35*</td>
<td>0.61*</td>
<td>0.50*</td>
<td><strong>1.00</strong></td>
<td>0.08</td>
<td>0.15</td>
<td>0.14</td>
</tr>
<tr>
<td>13. Unrelenting Standards</td>
<td>0.21</td>
<td>0.29*</td>
<td>0.43*</td>
<td>0.36*</td>
<td>0.34*</td>
<td>0.27</td>
<td>0.20</td>
<td>0.52*</td>
<td>0.41*</td>
<td>0.48*</td>
<td>0.30*</td>
<td>0.44*</td>
<td><strong>1.00</strong></td>
<td>0.16</td>
<td>0.29</td>
</tr>
<tr>
<td>14. Entitlement</td>
<td>0.13</td>
<td>0.30*</td>
<td>0.49*</td>
<td>0.40*</td>
<td>0.22*</td>
<td>0.19</td>
<td>0.30*</td>
<td>0.49*</td>
<td>0.32*</td>
<td>0.41*</td>
<td>0.34*</td>
<td>0.42*</td>
<td>0.43*</td>
<td><strong>1.00</strong></td>
<td>0.26</td>
</tr>
<tr>
<td>15. Insufficient Self-control</td>
<td>0.22</td>
<td>0.59*</td>
<td>0.44*</td>
<td>0.53*</td>
<td>0.57*</td>
<td>0.57*</td>
<td>0.63*</td>
<td>0.67*</td>
<td>0.55*</td>
<td>0.72*</td>
<td>0.53*</td>
<td>0.63*</td>
<td>0.36*</td>
<td>0.48*</td>
<td><strong>1.00</strong></td>
</tr>
</tbody>
</table>

Table 9. Inter-Scale and Inter-Component Correlation Matrix

The highlighted schema scales are those identified as being distinct by the PCA.
factors have been rotated obliquely the procedure attempts to fit a simple structure to the most orthogonal solution possible and this is evidenced by the fact that the correlations between factor scores are substantially lower than those between the summed scale scores. The correlations between the scale scores are very high and six exceed 0.70 (which is this study’s criterion for internal consistency). As a result it would appear, in this sample, that there is little evidence that these scales measure independent, distinct schema.

3.2.3 Summary of Psychometric Properties
Although all 15 schema scales presented an adequate level of internal consistency, there is a great deal of overlap between the scales. Eight of the scales were identified as discrete by the PCA. Due to the statistically small sample size, these analyses should be considered exploratory. Hence all 15 scales were considered in subsequent analyses. Although the factor analysis suggests eight of the scales can be used with confidence, caution should be used when considering the seven scales not identified as discrete.

3.3 DIFFERENCES BETWEEN PARTICIPANT GROUPS ON THE SCHEMA QUESTIONNAIRE

3.3.1 ANOVA
The responses of the three participant groups were compared using Analysis of Variance. With the exception of three scales (Emotional Deprivation, Failure to Achieve and Functional Dependence) the Waiting List (WL) group generally scored higher than both the Mental Illness (MI) and Personality Disorder (PD) group. The three participant groups significantly differed on four scales; Vulnerability to Harm, Enmeshment, Self-sacrifice & Unrelenting Standards. These findings are illustrated in Table 10.

The results of a post hoc comparison (Scheffé test) revealed that the significant differences found using the above ANOVA were mainly due to the Waiting List group scores being significantly higher than both the Mental Illness and Personality Disorder
groups (p<0.03 for schema scales: Vulnerability to Harm, Self-Sacrifice & Unrelenting Standards). The Waiting List and Personality Disorder groups significantly differed on their Enmeshment scale scores (p<0.01).

<table>
<thead>
<tr>
<th>Schema Scale</th>
<th>Mean (Sd)</th>
<th>F value</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1. Emotional Deprivation</strong></td>
<td>18.73 (6.29)</td>
<td>1.56</td>
</tr>
<tr>
<td><strong>2. Abandonment</strong></td>
<td>12.77 (8.29)</td>
<td>0.70</td>
</tr>
<tr>
<td><strong>3. Mistrust / Abuse</strong></td>
<td>14.37 (7.29)</td>
<td>3.07</td>
</tr>
<tr>
<td><strong>4. Social Isolation</strong></td>
<td>14.59 (8.19)</td>
<td>1.02</td>
</tr>
<tr>
<td><strong>5. Defectiveness / Shame</strong></td>
<td>12.67 (8.08)</td>
<td>0.22</td>
</tr>
<tr>
<td><strong>6. Failure to Achieve</strong></td>
<td>11.60 (7.75)</td>
<td>0.19</td>
</tr>
<tr>
<td><strong>7. Functional Dependence</strong></td>
<td>10.73 (5.67)</td>
<td>0.19</td>
</tr>
<tr>
<td><strong>8. Vulnerability to Harm</strong></td>
<td>10.07 (6.41)</td>
<td>6.49*</td>
</tr>
<tr>
<td><strong>9. Enmeshment</strong></td>
<td>6.60 (2.06)</td>
<td>5.25*</td>
</tr>
<tr>
<td><strong>10. Subjugation</strong></td>
<td>12.50 (5.92)</td>
<td>3.47</td>
</tr>
<tr>
<td><strong>11. Self-sacrifice</strong></td>
<td>14.63 (5.99)</td>
<td>5.29*</td>
</tr>
<tr>
<td><strong>12. Emotional Inhibition</strong></td>
<td>14.67 (5.70)</td>
<td>0.70</td>
</tr>
<tr>
<td><strong>13. Unrelenting Standards</strong></td>
<td>14.07 (5.58)</td>
<td>7.98*</td>
</tr>
<tr>
<td><strong>14. Entitlement</strong></td>
<td>12.47 (4.87)</td>
<td>0.28</td>
</tr>
<tr>
<td><strong>15. Insufficient Self-control</strong></td>
<td>11.83 (5.78)</td>
<td>1.68</td>
</tr>
</tbody>
</table>

Table 10. The average schema scale scores for the three participant groups; Personality Disorder (PD), Mental Illness (MI) & Waiting List comparison (WL).

The highlighted schema scales are those identified as being distinct by the PCA.

3.3.2 Discriminant Function Analysis

Bivariate analysis ignores the possibility that differences may be due to the overlapping variance between dependent variables. The PCA and inter-scale correlations (section 3.2.2) have already demonstrated the high degree of such overlap with schema scales. Therefore a multivariate method which incorporates this covariation was conducted to see if there is any meaningful way that schema can be used to discriminate the three groups.
In order to assess the predictive validity of the Schema Questionnaire (SQ), the SQ was assessed through a standard (direct) Discriminant Function Analysis (DFA). The DFA revealed two discriminant functions, one of which was significant (Table 11).

<table>
<thead>
<tr>
<th>Function</th>
<th>% Variance</th>
<th>Canonical r</th>
<th>Chi-square</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>78.2</td>
<td>0.73</td>
<td>76.85</td>
<td>&lt;0.01</td>
</tr>
<tr>
<td>2</td>
<td>21.8</td>
<td>0.49</td>
<td>20.44</td>
<td>N.S.</td>
</tr>
</tbody>
</table>

Table 11. Discriminant Function Summary

The Discriminant Function Analysis allows the identification of the schema scales which best discriminate the participant groups from each other. Table 12 displays the canonical Discriminant Function Coefficients of the 15 schema scales (which show how much of the function can be explained by each scale), and the function coefficients at group centroids (which are the average function score for each participant group).

<table>
<thead>
<tr>
<th>Schema Scale</th>
<th>Function 1</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Emotional Deprivation</td>
<td>0.04</td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>-0.16</td>
</tr>
<tr>
<td>3. Mistrust / Abuse</td>
<td>0.59</td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>-0.43</td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>-0.67</td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>-0.50</td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>-0.51</td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>1.31</td>
</tr>
<tr>
<td>9. Enmeshment</td>
<td>0.28</td>
</tr>
<tr>
<td>10. Subjugation</td>
<td>0.49</td>
</tr>
<tr>
<td>11. Self-sacrifice</td>
<td>0.27</td>
</tr>
<tr>
<td>12. Emotional Inhibition</td>
<td>-0.64</td>
</tr>
<tr>
<td>13. Unrelenting Standards</td>
<td>0.44</td>
</tr>
<tr>
<td>14. Entitlement</td>
<td>-0.71</td>
</tr>
<tr>
<td>15. Insufficient Self-control</td>
<td>0.40</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Group Mean</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>PD</td>
<td>-1.05</td>
</tr>
<tr>
<td>MI</td>
<td>-0.24</td>
</tr>
<tr>
<td>WL</td>
<td>1.57</td>
</tr>
</tbody>
</table>

Table 12. The canonical Discriminant Function Coefficients of the 15 schema scales and functions at participant group centroids.

The highlighted schema scales are those identified as being distinct by the PCA.
Figure 1 displays the schema scale function coefficients and the average participant group function score for the significant function (Function 1) in a graphical form. This analysis suggests there is one dimension along which the three groups significantly differ. This dimension appears to run from Vulnerability to Harm at one extreme to Entitlement at the other. The Personality Disorder group is at the Entitlement schema end of the dimension, and the Waiting List Group is at the Vulnerability to Harm end.

Using the weightings identified through the DFA, the positive predictive validity of the SQ was calculated (Table 13). Of the 85 participants, a substantial amount (76.2%) of original grouped cases were correctly classified by their responses on the Schema Questionnaire.

<table>
<thead>
<tr>
<th>Participant Group</th>
<th>Predicted Group Membership (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>PD</td>
</tr>
<tr>
<td>PD</td>
<td>82.8</td>
</tr>
<tr>
<td>MI</td>
<td>19.4</td>
</tr>
<tr>
<td>WL</td>
<td>12.5</td>
</tr>
</tbody>
</table>

Table 13. The classification success rate of the Schema Questionnaire.

In Summary the Discriminant Function Analysis identified one significant function which reliably discriminated the three groups based on their responses to the schema questionnaire. This function appears to be on a dimension continuum ranging from Vulnerability to Harm to Entitlement. Using this function, the positive predictive validity of the questionnaire for the total sample was 76.2%, which represents an error rate of 23.8%.
Figure 1. The canonical Discriminant Function Coefficients of the 15 schema scales and participant group centroids based on the significant function identified by the Discriminant Function Analysis. The highlighted schema scales are those identified as being distinct by the PCA.
3.4 RELATIONSHIP BETWEEN THE MCMI-III PERSONALITY SCALES AND THE SQ SCALES

Normative data and transformation scores for the MCMI-III are based on a clinical sample of 998 Canadians seeking or receiving input from a psychologist (Millon, Millon & Davis, 1994). The sample in this study differs from Millon et al.'s normative sample both in terms of nationality and mental health setting. This raises the question of the appropriateness of applying the MCMI-III score standardisation to this sample of British, maximum security patients. This is an empirical issue beyond the brief of this thesis. However, since the emphasis here is on a correlational analysis of schema and MCMI personality styles, it was considered appropriate to utilise the raw scores of the MCMI since correlations will remain constant over any linear transformation. Hence participants' raw MCMI-III scores, as opposed to standardised scores, were used in the following analyses. The average MCMI-III raw scores are not presented because inter-scale comparisons should not be made on the basis of raw scores.

The following analyses are based upon the responses from the inpatient sample as the waiting list participants did not complete the MCMI-III. Fifty-eight of the 60 participants in this group completed the MCMI-III. One participant was excluded from analysis as he provided an invalid profile.

3.4.1 Personality-Schema Correlations

In order to examine for a relationship between personality styles and schema, the fourteen MCMI-III personality scales and the 15 schema scales were analysed using Pearson Product Moment correlation. This is presented in Table 14. With the exception of the Compulsive personality scale which only significantly correlated with one schema scale (Insufficient Self-control), each personality scale significantly correlated with a number of schema scale scores. Only two schema scales did not significantly correlate with more than three personality scales: the Unrelenting Standards and Enmeshment schema scales, did not significantly correlate with any of the MCMI-III personality scales. Six of the personality scales (Depressive, Dependent,
<table>
<thead>
<tr>
<th>Schema Scales</th>
<th>Personality Scales (MCM-Ill)</th>
<th>Schizoid</th>
<th>Avoidant</th>
<th>Depressive</th>
<th>Dependent</th>
<th>Histrionic</th>
<th>Narcissistic</th>
<th>Antisocial</th>
<th>Aggressive</th>
<th>Compulsive</th>
<th>Passive-Aggressive</th>
<th>Self-Defeating</th>
<th>Schizotypal</th>
<th>Borderline</th>
<th>Paranoic</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Emotional Deprivation</td>
<td>0.37* 0.35*</td>
<td>0.14 0.23</td>
<td>0.25</td>
<td>-0.36* -0.26*</td>
<td>0.32</td>
<td>0.28</td>
<td>-0.31</td>
<td>0.31</td>
<td>0.26</td>
<td>0.21</td>
<td>0.23</td>
<td>0.21</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Abandonment</td>
<td>0.16 0.42*</td>
<td>0.49*</td>
<td>0.61*</td>
<td>-0.11</td>
<td>-0.19</td>
<td>0.31</td>
<td>0.31</td>
<td>-0.29</td>
<td>0.40* 0.48*</td>
<td>0.50* 0.57* 0.30</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Mistrust / Abuse</td>
<td>0.50* 0.51*</td>
<td>0.54*</td>
<td>0.58*</td>
<td>-0.24</td>
<td>-0.06</td>
<td>0.45*</td>
<td>0.55*</td>
<td>-0.24</td>
<td>0.69* 0.65* 0.64* 0.59*</td>
<td>0.75*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Social Isolation</td>
<td>0.63* 0.65*</td>
<td>0.53*</td>
<td>-0.51*</td>
<td>-0.22</td>
<td>0.41*</td>
<td>0.59*</td>
<td>-0.30</td>
<td>0.71*</td>
<td>0.66* 0.71* 0.61* 0.67*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Defectiveness / Shame</td>
<td>0.52* 0.60*</td>
<td>0.66*</td>
<td>0.58*</td>
<td>-0.40*</td>
<td>-0.36*</td>
<td>0.31</td>
<td>0.47*</td>
<td>-0.25</td>
<td>0.65* 0.69* 0.60* 0.53* 0.48*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Failure to Achieve</td>
<td>0.45* 0.54*</td>
<td>0.59*</td>
<td>0.67*</td>
<td>-0.31</td>
<td>-0.39*</td>
<td>0.34*</td>
<td>0.38*</td>
<td>-0.25</td>
<td>0.59* 0.63* 0.59*</td>
<td>0.50*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. Functional Dependence</td>
<td>0.34* 0.42*</td>
<td>0.51*</td>
<td>0.60*</td>
<td>-0.18</td>
<td>-0.23</td>
<td>0.30</td>
<td>0.30</td>
<td>-0.31</td>
<td>0.51* 0.54* 0.51*</td>
<td>0.50*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. Vulnerability to Harm</td>
<td>0.56* 0.50*</td>
<td>0.60*</td>
<td>0.53*</td>
<td>-0.31</td>
<td>-0.07</td>
<td>0.37*</td>
<td>0.49*</td>
<td>-0.33</td>
<td>0.63* 0.64* 0.73*</td>
<td>0.51*</td>
<td>0.62*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. Enmeshment</td>
<td>0.06 0.15</td>
<td>0.16</td>
<td>0.34</td>
<td>0.14</td>
<td>0.05</td>
<td>0.16</td>
<td>0.06</td>
<td>-0.01</td>
<td>0.13 0.19</td>
<td>0.18 0.13 0.08</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. Subjugation</td>
<td>0.47* 0.54*</td>
<td>0.55*</td>
<td>0.68*</td>
<td>-0.32</td>
<td>-0.29*</td>
<td>0.44*</td>
<td>0.47*</td>
<td>-0.27</td>
<td>0.52* 0.61*</td>
<td>0.60*</td>
<td>0.58* 0.49*</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11. Self-sacrifice</td>
<td>0.23 0.33</td>
<td>0.41*</td>
<td>0.50*</td>
<td>-0.02</td>
<td>0.00</td>
<td>0.37*</td>
<td>0.41*</td>
<td>0.03</td>
<td>0.47* 0.48* 0.39*</td>
<td>0.39*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12. Emotional Inhibition</td>
<td>0.55* 0.54*</td>
<td>0.40*</td>
<td>0.46*</td>
<td>-0.41*</td>
<td>-0.20</td>
<td>0.40*</td>
<td>0.52*</td>
<td>-0.33</td>
<td>0.42* 0.52* 0.47*</td>
<td>0.42*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13. Unrelenting Standards</td>
<td>0.14 0.12</td>
<td>0.17</td>
<td>-0.01</td>
<td>0.05</td>
<td>0.30</td>
<td>0.08</td>
<td>0.17</td>
<td>0.08</td>
<td>0.12 0.22</td>
<td>0.16</td>
<td>-0.03 0.25</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>14. Entitlement</td>
<td>0.31 0.10</td>
<td>0.16</td>
<td>0.11</td>
<td>0.11</td>
<td>0.46*</td>
<td>0.36*</td>
<td>0.48*</td>
<td>-0.24</td>
<td>0.34*</td>
<td>0.22</td>
<td>0.30</td>
<td>0.19 0.45*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>15. Insufficient Self-control</td>
<td>0.44* 0.49*</td>
<td>0.48*</td>
<td>0.60*</td>
<td>-0.21</td>
<td>-0.15</td>
<td>0.44*</td>
<td>0.51*</td>
<td>-0.42*</td>
<td>0.54* 0.54* 0.53*</td>
<td>0.48* 0.40*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>No. of significant correlations</td>
<td>10 11 11</td>
<td>11</td>
<td>4</td>
<td>5</td>
<td>9</td>
<td>10</td>
<td>1</td>
<td>12</td>
<td>11</td>
<td>11</td>
<td>11</td>
<td>10</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Table 14. Schema Scale and MCM-Ill Personality Scale Correlation Matrix
The highlighted schema scales are those identified as being distinct by the PCA.
Passive-Aggressive, Self-Defeating, Schizotypal & Borderline) significantly positively correlated with the same eleven schema scales.

3.4.2 Canonical Correlation
The above analysis suggests there may be a relationship between clusters of schema scales and personality styles. However, this analysis is bivariate and ignores the possibility that correlations may be due to the overlapping variance between scales. Therefore, a multivariate method which can incorporate this covariation was conducted to explore relationships between the schema and personality scale scores.

Canonical correlation revealed fourteen Canonical variates (functions), three of which were significant. These are illustrated in Table 15. The weightings of these three functions on the schema and personality scales are presented in Table 16.

<table>
<thead>
<tr>
<th>Function</th>
<th>Eigen Value</th>
<th>R²</th>
<th>Chί²</th>
<th>Df.</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>0.88</td>
<td>0.94</td>
<td>322.21</td>
<td>210</td>
<td>&lt;0.00</td>
</tr>
<tr>
<td>2</td>
<td>0.77</td>
<td>0.88</td>
<td>242.93</td>
<td>182</td>
<td>&lt;0.00</td>
</tr>
<tr>
<td>3</td>
<td>0.69</td>
<td>0.83</td>
<td>188.82</td>
<td>156</td>
<td>&lt;0.04</td>
</tr>
<tr>
<td>4</td>
<td>0.66</td>
<td>0.81</td>
<td>145.43</td>
<td>132</td>
<td>N.S.</td>
</tr>
<tr>
<td>5</td>
<td>0.54</td>
<td>0.73</td>
<td>105.81</td>
<td>110</td>
<td>N.S.</td>
</tr>
<tr>
<td>6</td>
<td>0.42</td>
<td>0.65</td>
<td>77.28</td>
<td>90</td>
<td>N.S.</td>
</tr>
<tr>
<td>7</td>
<td>0.39</td>
<td>0.62</td>
<td>57.15</td>
<td>72</td>
<td>N.S.</td>
</tr>
<tr>
<td>8</td>
<td>0.31</td>
<td>0.55</td>
<td>39.09</td>
<td>56</td>
<td>N.S.</td>
</tr>
<tr>
<td>9</td>
<td>0.25</td>
<td>0.50</td>
<td>25.57</td>
<td>42</td>
<td>N.S.</td>
</tr>
<tr>
<td>10</td>
<td>0.17</td>
<td>0.42</td>
<td>15.00</td>
<td>30</td>
<td>N.S.</td>
</tr>
<tr>
<td>11</td>
<td>0.11</td>
<td>0.33</td>
<td>8.00</td>
<td>20</td>
<td>N.S.</td>
</tr>
<tr>
<td>12</td>
<td>0.06</td>
<td>0.24</td>
<td>3.77</td>
<td>12</td>
<td>N.S.</td>
</tr>
<tr>
<td>13</td>
<td>0.04</td>
<td>0.19</td>
<td>1.53</td>
<td>6</td>
<td>N.S.</td>
</tr>
<tr>
<td>14</td>
<td>0.00</td>
<td>0.05</td>
<td>0.10</td>
<td>2</td>
<td>N.S.</td>
</tr>
</tbody>
</table>

Table 15. Canonical Statistics
Table 16. Item-Function Correlations
(The highlighted schema scales are those identified as being distinct by the PCA)
(Highlighted weightings are >0.4)

In order to interpret the canonical functions an arbitrary decision was made to initially consider only those weights exceeding 0.40. The process of interpretation follows closely that of the Principal Components Analysis and is essentially qualitative. Using this approach it is possible to identify which schema one would expect to be present if certain clusters of personality styles were present.

The first function appears to reveal an underlying latent trait of rigidity with participants obtaining low scores on the Avoidant and Schizoid scales, and high scores on the Compulsive, Histrionic and Narcissistic scales. It appears that individuals having latent traits of Avoidant and Schizoid personality styles are likely to have schema of...
Defectiveness/Shame. Whereas the Compulsive, Histrionic and Narcissistic individuals are likely to have a belief structure of Unrelenting Standards.

Using similar qualitative interpretation, those participants who present with a highly Dependent personality style are likely to have schema of Failure to Achieve, Abandonment, Enmeshment, Functional Dependence and Subjugation.

The third function incorporates those participants presenting with symptoms of mental illness. This group of individuals endorsed Borderline, Self-Defeating, Depressive, Schizoid, Passive-Aggressive and Paranoid personality styles on the MCMI-III. Their schema included Failure to Achieve, Mistrust/Abuse, Social Isolation and Vulnerability to Harm.

In summary, the Canonical correlation analysis revealed three personality styles which relate to clusters of Early Maladaptive Schema. These three styles were identified within a group of 58 inpatients with a mixture of mental illness and personality disorder diagnoses. Although the interpretation of the analysis is largely qualitative, the findings provide evidence of specific associations between EMS and personality styles as endorsed by patient self-report and as measured by the MCMI-III.
4. DISCUSSION

This study aimed to assess the reliability and validity of Young & Brown's (1994) Schema Questionnaire -Short Form. It applied similar procedures to those applied by Schmidt et al (1995) in their earlier evaluation of the Long Form of the questionnaire. The study's findings are discussed in terms of the questionnaire's psychometric properties, its utility in the assessment of Early Maladaptive Schema (EMS) and the evidence it presents to support Young's EMS theory of personality disorders. Starting with the initial six hypotheses (H₁ - H₆), the results are then considered in terms of the environment in which this study was conducted (a maximum security hospital) and the possible limitations of the self-report methodology for the assessment of schemas in an inpatient offender population.

4.1 PSYCHOMETRIC PROPERTIES

Consistent with earlier preliminary findings (Minchin, 1999), all 15 scales of the schema questionnaire were found to display adequate internal consistency as measured by Cronbach's Alpha (average α = 0.86). However the subsequent Principal Components Analysis (PCA) and inter-scale correlations indicated a great deal of overlap between the scales, with only eight of the 15 scales being identified as distinct by the PCA. The latter finding is not consistent with the findings of Schmidt et al's second study. Using a clinical sample of outpatients, Schmidt et al found that the same 15 schema scales, on the long form of the questionnaire, emerged as reasonably distinct. This difference is surprising as the items on the short form are taken directly from the long form version of the questionnaire. However the sample size in both studies is small and therefore both sets of analyses should be considered exploratory.

Although high inter-scale correlations may indicate that two scales are measuring a unitary construct, the inter-scale correlations found in this study could also reflect the co-presentation of EMS. For example, Functional Dependence and Failure to Achieve were significantly correlated (r = 0.72) and both these schema are theorised to be
within the same schema domain (impaired autonomy & performance; Young, 1998), suggesting they are both from similar childhood origins.

The results support the internal consistency of the scales (H1) but question the construct validity of the seven scales not identified as discrete (H2). Due to the exploratory nature of the analysis, these findings do not preclude the inclusion of these seven scales in future analyses.

4.2 DIFFERENCES BETWEEN PARTICIPANT GROUPS ON THE SCHEMA QUESTIONNAIRE

Due to the comparative severity of the mental health difficulties of forensic inpatients treated in a NHS maximum security hospital (Taylor, Leese, Williams, Butwell, Daly & Larkin, 1998) and the significant damage this population has often experienced in childhood environments (e.g. elevated rates of childhood sexual abuse, neglect and institutional care; Taylor, 1997), it was hypothesised that the inpatients would score higher on the schema scales than the Waiting List (WL) group. Additionally, in line with Young's theory, it was hypothesised that the Personality Disorder (PD) group would score higher than the Mental Illness (MI) group. However, the three groups only differed significantly on four scales (Vulnerability to Harm, Enmeshment, Self-sacrifice and Unrelenting Standards). On these scales the average group scores were in the opposite direction to that predicted, that is, the WL group scored higher than the MI group which scored higher than the PD group. The PD group average score was greater than both the MI and WL group on two scales (Emotional Deprivation and Defectiveness / Shame) but the between group differences were non-significant. With the exception of the Enmeshment scale, the schema scale scores of the MI and PD groups did not significantly differ. In summary, the participants diagnosed as having a personality disorder did not score significantly higher than those diagnosed as having a mental illness (H3) and the maximum security inpatient sample did not score significantly higher than those in the WL comparison group (H4).
The lack of significant difference between the two inpatient samples (MI & PD) may be due to the co-morbidity of presenting difficulties between the two groups. Although the two groups were analysed as two independent groups, some research indicates an overlap between the two groups of mentally disordered offenders in terms of personality styles and presenting mental health difficulties (Jones et al, 1998; Coid, 1992; Blackburn et al, 1990). Even though patients with a reported dual MI and PD diagnosis were excluded from this study, the PD group may contain a sample of patients with undiagnosed mental illness and perhaps more likely, the MI group may contain some patients with a co-morbid personality disorder (since chronic schizophrenia can have a disabling impact on social and interpersonal functioning; e.g. Hall, 1989). This could also apply to participants within the WL group. The potential for overlap between the participant groups was the rational for including an additional measure of psychopathology (the MCMI-III; see section 4.3).

The elevated scores of the WL group compared with both the MI and PD groups were not in the predicted direction. There are a number of possible explanations for this finding. Firstly, although the three participant groups did not differ significantly in age, the WL group contained a higher proportion of females compared to the two hospital groups. It is possible that that the differences between the WL and inpatient groups were due to gender effects. However, sex differences were not the focus of the present study and the exploration of the role of gender in schema questionnaire responses requires a larger number of females than within the sample in this study.

Secondly, the level of reported distress, as assessed by the GHQ-28, differed significantly between the participant groups. The WL group participants recorded a significantly higher level of distress than the inpatient sample. According to Young’s EMS theory, the activation of schema leads to psychological distress (McGinn et al, 1995). If the GHQ scores represent a true reflection of the level of distress experienced by the participant groups, the WL group may have scored higher on the schema scales because the inpatient groups’ schema were not activated at the time of assessment.
Whereas the schema of those waiting for help were typically more activated. The GHQ results are discussed further in section 4.4.

Additionally there is the issue of the status of the PD and MI samples as inpatients detained within a maximum security hospital. Clinical assessment needs to take into account the context in which it is conducted (Megargee, 1995) and recent research has indicated that some patients in secure settings can appear more defensive in their approach to psychological assessment (Gudjonsson & Moore, 1999). The lower scores of the forensic inpatients may reflect a defensive bias which results in a depressed score profile.

The analyses conducted to assess inter-group schema scale differences (ANOVA) were bivariate and this ignored the possibility that differences between independent variables may be due to overlapping variance between the dependent variables. Participant’s responses to the schema questionnaire may have been confounded by overlapping variance between the schema scales. The previous PCA and inter-scale correlations demonstrated a high degree of overlap. Hence a Discriminant Function Analysis (DFA) was conducted. The DFA revealed one dimension along which the three groups significantly differed. Using this function, the Positive Predictive Power (PPP) of the questionnaire (to discriminate between the WL, MI & PD groups of this study) was 76.2% ($H_2$). This is greater than the average PPP of the MCMI personality scales (i.e. 63%; Davis et al, 1997).

This significant function ran along a dimension with Vulnerability to Harm at one extreme and Entitlement at the other. Interestingly, using this function, the PD and MI groups were relatively close together when compared with the WL group. This supports the possibility that there is considerable overlap between the two inpatient samples. Along this dimension, a number of the schema scales appear closely related in terms of discriminating between the participant groups. Figure 2 presents how the schema could be considered to present in clusters depending upon mental health diagnosis. The Emotional Inhibition, Defectiveness/Shame and Entitlement schema
present as discriminating the participants with PD diagnosis and the Emotional Deprivation and Abandonment schema scales present as being more closely linked to mental illness.

As Figure 2 illustrates, three schema scales were endorsed by both the MI and PD inpatient groups: Social Isolation, Failure to Achieve and Functional Dependence. This DFA is specific to the sample used within this study and further evaluation with a larger sample of people presenting with mental illness or a personality disorder is required before the link between these schema and the diagnostic groups can be established.

Additionally the DFA can not be interpreted without considering the context in which the three groups completed the schema questionnaire. Certain items on the questionnaire may not be pertinent to individuals who have spent, on average, the last five years in hospital. For example, at one end of the significant function identified by the DFA is the Vulnerability to Harm schema scale which is at the same end as the WL
group. This scale comprises five items including 'I worry I'll loose all my money and become destitute'. Inpatients may not endorse such an item because either they do not have any money to loose or their financial concerns are dealt with by a third party (e.g. their social worker) and they are generally protected from the consequences of financial destitution. Additionally being an inpatient for a substantial length of time may reduce fears concerning having a future home. Therefore schemas about this vulnerability may be less likely to be activated.

In summary the DFA has identified a function along which the three groups reliably differ ($H_3$). This function is specific to this particular sample of maximum security inpatients and individuals living in the community who have been referred for psychological help. Although differences between these two groups were not in the predicted direction (the WL group generally scored higher on the schema questionnaire than the inpatient sample), the DFA supports the hypothesis that there is a difference between these two groups in terms of responses to the schema questionnaire ($H_4$). Additionally it supports the suggestion (p246) that there may be a great deal of overlap between the two inpatient groups.

4.3 SCHEMA SCALES AND THE MCMI-III PERSONALITY SCALES

4.3.1 Personality And Schema Scale Correlations

Although all 14 MCMI personality scales significantly correlated with at least one schema scale ($H_6$), only three correlation coefficients exceed 0.70. The schizotypal severe personality scale significantly correlated with both the Social Isolation ($r = 0.71$) and the Vulnerability to Harm ($r = 0.73$) schema scales and the passive-aggressive personality scale significantly correlated with the Social Isolation schema scale ($r = 0.71$).
The schema and personality scale correlations found with this study's sample provide some support for the examples of EMS and personality disorder diagnoses provided by Young & Gluhoski (1996):

(I) Dependent personality disorder
Young & Gluhoski suggest the dependent personality disorder reflects schema maintenance in the impaired autonomy and performance domain. The schema within this domain, as measured by the schema questionnaire, are Failure to Achieve, Functional Dependence, Vulnerability to Harm and Enmeshment (Young, 1998; Young & Brown, 1994). All four of these schema scales positively correlated with the MCMI dependent personality scale, with the first three reaching significance (p<0.01).

(II) Avoidant personality disorder
Avoidant personality disorder is theorised to represent schema avoidance in the disconnection and rejection domain (Emotional Deprivation, Abandonment, Mistrust / Abuse, Social Isolation and Defectiveness / Shame; Young, 1998). Coon (1994) also suggests the inclusion of the Failure to Achieve schema. Although the correlations are relatively weak, all six schema scales significantly, positively correlated with the MCMI avoidant personality scale.

(III) Narcissistic personality disorder
Finally, Young & Gluhoski state that Narcissistic personality disorder is linked to the Entitlement schema, usually as compensation for defectiveness or emotional deprivation. In this study's sample, the MCMI narcissistic personality scale is negatively correlated with both the Defectiveness/Shame and Emotional Deprivation schema scales, and positively correlated with Entitlement scale.

The negative correlations are particularly relevant. Young's theory identifies three processes through which EMS survive: Maintenance, Avoidance & Compensation (Young, 1994). Schema Avoidance refers to the cognitive, behavioural and emotional strategies employed by the individuals which serve to avoid triggering a schema and
the related intense affect. Hence if an individual is using avoidance to avoid triggering their schema, it follows that they may not endorse questionnaire items related to their schema. Avoidance may also explain why the MCMI compulsive personality scale negatively correlated with the Insufficient Self-Control schema scale. This is a potential problem for all self-report assessment tools which aim to assess latent core beliefs. McGinn et al (1995) identify six parts to the assessment stage of Schema Focused Therapy (SFT) in which they complement the self-report approach (which includes the Schema Questionnaire, the Multimodal Life History Inventory and thought records, diaries and mood logs) with triggering schema and affect through imagery, dialogues, role-plays and observing patterns in the therapy relationship. Thus suggesting that self-report inventories alone are not sufficient to provide the identification of an individual's EMS. This raises the question of the validity of using any self-report assessment tool to assess schema in research participants.

Two of the schema scales (Enmeshment and Unrelenting Standards) did not significantly correlate with any of the personality scales. Earlier analyses had identified both these scales as having adequate internal consistency and both had been identified as discrete by the PCA. Additionally these scales comprised two of the four scales on which the three groups significantly differed. Millon acknowledges that certain personality scales are sensitive to the current affective state of a respondent (Millon & Davis, 1996) and this is evidenced, for example, by empirical findings which indicate the Depressive Personality Scale is related to measures of Axis I depressive symptomatology (Davis & Hays, 1997). Hence, in addition to the possibility that these schema were not activated at the time of assessment, the MCMI may also have inaccurately assessed the personality styles it is designed to measure.

In summary, all 14 MCMI personality scales significantly correlated with at least one schema scale and three achieved correlation coefficients above 0.7 (Hc). The correlations supported the three examples of personality disorder diagnoses provided by Young & Gluhoski (1996). The issue of schema avoidance resulting in lack of schema scale endorsement raises concern as to the reliability of using a self-report
questionnaire independently of additional assessment procedures (e.g. clinical interview, mood logs etc.).

4.3.2 Personality Styles and Schema Clusters

The bivariate inter-schema-scale correlations and personality-schema correlations suggest there may be a relationship between clusters of schema and personality styles. The EMS literature often refers to the presence of multiple schema (e.g. McGinn et al, 1995; Young, 1994) and in their guide to interpreting the MCMI-III, Choca & Van-Denburg (1997) recommend considering profiles of multiple personality scores rather than basing interpretations on individually elevated personality scales. This recommendation is consistent with previous findings which found both of the MCMI-III’s predecessors (the MCMI-I and the MCMI-II) over pathologise respondents when interpretations were based solely on elevations on individual personality scales (see Choca & Van Denburg, 1997; p103). Using canonical variation allowed the possible co-variation within the schema and personality scales to be incorporated in the analysis.

Empirical evaluation of the DSM diagnostic categories for personality disorders has generated limited support for their validity (Roth & Fonagy, 1996; Tyrer, 1992). Considering personality styles as co-presenting, is a move away from current psychiatric nosology and is consistent with Young’s focus on cognitive and personality styles (i.e. rigidity, avoidance and interpersonal difficulties; Young, 1994) The canonical correlation provides evidence of specific association between EMS and personality styles as endorsed by patient self-report and as measured by the MCMI-III (H7).

The first function appears to reveal an underlying latent trait of rigidity with participants obtaining low scores on the Avoidant and Schizoid scales, and high scores on the Compulsive, Histrionic and Narcissistic scales. This analysis is essentially qualitative but it appears that individuals presenting with latent traits of Avoidant and Schizoid personality styles are likely to have schema of Defectiveness/Shame. This
presentation is consistent with Young & Gluhoski's (1996) description of Avoidant personality disorder as having schema within the disconnection and rejection domain (which includes the Defectiveness/Shame schema). This domain is considered to arise from early experiences of a detached, unpredictable, rejecting family environment (Young, 1998). DSM considers there to be an increased prevalence of Schizophrenia or Schizotypal personality disorder in relatives of individuals with Schizoid personality disorder (APA, 1994). It is conceivable that having such relatives, especially if they are the primary care givers, will result in a family environment which generates and maintains the Defectiveness/Shame schema. As this analysis is purely exploratory in nature and is based on a sample of maximum security inpatients, further empirical evaluation of the relationship between the disconnection and rejection domain and the Schizoid and Avoidant personality styles is required.

The individuals presenting with Compulsive, Histrionic and Narcissistic personality styles are likely to hold the schema of Unrelenting Standards: the 'underlying belief that one must strive to meet very high internalised standards of behaviour and performance, usually to avoid criticism' (Young, 1998; p3). There are key similarities between this schema and MCMII descriptions of the Compulsive, Histrionic and Narcissistic personality styles which are based on the similarly named DSM-IV personality disorders. The Compulsive individual’s perfectionist ways are considered to be derived from a fear of social disapproval, the Histrionic individual’s need for repeated signs of acceptance and approval are theorised to underlie a lack of self-confidence and self-assurance and the Narcissistic individual is described as presenting with an egotistic self-involvement in which they believe themselves to be superior to others (Millon et al, 1994).

Using similar qualitative interpretation, the second function identified by the Canonical correlation, suggests that individual’s who present with a highly Dependent personality style (i.e. those who present with Passive-Dependent personality characteristics, Millon & Davis, 1996) are likely to have schema of Failure to Achieve, Abandonment, Enmeshment, Functional Dependence and Subjugation. Three of these schema (Failure
to Achieve, Enmeshment & Functional Dependence) are considered to be from the impaired autonomy and performance domain and it is this domain which Young & Gluhoski (1996) link with the dependent personality disorder. Hence the results of the canonical correlation support a link between the impaired autonomy and performance domain and dependent personality disorder.

The third function appears to centre around symptoms of severe mental disturbance, with this group of individuals endorsing the MCMI-III Borderline, Self-Defeating, Depressive, Schizoid, Passive-Aggressive and Paranoid personality styles. These were linked with the Failure to Achieve, Mistrust/Abuse, Social Isolation and Vulnerability to Harm schemas (as assessed by the canonical correlation). Young (1999) considered these four schemas to be the 'primary core schemas' which develop in very early childhood development.

In summary, the canonical correlation identified three personality styles within this study’s sample of 58 inpatients with a mixture of mental illness and personality disorder diagnoses. The analysis supports a link between presenting personality styles (as assessed by the MCMI-III) and Early Maladaptive Schema (as assessed by the Schema Questionnaire - Short Form) (H7).

4.4 CRITIQUE OF CURRENT STUDY

4.4.1 Sample characteristics
When considering the results of this study it is important to consider the impact of the known differences between and within the three participant groups. The recorded diagnoses of the personality disorder (PD) group supports the degree of heterogeneity often found within special hospital populations (e.g. Blackburn et al, 1990). It is noteworthy that 80% of the PD group either had multiple or ‘non-specific’ personality disorder diagnoses. However the hospital inpatient sample was not randomly selected and therefore might not be entirely representative of the population of Maximum Security inpatients. This is evidenced by the disproportionately large number of
patients of white ethnic background. Patients from ethnic minorities tend to be over-represented in clinical forensic populations (Cope & Ndegura, 1990) but are not over-represented in this study. Hence the results are very specific to the sample employed in this study.

In addition to the potential for contextual biases influencing the results of the in- and outpatient samples, the WL group contained substantially more females than the maximum security sample. As discussed in section 4.2, potential sex bias may have influenced the results of the WL comparison group. To date, there is no published analysis of potential gender effects on the schema questionnaire but sex bias has been indicated on earlier versions of the MCMI (Lindsay & Widiger, 1995). Schmidt et al's (1995) sample controlled for sex bias by having relatively even numbers of men and women. Future studies should also control for gender effect, although the comparatively small number of women in special hospitals may negate this possibility.

4.4.2 Choice of Measures: General Health

The GHQ was used to provide additional descriptive data on the study's sample. There are number of considerations to be taken into account when using this instrument with the long-stay inpatients which comprised this study's inpatient sample. Firstly the GHQ specifically asks participants to report how their health has been 'over the past few weeks' with responses such as 'no more than usual' or 'rather more than usual'. It may not accurately assess long-standing difficulties and therefore the inpatient scores may represent a number of false-negatives. Additionally, acutely unwell hospital patients were excluded from this study's sample and the lower GHQ score of the hospital sample may be due to waiting list (WL) group having more acute difficulties at the time of assessment. It is likely that the hospital sample represents the patients whose symptoms, at the time of assessment, were reasonably controlled within the hospital environment. Finally, the GHQ scores could represent a true reflection of the participants of each of the three sample groups, with the WL group experiencing greater distress at the time of assessment than both the inpatient samples.
4.4.3 Personality Assessment

The MCMI was analysed using raw scores. This was valid for the correlation analysis since correlations will remain constant over any linear transformation. However the majority of the studies which use the MCMI apply the base rate and debasement transformations described by Millon et al (1994). This limits the comparability of this study's results and those utilising the MCMI and will need to be taken into consideration in future studies. In order for the base rate scores to be used, appropriate normative data for English forensic patients needs to be developed, consistent with the recommendations of Millon & Millon (1997).

4.4.4 Reporting on the self

The current study assessed a self-report measure which was originally designed for use as part of the clinical assessment of people’s long-standing characterological difficulties (Young, 1990). Its use as a research tool results in the measure being used outside the context for which it was originally designed. The use of self-report inventories for assessing belief structures and as diagnostic tools for personality disorder has been frequently criticised. Self-report assumes people are able to reliably report on their psychological functioning (Lösel, 1998). However people with personality disorders may not have conscious access to their cognitions, affect and memories (Westen, 1997). Additionally high defensiveness (Gudjonsson & Moore, 1999) and low self-knowledge may compromise self-report tools and yield unreliable data (Westen, 1995).

Interview methodology may improve the reliability of personality disorder diagnosis and schema assessment. Often researchers do not have an in depth, long-standing clinical knowledge of individual participants and informant ratings can incorporate patterns in interpersonal behaviour over time, of which people are not necessarily aware and able to identify (Moore, 1999). However this form of assessment is even more labour intensive than the current study. Generally, the assessment of personality and schema is a tricky area and this study contributes by attempting to tackle these issues.
4.5 CONCLUSION

This study aimed to assess the psychometric properties of Young & Brown's (1994) schema questionnaire and assess Young's assertion that people with personality disorders have Early Maladaptive Schema (EMS). In terms of psychometric properties the results supported the internal consistency of the schema scales and found eight of the 15 scales to be reasonably distinct. In terms of Young's assertion that people with personality disorders have EMS, the three participant groups significantly differed on four of the schema scales but the PD group did not score significantly higher than the MI group and the inpatient sample did not score significantly higher than the WL comparison group. The discriminant function analysis revealed one dimension which significantly discriminated between the three groups and provided a positive predictive validity of over 76%. This dimension appeared to be related to the different contexts in which the inpatient and WL sample completed the questionnaire and supported previous research which indicates a great deal of overlap between the presenting personality difficulties of patients detained under the legal categories of Mental Illness and Psychopathic Disorder (e.g. Jones et al, 1998). The evidence for a strong relationship between individual schema and personality styles (as assessed by the MCMI-III) was weak but support was found for the examples of personality disorder schema presented by Young & Gluhoski (1996). The canonical correlation provided support for there being a link between clusters of schema and personality styles.

There is masses of scope for future research particularly in terms of developments in personality disorder assessment. This study has not supported the use of Young's schema questionnaire as a reliable, independent research tool for assessing schema in people with personality disorder diagnoses. The low scores of the PD group are not consistent with EMS theory and the association between beliefs and categorical groupings is unlikely to be consistent across different populations. However, the questionable research utility of the self-report questionnaire does not mean the schema questionnaire lacks clinical utility. Combined with additionally clinical assessment techniques, such as clinical interview, mood logs and life history questionnaires, the schema questionnaire may prove a beneficial component in the assessment and
treatment of people with long-standing characterological disorders. Most importantly, the schema-based model provides a rationale and foundation for clinical intervention, which sets it apart from purely diagnostic description.
REFERENCES


<table>
<thead>
<tr>
<th>Appendix One</th>
<th>Approval from Ethics Committee</th>
</tr>
</thead>
<tbody>
<tr>
<td>Appendix Two</td>
<td>Letter to Responsible Medical Officer (RMO)</td>
</tr>
<tr>
<td>Appendix Three</td>
<td>Patient Information Sheet</td>
</tr>
<tr>
<td>Appendix Four</td>
<td>Consent Form</td>
</tr>
<tr>
<td>Appendix Five</td>
<td>Principal Components Analysis: Pattern matrix</td>
</tr>
</tbody>
</table>
9 February 1999

Ms L Minchin  
Psychology Department  
Broadmoor Hospital  

Dear Ms Minchin

ASSESSING THE CONSTRUCT VALIDITY OF A PERSONALITY QUESTIONNAIRE

Thank you for your letter of 14 January 1999.

In the light of your response to the issues raised by the Ethics Committee I am happy to take Chairman's Action and approve your project.

The Committee wish to be kept informed of your progress and acceptance of your proposal has been given on the condition that our secretary, Mrs Mandy Whittingham, receives six monthly progress reports, together with a copy of your final findings. Any changes to the protocol made subsequent to this application must be notified to the secretary. If this project is not begun within two years then a resubmission will be necessary.

The Committee will be advised of this action at the next meeting to be held on 15 February 1999.

Yours sincerely,

The Reverend Dr Peter Goold  
Chairman  
Ethics Committee
Appendix Two
Letter to RMO requesting permission to approach named patients

Dear Dr. (RMO),

I am currently recruiting patients within Broadmoor Hospital to help in a questionnaire based study assessing the validity of a personality assessment tool. I am writing to request your permission to approach a number of patients currently under your supervision. The project has been studied by the research and ethics committee members who have given their permission for it to proceed.

Background to the study
Schema Focused Therapy (Young, 1994) is designed to treat people with personality disorder. It is based on the premise that people with personality disorder have cognitive structures entitled ‘Early Maladaptive Schema’ (EMS). The Schema questionnaire was designed to assess the presence of EMS. However, to date, the validity of this questionnaire has not been assessed using a clinical population.

Patient Involvement
With your permission I will contact the patients in person to explain the purpose of the study and what their participation will involve. If they consent, I will make an appointment to see them and ask them to complete three questionnaires (Young's Schema Questionnaire, the General Health Questionnaire-28 and the Millon Clinical Multiaxial Inventory-III). With breaks, this will take a maximum of two hours. None of the questions within the questionnaires are threatening or outside the clinical range normally presented to patients with mental health difficulties.

I would be grateful if you could return the enclosed list stating whether it would be appropriate for the named patients to be approached. The patients on the list have been selected because our records show they do not have a dual personality disorder and mental illness diagnosis. If our information is incorrect I would be grateful if you would notify us to the contrary.

Please do not hesitate to contact either of us if you have any queries or concerns regarding this study. Copies of the research protocol and questionnaires are available on request. For your information I have enclosed a copy of the patient information sheet.

I thank you in advance for your help and look forward to hearing from you.

Yours sincerely

Louise Minchin
Psychologist in Clinical Training
Main Researcher

Estelle Moore
Principle Clinical Psychologist
Research Supervisor
Appendix Three
Patient Information Sheet

Investigation into the validity of a personality questionnaire
INFORMATION SHEET

What Is This Study About?
This study is interested in a questionnaire designed to look at factors which may be important in the development of people's personality. It is a questionnaire which was developed in the United States of America in the early 1990's and to date, little information has been collected in Great Britain. Once the study has been completed, we will be able to identify whether the questionnaire is a potentially useful measure and therefore of use in the assessment and treatment of future clients.

What Will Happen During The Study?
I am asking for approximately two hours of you time. If you agree to participate I will make an appointment to come and visit you on the ward. During this appointment I will ask you to complete three questionnaires. After this I will not need to contact you again.

What Will Happen To Your Questionnaires?
The questionnaires you complete will be for research purposes only. However, if you wish, they can be placed in your medical records and therefore you will be able to see them if you wish. If you so not wish them to be placed in your file they will be destroyed once the study has finished.

Refusal To Participate/Withdrawal From The Study
Participation in this study is completely voluntary. You may withdraw from the study at any time. Not participating or withdrawing from the study will not affect your future treatment in any way.

Your participation in this study will be gratefully received and I thank you in advance for your help

This project has been studied by the research and ethics committee members, who have given their permission for it to proceed. If you have any queries or concerns please do not hesitate to either contact me; Louise Minchin, Psychologist in clinical training, Broadmoor Hospital, ext. **** or Estelle Moore, Principle Clinical Psychologist, Broadmoor Hospital, ext. ****
Appendix Four

Consent form for Broadmoor patients

Broadmoor Hospital

CONSENT FORM

Investigation into the validity of a personality questionnaire

I have read and understood the client information sheet which describes this research and I have been given a copy of this to keep.

I am aware that in participating, I will be asked to spend approximately two hours with Louise Minchin and I will be asked to complete three questionnaires. I understand that my answers will be treated as confidential but if I wish, the information I provide can be held in my medical record and therefore I can have access to it if I wish.

I understand that I am entering this project of my own free will, that I may withdraw from this study at any time without necessarily giving any reasons, and that the future management of my care will not be affected.

Signed: __________________________________________

Print Name: ________________________________________

Date: ______________________________________________

Witnessed by: _______________________________________

Print Name: ________________________________________

Date: ______________________________________________
Appendix Five
Principal Component Analysis: Pattern Matrix

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