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THE RESPONSES OF STAFF TOWARDS PEOPLE WITH MILD TO MODERATE INTELLECTUAL DISABILITIES WHO ENGAGE IN AGGRESSIVE BEHAVIOUR: A COGNITIVE EMOTIONAL ANALYSIS.

&

RESEARCH PORTFOLIO

PART ONE

Lilian K. Wanless M.A. (Hons)

Submitted in partial fulfilment towards the degree of Doctorate in Clinical Psychology, Department of Psychological Medicine, Faculty of Medicine, University of Glasgow.

August 2000
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ACKNOWLEDGEMENTS

I would like to thank Dr Andrew Jahoda for his time, encouragement, and supervision over the past two years. I would like to give thanks to my classmates for their friendship, support, and willingness to go out and drink beer. In conclusion, a big thanks go to Chris for his unfailing support, and patience over the last three years.
1. SMALL SCALE SERVICE EVALUATION PROJECT

Is there a need for psychological intervention within a physiotherapy programme for back pain? A service evaluation.

Lilian K. Wanless
Department of Psychological Medicine, University of Glasgow

Prepared in accordance with the submission guidelines for Disability and Rehabilitation (Appendix 1.1).
Is there a need for psychological intervention within a physiotherapy programme for back pain? A service evaluation.

Lilian K. Wanless
Department of Psychological Medicine, University of Glasgow

Address for reprints: Lilian K. Wanless, Department of Psychological Medicine, Gartnavel Royal Hospital, 1055 Great Western Road, Glasgow, G12 0XH; Tel: 0141 211 3920, Fax: 0141 357 4899
SUMMARY

This study investigated the need for psychological intervention in a physiotherapy programme for individuals with chronic back pain. The sample population comprised of all initial attendees of two “Back to Fitness” programmes (n=23). All attendees were asked to complete a self report questionnaire, prior to commencing, and on completion of the programme. Questions pertained to demographic details, mood, and pain. 39% (n=9) of attendees did not complete the programme, and due to the small number of subjects, all data were examined descriptively. It was identified that a broad range of people accessed the programme, and within this group there was considerable psychological distress. Attending the programme had a beneficial effect on a number of the pain variables; including perceptions of pain, and interference of pain with daily life, but there was little impact on psychological morbidity. Suggestions were then made regarding how to deliver psychological intervention to the programme.

Key Words: Back pain; psychological intervention; mood
INTRODUCTION

Chronic back pain is a health care problem of considerable proportions. It is estimated that 60% of adults will experience low back pain during a given year, and of these, 30% will seek treatment [1,2]. Although only a minority of 3-4% will become cases of chronic pain and accompanying disability [3], the implications for the provision and cost of treatment are substantial [4].

It is now widely accepted that pain is a personal experience influenced by a variety of psychological factors. Mood, cognitive appraisal, self efficacy, perceived control, and prior learning history have been shown to influence reports and experience of pain [5]. Although psychological factors rarely cause the pain, they can trigger and exacerbate a pain episode, and contribute to the distress and disability often associated with chronic pain conditions [6].

The Victoria Infirmary, Glasgow, offers a six week “Back to Fitness” programme for individuals with chronic back pain, based in the physiotherapy department. The programme provides information on back pain, and an exercise programme. The aim is to encourage patients to increase fitness levels, and back strength. The current programme primarily addresses the physical rehabilitation of pain, and staff running the group are concerned that this is not fully meeting the needs of patients.

Studies have indicated that people suffering from chronic pain experience a variety of associated phenomena which may include anxiety, depression, social difficulties, and general problems coping with pain [7,8]. As such it is vital that suffers of chronic pain
receive a full and comprehensive treatment that meets both physical and psychological needs. There is a growing body of evidence supporting the efficacy of psychological interventions with chronic pain patients, often delivered as part of a multidisciplinary package [9]. Accordingly this study was set up to assess the need for psychological intervention in the Back to Fitness programme.

AIM OF STUDY

To carry out an audit of a physiotherapy led chronic back pain programme to determine the need for psychological intervention.

Questions addressed:

1. *What are the main characteristics of people accessing the Back to Fitness programme?*
   
i) What are the demographic characteristics of service users?
   
ii) What is the nature and extent of psychological morbidity within the group?
   
iii) “Pain” Profile:
     
     - What are service users perceptions of their pain?
     
     - To what extent does this impact on their daily life?

2. *Does the Back to Fitness programme have an impact on psychological morbidity, and the pain profile variables?*

3. *Does the service match client aspirations?*
METHOD

Subjects
The study population comprised of a survey of all initial attendees of two consecutive Back to Fitness programmes. Participants were referred to the programme by their GP or physiotherapist. The only entry criteria for the group was the presence of back pain.

Procedure
Subjects were administered with questionnaires prior to commencing the first session of the programme (Appendix 1.2), and immediately on finishing the last session (Appendix 1.3). The author remained present throughout to deal with any queries subjects had.

Measures
Two forms of questionnaire were drawn up, for pre and post administration. Information regarding demographic, back pain and psychological variables was sought:

i) Demographic Information:
   Name, age, sex, marital status, employment status

ii) Psychological Morbidity
    Hospital Anxiety and Depression Scale (HADS, Zigmond and Snaith, 1983)

iii) Pain Profile
• Current level of pain (from McGill Pain Questionnaire, Melzack 1975)
• Perceived control over pain (from Pain Coping Strategies Questionnaire, Rosenthal & Keefe, 1983).
• Effect of pain on every day activities (from the Nottingham Health Profile, Hunt et al., 1989).

iv) Aspirations of the Back to Fitness Programme

What benefits do users want from the programme?
What benefits do users report on completing the programme?

RESULTS

Service User Characteristics

The service user profile was based upon all initial attendees of the programme (n = 23). However, there was an unexpectedly high rate of non completion, with 39% of initial attendees dropping out of the programme, an issue which will be looked at.

Demographic Characteristics

14 male subjects, and 9 female subjects were surveyed as initial attendees of the Back to Fitness programme. The average age of participants was 44.1 years (SD = 12.1). What is perhaps somewhat surprising, is the age range of participants (Figure 1), with people aged from 27 up to 70 years, attending the programme.
52% of participants were in full employment, with a large minority (22%) currently absent due to ill health (Figure 2). The majority were married (65%; Figure 3), while 22% were single. Overall, a broad range of people were accessing the service.

**Psychological Morbidity**

The extent of psychological distress in the study population was assessed using the HADS (Figure 4). The percentage of subjects scoring in the moderate to severe categories was low. However, 35% of subjects reached borderline criteria for anxiety, whilst 26% reached borderline for depression. In total, 57% of attendees had some degree of clinically significant anxiety, and 43% depression. Thus a substantial proportion of subjects were experiencing symptoms of psychological distress.
Pain Profile

Perceptions of pain:
Subjects were asked to rate the level of intensity of pain they experienced on a scale of 1 (mild) to 5 (excruciating). Overall, the perceived intensity of pain was low; 65% of subjects gave their pain a rating of 2 (discomforting; Figure 5). Control over pain was rated from 0 (no control) to 6 (complete control). Nearly 50% of subjects reported some control over pain (Figure 6). However, 30% of subjects rated control as 2 or lower, indicating a proportion of subjects experienced little control over their pain.

Insert Figures 5 & 6 about here

Interference of pain in daily life:
The key areas of daily life in which back pain was causing disruption were; work, domestic tasks, and for over 90% of subjects, hobbies (Figure 7). Overall it would appear that the experience of pain was causing considerable disruption in almost all areas of life.

Insert Figure 7 about here
Pre/Post Comparison of Psychological and Pain Variables

Pre/post comparison of the impact of the back pain group was carried out on all subjects who completed the programme (n=14).

Psychological Morbidity

At the end of the programme there was a higher percentage of subjects falling into the normal category for both anxiety and depression; both showing an increase of around 12% (Figure 8). The percentage of subjects scoring as borderline anxiety dropped from 36% to 14%, while the percentage scoring as borderline for depression also fell. While these differences are small, they do indicate that participation in the programme had, if anything, a positive effect on psychological well-being.

Pain Profile

Perceptions of pain:

Attending the back programme had a positive effect on perceptions of pain (Figure 9). 43% of subjects on finishing the programme report pain of mild intensity, compared with only 14% prior to starting. At the end of the programme no subjects
rated their pain as horrible or excruciating. Similarly, there was a positive increase in perceptions of control over pain (Figure 10) the improvement is not so marked as for level of pain, a higher percentage of subjects rated control at 4, as opposed to 3 on completing the programme.

Insert Figures 9 & 10 about here

Interference with daily life:
On completing the programme fewer subjects indicated interference with work or hobbies (Figure 11), the two main areas of disruption. Overall, subjects reported less interference, indicating the programme had a positive impact on the quality of attendees life.

Insert Figure 11 about here

Aspirations of Back to Fitness Programme

On commencing the back pain programme subjects were asked to indicate what they would like to get out of attending the programme. Subjects were able to tick more than one category. While 43% indicated they were unsure what to expect, the
majority wanted to receive information regarding back pain (71%), exercises (86%) and an increase in fitness (79%; Figure 12).

On completion of the programme subjects were asked what they felt they had gained from attending the programme. The main areas of reported benefit were getting information about back pain, instruction in exercise, and improved fitness. As these were the main areas in which subjects wished to benefit it can be concluded that client aspirations of the programme were met.

Non Completers of the Back to Fitness Programme

Overall, very few differences were revealed between those who completed the programme (C), and those who did not (NC). There was no difference between C and NC with respect to demographic characteristics, psychological status, or intensity of pain. The two main areas of differences were: control over pain, and interference of pain in daily life. 89% of NC rated control over pain as 3 (some control), compared with only 57% of C who gave control a rating of 3 or above. This creates the impression that NC had more control their over pain. However, NC indicated higher rates of pain interfering in their daily life than did C. Thus, findings regarding those who drop out from the group are somewhat equivocal, with no clear differences emerging.
Summary of Results

A wide age range clients accessed the service. Within this group most reported some control over pain, and the intensity of reported pain was quite low. The level of psychological morbidity in the group was quite high, and back pain was causing considerable disruption to daily life. Attendees who completed the programme reported lower pain intensity at the end of the programme, compared to when they started. They also indicated a slight increase in perceived control over pain, and less interference with daily life. Participation in the group had only a slight impact on psychological morbidity. The findings regarding C and NC were mixed; NC reported higher levels of control over pain, but also increased interference from pain in their daily life.

DISCUSSION

The study posed three specific questions which are examined in turn; with respect to the results obtained, and regarding the implications for psychological intervention with the Back to Fitness programme

1. What type of people are accessing the Back to Fitness programme?

The results obtained in the course of this audit indicate a broad range of people are attending the Back to Fitness programme. Users range in age from 20 years, right up to 70 years. While service users were characterised by relatively low levels of pain,
back pain was causing considerable interference with daily life. Furthermore, there was considerable variation among attendees, with some individuals presenting with a far more disabled profile than others. These findings, coupled with high rates of psychological symptoms, suggest a need for psychological input to the programme.

Of those who dropped out of the programme, no clear differences emerged between C and NC. Non completers perceived themselves as having a higher level of control than did completers, but reported higher levels of pain interfering in various areas of their life. Given the small numbers involved, it is difficult to draw conclusions from these findings. A possible explanation for the high drop out rates may be the broad variety of people accessing the service, which make it difficult to devise a programme that meets the needs of everyone. A potential solution might be to target a more specific back pain population.

2. What is the effect of attending the Back to Fitness programme on service users psychological status, and pain profile?

Attending the programme appears to have had a positive impact on clients. Pre / post measures indicated lower levels of pain, increased control, and an improved quality of life at the end of the programme. However, there was only a small impact on psychological morbidity; with a large proportion of subjects still experiencing symptoms of psychological distress.

So do these findings imply that there is a need for psychological intervention, over and above the treatment already being provided? The answer to this question would
have to be yes. The results highlight three specific areas of concern: 1) a substantial proportion of clients were still experiencing symptoms of psychological distress at the end of the programme; 2) A number of these clients reach criteria for severe anxiety and/or depression; 3) there is a minority of subjects reporting pain of severe intensity, and marked interference in daily life, a population likely to be at risk of coping and adjustment difficulties [10].

3. Are client aspirations of the back programme met?

On completing the programme, a high percentage of subjects indicated benefit on a variety of dimensions, and desired outcomes were met. Thus the Back to Fitness programme appears to successfully meet client aspirations of the programme.

The need for psychological intervention

From these findings it is clear that the Back to Fitness programme is providing a quality service which is largely meeting the needs of service users. However, the results also indicate there is still a need for psychological input. The next question is of course; how best to provide such a service? While there is clear evidence for the efficacy of specific group based psychological interventions for sufferers of back pain, such as cognitive therapy [11], and cognitive behavioural therapy [12, 13], it is unlikely that resources would available for such a service. If this is indeed the case, alternative options might include:
1) Provision of psychological input at a consultative level: including training in principles of psychological management of pain; and in the detection of psychological distress, to physiotherapy staff running the group.

2) Have one session taken by a psychologist. This would allow education on effective pain management, and adaptive coping strategies. This option could be viewed as a brief intervention strategy targeting those at risk of developing problems. Again, with appropriate training and support, this is something that could then be taken over by the staff running the group.

3) A screening process, using an instrument such as the HADS, could be used to detect cases of severe distress and disability, which could then be referred on for individual therapy.

There are several weakness in this study. The first of these is the small sample size. Not only does this limit the generalisation of findings, but as a result descriptive statistics were the only method of data analysis employed. Due to the high drop out rate, numbers were insufficient to allow the employment of non-parametric tests. This meant the statistical significance of results could not be assessed. However, clinically significant gains did appear to be demonstrated. A second area for concern was the lack of findings regarding the characteristics of those who did not complete the group. Again, the relatively small numbers obtained made the drawing of any conclusions regarding this population difficult. In order to provide a service that best meets the needs of users, this is an area that will require attention in future service audits of this kind.
Despite these limitations, this study does answer important local questions. Furthermore, although set up as an audit of a very specific service, the study has broader implications. Consistent with the literature[10, 14], it highlights that sufferers of chronic back pain do experience significant levels of psychological distress. While there is a large body of evidence supporting the role of psychological interventions with such a population [9], there are a lack of guidelines in the literature on different ways to implement such a service. This study considered several options. However, further research is necessary to determine how best to provide psychological intervention to suffers of chronic back pain, and at what level this intervention should take place.

CONCLUSIONS

This study posed the question “Is there a need for psychological intervention in a physiotherapy led back pain programme?”. The results indicated that indeed there was such a need. While attending the programme had a beneficial effect on perceptions of pain, and interference with daily life, there was only a small impact on psychological morbidity. Several options were presented on how to provide such a psychological service. However, the lack of literature to guide such decisions was highlighted, and a call for more research in this area was made.

Acknowledgements

I would like to thank the physiotherapy staff at the Victoria Infirmary, in particular Stella Howden, for their help and support in the collection of data for this audit.
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Figure 1: Age Distribution

![Age Distribution](image)

Figure 2: Employment Status

![Employment Status](image)

Figure 3: Marital Status

![Marital Status](image)

Figure 4: Psychological Morbidity

![Psychological Morbidity](image)
Figure 5:

### Pain Level

- **Mid**: 20%
- **Discomforting**: 60%
- **Distracting**: 0%
- **Horrible**: 0%
- **Excruciating**: 20%

Figure 6:

### Control Over Pain

- **Amount of Control**
  - 0 = no control
  - 6 = complete control

Figure 7:

### Areas of life in which pain causes interference

- **Job**: 80%
- **Domestic**: 60%
- **Social**: 40%
- **Hobbies**: 100%
- **Sex Life**: 60%
- **Home - 7%**: 40%
- **Holidays**: 20%
Figure 8: Psychological Morbidity (Pre / Post Comparison)

Figure 8: Psychological Morbidity (Pre / Post Comparison)

HADS Anxiety Rating: Pre/Post Comparison

HADS Depression Rating: Pre/Post Comparison

Figure 9:

Level of Pain: Pre/Post Comparison

Figure 10:

Control Over Pain: Pre/Post Comparison
Figure 11

Interference of Pain in Daily Life: Pre/Post Comparison

% of Subjects

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Figure 12 Aspirations of the Back to Fitness Programme

Desired/Reported Benefits of Programme

% of Subjects

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2. MAJOR PROJECT LITERATURE REVIEW

The responses of staff towards people with intellectual disabilities who engage in challenging behaviour: from a behavioural to a cognitive behavioural analysis.

Lilian K. Wanless
Department of Psychological Medicine, University of Glasgow

Prepared in accordance with guidelines for submission Journal of Applied Research into Intellectual Disability (Appendix 2.1).
The responses of staff towards people with intellectual disabilities who engage in challenging behaviour: from a behavioural to a cognitive behavioural analysis.

Lilian K. Wanless

Department of Psychological Medicine, University of Glasgow

Address for reprints: Lilian K. Wanless, Department of Psychological Medicine, Gartnavel Royal Hospital, 1055 Great Western Road, Glasgow, G12 0XH; Tel: 0141 211 3920, Fax: 0141 357 4899
ABSTRACT

Research suggests that the behaviour of staff towards people with intellectual disabilities who engage in challenging behaviour can play a significant role in the development and maintenance of such behaviour. As a consequence there has been a steady growth in literature which seeks to identify the factors which influence the responses staff make to challenging behaviour. Studies to date have been carried out from a behavioural, and more recently a cognitive behavioural perspective. Significant advances in developing models of staff behaviour have been achieved; in particular the beliefs held by staff, and the emotional impact of challenging behaviour, have been identified as important sources of influence. Existing research has focused on the immediate interpersonal context surrounding challenging behaviours. However, it is suggested that there has been a tendency to overlook the individual who engages in the behaviour, and their relationship with staff. As such, this paper aims to critically review the existing literature, and suggests how such research might be further developed.

Key words: staff behaviour, challenging behaviour, attributions, emotions
INTRODUCTION

Studies investigating staff behaviour in services for people with intellectual disabilities and challenging behaviour (CB) have been subject to a number of reviews. In general, a rather bleak picture is painted. It has been identified that staff spend little time interacting with service users, and that the quality of such interactions are poor (e.g. Woods & Cullen 1983; Repp et al. 1987; Hastings & Remington 1994a). Social contact between staff and client most often comprises personal care, or staff directing clients (Clegg et al. 1991; McConkey et al. 1999). With respect to staff behaviour towards individuals who engage in CB, similarly poor patterns of interaction have been identified, however the suggestion is that individuals with the most CB tend to lead the most impoverished social lives (Felce et al. 1995).

Research investigating interactions between staff and service users emphasises the significant role staff can play in the development and maintenance of CB (Hastings & Remington 1994a). Observational, experimental, and self report studies of responses to CB have identified that staff often act in a manner that serves to reinforce the behaviour displayed (e.g. Carr et al. 1991; Taylor & Carr 1992; Hastings & Remington 1994b). Organisational strategies targeting such responses have provided staff with extra training, or formal behavioural management programmes to use with clients. However, staff training can fail to take account of the reasons underlying staff behaviour (Hastings & Remington 1994b; Hastings et al. 1995a), while barriers preventing effective implementation of behavioural programmes remain (Emerson & Emerson 1987; Hastings & Remington 1993). Examples of such barriers might
include constraints on staff time, a lack of staff belief in the efficacy of a programme, or failure to co-ordinate a programme across a staff team. Reaching a more sophisticated understanding of staff performance offers the potential to develop enhanced models for working with staff, by overcoming some of these barriers to effective care.

The primary conceptual framework which seeks to understand the responses of staff to CB is the behavioural model (Hatton & Emerson 1995). From this perspective a substantial proportion of challenging behaviours (CBs) are suggested as serving a social function, such as attention seeking, or attention avoidance (Carr 1977; Carr & Durand 1985). As such, the actions of significant others, especially caregivers, are likely to constitute the antecedents and consequences of a large proportion of such CB (Hastings 1997). Accordingly behavioural models of CB have expanded to account for the actions of staff, and the principles of behaviour analysis have been applied to the relationship between staff behaviour and CB (Hastings & Remington 1994b). Recently this model has been developed to include a cognitive behavioural perspective, which explores the beliefs and emotions evoked by CB, and the impact of these on staff performance (Kushlick et al. 1997). Central to this account are the appraisals staff make when faced with CB, and the potential these have to influence staff behaviour.

Behavioural and cognitive behavioural models have developed from a focus on the immediate interpersonal context surrounding CB. From a behavioural perspective this interpersonal context is expressed in terms of staff behaviour comprising the antecedent or consequence to much CB. From the cognitive behavioural viewpoint
interpersonal appraisals made by staff are viewed as central in predicting staff behaviour. There is a growing body of research in both these areas, resulting in considerable advances in the development of models of staff performance. It is the aim of this paper to review this progress. It shall also be suggested, however, that existing research has a tendency to overlook the individual who engages in the CB, and their relationship with staff. As such, the aims of this paper are as follows. First, to summarise the behavioural account of staff responses to CB. Second, to provide a critical analysis of studies investigating the determinants of staff responses to people with intellectual disabilities and CB. Third, to present recent developments carried out within a cognitive behavioural framework. In conclusion the implications from this review for future research and clinical practice shall be discussed.

THE BEHAVIOURAL PERSPECTIVE

From a behavioural perspective, staff behaviour is viewed as part of the environment surrounding CB; functioning as an antecedent and/ or consequence to CB, which in turn may contribute to the development and maintenance of the behaviour displayed (Hastings & Remington 1994a). The behaviours of staff and clients are considered to be part of a dynamic system in which the behaviours of both parties are reinforced (Carr et al. 1991; Taylor & Carr, 1992; Oliver 1995). For example, a client’s self injurious behaviour may have the function of securing staff attention, and if staff experience this behaviour as aversive, they will intervene as quickly as possible. This provides positive reinforcement for the CB, while staff behaviour is negatively reinforced by the termination of the aversive experience. This process of mutual
reinforcement serves to increase the likelihood of similar patterns of interaction in the future. According to such a view, staff behaviour can function as a means of avoiding or escaping the aversive nature of many CBs (Hall & Oliver 1992).

Hastings & Remington (1994b) provide a conceptual analysis of factors which might determine staff behaviour. In total, four main sources of influence are identified: i) contingencies associated with the CB itself (e.g. the emotional impact of the CB on staff); ii) staff's own beliefs about the causes of the behaviour, and how best to respond; iii) formal aspects of the service environment (e.g. policy and guidelines); and iv) informal aspects of the service culture (e.g. the unwritten rules of the workplace). These sources of influence are grouped into two categories: the contingencies associated with the CB itself; and indirect contingencies which take the form of internal "rules" which staff hold regarding CB. These rules represent verbal descriptions, or beliefs held by staff, of the consequences associated with CB. They can be learned from external sources (e.g. service documents, health professionals, or colleagues), or they can be self generated.

DETERMINANTS OF STAFF BEHAVIOUR

Recent research has started to examine the influence of rule-governed, and contingency-shaped, behaviour on staff responses to CB. In particular there has been an emphasis on the staff members' emotional reactions to CB, and their underlying beliefs about CB, as mediating factors which help to determine their behavioural responses.
The Emotional Impact of Challenging Behaviour

The negative emotions evoked by self injurious, aggressive, and stereotypical behaviour are increasingly recognised as potentially powerful sources of influence over how staff respond to such behaviour. Table 1 summarises the findings of the three studies to date which have investigated emotions generated by CB. Each study reported similar patterns of emotional responding to CB: annoyance and anger being the most common responses to aggression; with sadness and despair the most frequent reactions to self injury (Bromley & Emerson 1995; Hastings 1995; Hastings & Remington 1995).

| Insert Table 1 around here |

Despite variations in methodology between studies, the consistency of the results suggest that the findings are quite reliable. However, the validity of the results is more questionable. None of the studies determines the emotional response of staff to an actual person, or directly following an incident of CB. It is likely, therefore, that the strength of emotions reported are diluted. In addition, it is not possible to determine whether the relationship a staff member has with a client can moderate, or exacerbate, the negative emotions evoked. For example, if staff know a client well, and have a good relationship with that person, they might be less likely to react with
anger to an incident of aggression. To date, the literature has not addressed this question.

The studies described above refer to discrete instances of CB, however, an examination of the literature suggests that the impact of negative emotional reactions to CB extend beyond the interaction taking place. The most significant sources of stress reported by staff were the cumulative effects of coping with people’s behavioural difficulties (Bromley & Emerson 1995); the emotional impact of working with people presenting with CB (Hatton et al. 1995); and having no effective strategies in place for dealing with the behaviour (Bromley & Emerson 1995). Staff working in houses with residents who show CB have been found to be significantly more anxious, and report lower levels of job satisfaction, compared to staff working in houses where residents do not have ongoing behavioural difficulties (Jenkins et al. 1997). High staff stress, in turn, is associated with lower levels of staff - resident interaction (Jenkins & Allen 1998; Rose et al. 1998).

In general, stress is believed to have a significant effect on staff performance, including the quality of the interactions with clients. In turn, this affects the quality of service those with CB receive (Rose et al. 1994; Hatton & Emerson 1995; Hatton et al. 1999). Consequently it is clear that the emotional impact of CBs extends beyond the immediate interaction, to influence the behaviour of staff more generally. This is particularly relevant for community settings, in which resident characteristics, as opposed to organisational characteristics, are more often cited as a source of staff stress (Rose 1995).
Beliefs Regarding Challenging Behaviour

The verbal rules, or beliefs, staff hold regarding CB are suggested as exerting an extremely powerful influence over staff behaviour. These beliefs are also thought to be quite inflexible (Allen 1999). It is clear, therefore, that exploring the beliefs that lead to counterhabilitative behaviour in staff is an important area of study. In a recent review of the literature, Hastings (1997) identified three domains of beliefs which are thought to influence staff performance. First, staff beliefs about what constitutes CB (definitions) will help to determine which service users are perceived as challenging, and/or are referred on to specialist services (Lowe & Felce 1995; Lowe et al. 1995). Second, beliefs regarding the cause of CB are hypothesised to have an important effect in establishing how staff respond to CB (Hastings & Remington 1994a & b). And third, staff beliefs about what to do in the case of a given CB might affect not only their own response, but also their acceptance and implementation of treatment programmes drawn up to reduce CB (Emerson et al. 1993; Hastings & Remington 1994a; Bromley & Emerson 1995).

i) Staff Definitions of Challenging Behaviour

Generally, it has been found that definitions of CB given by staff are not consistent with definitions developed in the literature, or in service documents. These formal definitions of CB attempt to avoid a culture of blame; emphasising the potential of harm to self or others, and/or behaviour which prevents services being accessed (Emerson et al. 1987). However, staff definitions indicate a view that CBs are

Heymann et al. (1998), in a qualitative analysis of staffs' understanding of what constitutes CB, found respondents abstract definitions of CB to be vague; staff having difficulty in defining CB as a concept. Yet staff readily cited concrete illustrations of CB; including verbal or physical assault, non-compliance, and exposure to danger. Collectively, these results were taken to indicate the tendency of staff to locate CB within the service user. This is despite attempts to create definitions which place an emphasis on services meeting the needs of people with CB. The findings of Heymann et al. also suggest that staff definitions of CB are likely to be unreliable, requiring selection and value judgements. Thus it becomes important to understand what causes staff to define a particular incident (or person?) as challenging: is it the actions displayed; the consequences of the action; or the way the behaviour made staff feel?

**ii) Beliefs regarding the cause of CB**

Studies that investigate staff beliefs about causes of CB (Table 2) indicate a variety of attributions are made (Berryman et al. 1994; Bromley & Emerson 1995; Hastings 1995; Hastings et al. 1995b; Hastings et al. 1997). The most common beliefs reported were: social reinforcement (e.g. attention seeking), communication, and physical environment (e.g. noise, crowded area). Overall, it is suggested CBs are largely attributed to causes over which staff perceive themselves as having little
control, such as past environment, and internal psychological state (Bromley & Emerson 1995).

If CBs are seen to be caused by factors over which staff feel they have little control, it is likely this will affect staff morale, and consequently the quality of service people with CB receive (Bromley & Emerson 1995). In addition, Heymann et al. (1998) found that staff generally did not reference their own actions in explanations of an incident of CB. This is in obvious contrast to findings of literature which suggest staff have a significant role to play in the maintenance and development of CB (Hastings & Remington 1994a). If staff do not perceive themselves as having a role to play in service users' behaviour, this may contribute to resistance on their part towards staff training, and interventions which seek to modify staff behaviour (Dunne 1994). To date staff perceptions of their responsibility for a) contributing towards CB, and b) participating in interventions aimed at the alleviation of CB, have not been formally assessed in care staff (cf. Millar 1995).

In an examination of the causal attributions made by community residential care staff, Hastings et al. (1997) suggest that staff might come to form particular explanations regarding the causes of CB in three ways. First, general beliefs regarding CB may determine attributions made in a particular situation. Second, staff might make attributions on the basis of the information that is most readily available
in the situation, e.g. the type of behaviour displayed. Third, it is proposed that staff may attend to contextual information related to the event, i.e. take account of what is happening around the person. What is not included in this discussion is the role played by the person engaging in the behaviour. For example, staff attributions' may be based on a history of previous interactions with the person displaying the CB. Also, staff may form judgements on the basis of the person's reputation as a "challenging" individual. Furthermore, characteristics such as the severity of the person's disability may influence the attributions made (Fenwick 1995). Indeed knowledge of the person may well drive causal attributions made in a particular situation, independent of the circumstances at the time.

**iii) Beliefs regarding intervention behaviour**

Hastings and colleagues examined the intervention behaviour of staff, both in the immediate situation, and over a longer time course. Hastings (1995) identified a mismatch between the immediate responses to CB reported by staff, and their descriptions of how CB should be responded to in the long-term. On dealing with challenging behaviour in the here and now, staff described strategies which emphasised control and prevention of harm, despite the potentially reinforcing properties of such interventions. In the long term the problematic environments in which people with CB live were emphasised, a view more consistent with behavioural models of challenging behaviour. This suggests that lack of knowledge regarding how to respond to CB is not at the root of staff responses in the immediate situation, but rather staff are responding to sensible short term concerns regarding the safety of those in their care.
Investigation of staff explanations for their intervention strategies in institutional (Hastings 1996), and community (Watts et al. 1997) settings identified a similar pattern of results. A questionnaire format was used to ask staff about their immediate and long term intervention strategies for a fictitious young man's CB. Again staff descriptions of long term intervention strategies were largely consistent with the aims of psychological intervention. However, immediate strategies were similar to the counterhabilitative strategies identified in the earlier study; “relatively few staff indicated their immediate concern would be to understand the functions of the challenging behaviour” (Hastings 1996, p172). When asked to explain their choice of intervention strategy, the creation of a positive environment, and prevention of harm were the most significant considerations. These findings suggest a central conflict between the needs of staff, and professional understanding (Hastings 1996). The demands of dealing with the immediate situation outweigh theoretical considerations of what might be the optimal response to make.

Overall, work carried out within the behavioural paradigm represents a comprehensive body of work, which systematically investigates determinants of staff performance. This work has focused primarily on the setting conditions associated with CB, and staff reactions to such behaviour. Staff behaviour has typically been conceptualised as responding to contingencies associated with the behaviour: whether these contingencies are experienced directly, for example the emotional impact of the behaviour; or indirectly via the internal beliefs staff hold. What is not included in such an analysis are the appraisals that staff make about the behaviour, and the person they encounter. However, the interpretations people make are seen as
having a central role in predicting their emotional and behavioural responses to a situation (Heider 1958; Weiner 1980; 1986; Fiske & Taylor 1991).

THE COGNITIVE BEHAVIOURAL PERSPECTIVE

The cognitive behavioural perspective offers the potential to investigate the influence of interpersonal evaluations on the behaviour of staff. Furthermore, rather than treating emotion as a separate source of influence over behaviour, the complex relationship between the beliefs of staff and their emotional reactions to CB can be investigated. In particular it has been suggested that Weiner's attributional model of helping behaviour (Weiner 1980; 1986) is a useful framework in which to link the cognitive, emotional, and behavioural responses of staff to CB (Sharrock et al. 1990; Fenwick 1995; Allen 1999). This model proposes that attributions of stability (whether the cause of a behaviour is viewed as being the same each time) and controllability (whether the cause of a behaviour is seen as under the control of the person being observed) are the primary determinants of the emotional reactions of sympathy or anger. These emotions respectively promote or reduce the likelihood of helping behaviour. Thus if a person's CB is seen as under their control (e.g. they are 'seeking attention'), then Weiner's model would predict that staff would be more likely to react with anger, and less likely to help the person.

In a direct test of this model, Dagnan et al. (1998) asked 39 care staff to rate six scenarios describing different examples of CB. Responses were then summed across these measures and subjected to path analysis. Results were largely consistent with
Weiner's model; negative emotions were found to have a key role in predicting behaviour, however optimism regarding the potential for change in the behaviour was also found to be important. Specifically, staff's pessimism regarding the person's potential for change reduced their willingness to help. Pessimism, in turn, was most predicted by negative emotions, such as anger and disgust. The prime determinant of negative emotion was the staff member's attribution of the person's control over their behaviour.

Dagnan et al. (1998) also found a pattern of results that suggested when the person was perceived to be in control of their behaviour, they were held to blame, and person and behaviour were evaluated equally negatively. This is an interesting finding, yet staff perceptions of the person engaging in the CB have typically been overlooked in the existing research. There is a danger, however, that this finding is an artefact of the design. Staff are being asked to make evaluations of a person, however, the only information available in making this judgement is the person's behaviour. Therefore, it is perhaps not surprising that both are evaluated equally negatively. It would perhaps be more informative to explore this finding in relation to a person actually known to staff.

Overall, this study draws attention to a number of interesting interpersonal appraisals surrounding CB. However, the conclusions that can be drawn from Dagnan et al. are limited. Evaluations of the client engaging in CB are generated with respect to a hypothetical client. Furthermore, no account is taken of characteristics of the client which might influence the attributions staff make when faced with CB. However, Fenwick (1995, p.31) suggests "similar types of behaviour may be ... attributed to
different causal factors depending on the judged severity of the individual’s learning disability, resulting in differing emotional responses from staff”.

A recent study to examine the role of Weiner’s model of helping behaviour used expanded vignettes to investigate the influence of client factors on staff responses to CB (Stanley & Standen 2000). The interaction between behaviour topography (aggression, self injury, destructiveness) and level of functioning (dependent / independent) on attribution, emotion, optimism, and behaviour ratings was systematically examined. It was found that the more independent the client, and outer-directed the behaviour described, the greater the carers’ attributions of control and negative affect, and the less the likelihood of carers offering help. The more self directed the behaviour, and dependent the client described, the greater carers’ attributions of stability, positive affect, and likelihood of helping. These findings suggest that carers are more likely to perceive, and react to, aggressive and destructive behaviours negatively, compared to their responses to self injurious behaviours. Furthermore clients of ‘high ability’ tended to generate more negative responses in staff than clients of ‘low ability’.

These developments in the cognitive behavioural field represent a significant advance on a number of fronts. First, the studies carried out provide systematic exploration of the links between staff beliefs and their behaviour. Second, identification of variables which may potentially mediate between attitudes and behaviour enhances understanding of the factors influencing staff behaviour. Third, attention is focused on subjective and evaluative aspects of the interaction taking place. Fourth, the
studies draw attention to the characteristics of the individuals involved in the interaction, particularly the person displaying the CB.

Overall, the cognitive behavioural approach to understanding staff behaviour allows the specification, and testing, of cognitive behavioural interventions which might be effective in producing beneficial changes in staff behaviour (Kushlick et al. 1997). For example, when working with people who present with aggressive behaviour staff could be encouraged to explore their attributions of control regarding the behaviour. This may help reduce negative emotions such as frustration and anger, thereby promoting the likelihood of a more positive response to the client, and also carer well-being. However, as discussed in the following section, where these analyses fall short, is the reliance on vignettes as a means of gathering information about the cognitive and emotional responses of staff to CB.

**FUTURE RESEARCH**

In the course of this review it has been suggested that research has focused overly on the behaviour of staff and service users at the expense of the individuals involved. This is particularly true of the service user engaging in the CB. The literature typically refers to staff behaviour in response to CB; not staff responses to a person engaging in CB. Moreover, it has been identified that the emotional and cognitive responses of staff are frequently generated in response to hypothetical instances of CB. The person engaging in CB has been effectively partialled out of the research methodology. While the use of vignettes does offer greater stimulus control, their
external validity has yet to be proven. A further drawback of the use of vignettes, is the fact that they represent very general situations. As such, they will tap into very general beliefs held by staff. However, evidence suggests that general beliefs about a course of action actually have little correspondence to what people actually do in a given situation (Ajzen 1982).

A further difficulty in relying on vignettes is that they limit investigation into the effects of the client's characteristics on attribution formation; characteristics such as temperament, typical behaviours displayed, communication skills, interpersonal skills, and level of disability. It would also be interesting to look at the impact of specific diagnoses, such as autism, on staffs' cognitive and emotional responses to CB. More detailed research is required to determine what aspects of the client influence how staff respond to them, when they engage in CB: is it personality characteristics; behaviour characteristics; or disability-related characteristics that are important in determining how staff respond to incidents of CB?

Removing the person engaging in CB takes away a potentially rich source of information regarding factors which are likely to influence the judgements staff make. While vignettes are undoubtedly useful in the early stages of information gathering, and hypotheses testing, caution must be exercised so that research in the field of staff responses to CB does not become overly reliant on such methods. What is required now are: 1) controlled evaluation of the validity of vignettes as a means of accessing the beliefs, and emotional responses of staff; and 2) closer inspection of the impact of client characteristics on staff responses to CB. Furthermore, given the reliance on staff self-report it is vital to examine what drives the causal attributions
staff make when faced with CB, and the emotional and behavioural sequelae of these in vivo. Does what staff say actually correspond to what they do?

Existing research also overlooks the perspective of the staff member, as a person in a social interaction. Hastings (1996) rightly draws attention to the conflict between professional understanding and the practical necessities of coping with a difficult situation. What this conflict also highlights are the competing roles of staff responsible for the care of the person engaging in the CB. On one hand staff are expected to be part of the social network of people with intellectual disabilities, and to build relationships with those in their care. Indeed this a common measure of the quality of care provided (Hatton & Emerson 1995). On the other hand, staff have a professional role which requires boundaries, a certain amount of objectivity, and may involve the implementation of formal treatment programmes. If staff have built a relationship with an individual, it might be hard for them to ignore the strong emotions which can be evoked by CB, and act in an objective and 'habilitative' manner. It may be that in these circumstances it is difficult to ignore the personal element to the interaction, in favour of the professional approach. If this is the case, then helping staff explore the conflicts within their role could potentially form an important component of staff training programmes. Further exploration of staff perceptions of their own interpersonal roles within services is an area of research which could provide extremely useful information.

Following such an argument through to conclusion, it becomes apparent that the nature of the professional relationship between staff and client may well influence the reactions of staff towards people engaging in CB. To date, nearly all the research in
the area of staff behaviour is carried out with residential care staff, be it in a community or institutional setting. It is likely that care staff experience the largest conflicts between caring for the person with CB, and being a professional helper. Yet it would be informative to determine how staff in other settings or professions respond to CB, and to determine the impact of these different roles on the cognitive, emotional, and behavioural reactions to CB.

The issues raised within this review have more than theoretical relevance. In order to understand why staff act as they do it is important that studies employ ecologically sound methods of data collection. Once such measures have become established they can then be transported into clinical settings, to aid in the development of interventions aimed at promoting positive behaviours; in both staff and clients. Furthermore, it is important to understand which aspects of client behaviour contribute most to negative appraisals and emotional reactions in staff. This will allow specific strategies to be developed and implemented to help staff cope with what can be an inherently demanding occupation. This in turn should help promote positive interactions/relationships between staff and clients.

CONCLUSIONS

Hastings & Remington's (1994b) model of staff behaviour represents a significant advance compared with more traditional behavioural frameworks. By drawing attention to the internal, as well as external factors which can influence staff behaviour, the model moves beyond a mechanical description of staff behaviour
(Remington 1993), to a position of attempting to understand the motivation behind staff responses to CB. This model of staff behaviour has created a comprehensive framework in which a broad range of factors which impact upon staff behaviour can be systematically evaluated, and has also opened new avenues of investigation. The recent developments from a cognitive perspective have further enhanced models of staff behaviour by beginning to address the types of appraisals staff make, and the influence of these on emotional and behavioural responses to CB.

To build upon this base the scope of existing research requires to be broadened. Perhaps of most crucial importance is research which addresses factors which impact upon the ongoing relationship between staff and client. Given that CBs may persist through life (Emerson 1992), it is vital that even when these remain, opportunities for a high quality of life are still offered to people with CB. For this to happen, positive relationships with staff need to be maintained (Bromley & Emerson 1995), and areas of stress and difficulty which impact on this relationship identified. Perhaps then the negative patterns of interaction between staff and clients identified at the outset of this review can be overcome.
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- Likelihood to feel nothing, and were less likely to feel fear.
- Experienced staff feel challenging behaviour as less disturbing, were more likely to focus on other aspects.
- Less likely to evoke sadness, then
- Responses read using Likert scales.
- Questionnaire and questionnaires, staff, student.
- Emotions specifically experienced.
- Open ended questions, varying.
- Semi-structured interviews.
- Teachers' perceptions.
- Students' experiences.
- Emotions noted.
- Proportion of all staff group usually.
- Scales to indicate what.
- Questionnaires with closed ended.
- Questionnaires with open ended.

Hastings & Erimson (1999)

- Behavior.
- Severe learning disabilities and challenging.
- Care staff working in two units for people with
- Care staff in educational daytime and
- Behavioural services.
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<td>--------------</td>
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<tr>
<td>7-point Likert scale</td>
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<td>No apparent reason</td>
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Heathers, Hamilton & Hoppe (1999)

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Bromley & Emison (1999)

Table 2: Summary of studies investigating the beliefs of staff regarding the causes of challenging behaviour

See Beliefs of staff regarding the causes of challenging behaviour

Heathers, Hamilton & Hoppe (1999)
REFERENCES


3. MAJOR RESEARCH PROJECT PROPOSAL

Responses of day centre staff to challenging behaviour in adults with a learning disability

Applicants:

Lilian K. Wanless
Department of Psychological Medicine
Gartnavel Royal Hospital
1055 Great Western Road
Glasgow G12 0XH

Dr. Andrew Jahoda
Department of Psychological Medicine
Gartnavel Royal Hospital
1055 Great Western Road
Glasgow G12 0XH

Research proposal prepared in accordance with guidelines in the D.Clin.Psy. Handbook. Guidelines based on the application for a mini-project grant in Health Services Research (Appendix 3.1)
SUMMARY

There has been a steady growth in literature identifying factors that influence staff responses to challenging behaviour in adults with a learning disability. The first study to apply a specific psychological model of cognition, emotion, and behaviour in an attempt to help explain the responses of care staff to challenging behaviour was carried out by Dagnan et al. (1998). The current study proposes to replicate and extend this study, to determine if Weiner's attributional model of helping behaviour (Weiner 1980; 1986) generalises to staff working in a day centre setting. In common with much research in this field, Dagnan et al. generated data in response to hypothetical vignettes describing incidents of behaviour. The validity of this methodology has yet to be established in a controlled study. Therefore, this study also aims to compare staff responses to vignettes, with their responses to actual incidents of challenging behaviour. Towards this end, 6 - 10 individuals who engage in frequent aggressive behaviour will be identified via the four community teams in Glasgow. Staff working with these individuals will then be approached and asked to participate in the study. Participants will be asked to fill in questionnaires relating to: 1) the vignettes; 2) a specific incident of aggressive behaviour in which they were involved; and 3) a more general view of the person and their behaviour. Data will be analysed to determine if Weiner's model of helping behaviour is upheld. Data will also be examined for significant differences between staff responses to the vignettes and the actual incidents of aggressive behaviour. The results obtained will have implications for the ecological validity of existing research. They will also have implications for designing cognitive behavioural interventions aimed at staff who work with challenging behaviours.
see if this, rather than sympathy or anger, would be the principal determinant of helping behaviour.

Contrary to Weiner's model, Sharrock et al. (1990) did not find a mediating role for emotion in the prediction of helping behaviour. Rather they found optimism, which was negatively related to attributions of stability and controllability, to be the most important determinant of helping behaviour. However, in their replicating of this study, Dagnan et al. (1998) found a key role for negative emotions in predicting helping behaviour. Specifically, staff's pessimism regarding the person's potential for change, reduced their willingness to help. Pessimism, in turn, was most predicted by negative emotions, such as anger and disgust. The prime determinant of negative emotion was the staff member's attribution of the person's control over their behaviour.

This discrepancy in the findings of Dagnan et al (1998), and Sharrock et al. (1990), may in part be attributable to methodological differences. Throughout the literature, there have been two approaches to studying the reactions of staff to CB. One has been to ask staff to generate hypotheses with respect to a known person (Bromley & Emerson 1995); whilst the most commonly utilised approach has been to generate responses to a fictional person with CB, described in a brief vignette (e.g. Hastings 1996; Hastings 1997; Hastings et al. 1997). Sharrock et al. based their study round one person known to all participants. Carers were then asked to make causal attributions about the person's behaviour, while emotion, optimism etc. were rated with respect to the person. Thus it was unclear how consistent the attributions about
the person's behaviour would be with the evaluations of the person. In order to circumvent this difficulty, Dagnan et al. (1998) generated responses to six vignettes containing examples of CB. The differing methodologies of these two studies highlights an important issue.

While vignettes offer greater stimulus control, their external validity has yet to be proven. One could argue that staff beliefs regarding the causes of CB, and their reactions to such behaviour, are unlikely to be independent of their knowledge and evaluation of the person displaying the behaviour. It is important, therefore, to examine what drives the attributions staff make when faced with CB; and the emotional and behavioural sequelae of these in vivo. If it should be found that data collected using hypothetical vignettes do not generalise to real settings, then the information gathered in such studies is of limited value. However, this is an issue that has not, as yet, been specifically addressed in a controlled study.

In their study, Dagnan et al. (1998) asked staff to evaluate the behaviour, and the person described. A pattern of significant correlations was found which indicated that when the person was perceived as being in control of their behaviour, the negative evaluations of the behaviour and the person were equally high. This suggested that if the client was seen as in control of their behaviour, they were held to blame, and both the client and their behaviour were perceived negatively. This is reported as an example of an "erroneous and dysfunctional global attribution (Trower et al. 1988)" (Dagnan et al. 1998, p65). Such evaluations are at the core of cognitive behavioural therapies, and if this finding were held to be the case then it would
suggest a possible focus for cognitive interventions aimed at working with staff. However, there is a danger that this finding is an artefact of the design. Staff are asked to make evaluations of a person, however, the only information available in making this judgement, is the person's behaviour. Therefore, it is perhaps not surprising that both are evaluated equally negatively. Again it would be interesting to explore this finding in relation to a person actually known to staff.

The aim of the present study is to replicate and extend the work of Dagnan et al. (1998) to include a cognitive emotional analysis of the responses of staff to a known person who engages in CB. The analysis of responses to a known person will be restricted to target individuals who display aggressive behaviour. This is to facilitate comparisons of responses across staff; and allow an examination of the effects of different forms of the same behaviour on staff. To date, the majority of research into staff responses to CB has been carried out within a residential care setting. Thus it is important to investigate if the findings of such research generalises into other settings. Accordingly, this study aims to determine if Weiner's model of helping behaviour is upheld with respect to staff working in a day centre setting. It is hoped to include in this analysis health professionals, such as community nurses, who are not involved in the hands on care, but do work with the individuals and staff in the centre. This will allow systematic investigation of the response patterns of different staff groups, and may yield interesting information on factors associated with differences in responses.
RESEARCH QUESTIONS

♦ Does Weiner's model of helping behaviour generalise to staff working in a day centre setting for adults with a learning disability?

♦ Are similar responses generated by staff to hypothetical and real incidents of aggressive behaviour?

♦ Do the responses of day centre staff to CB differ compared with those of visiting health professionals working in the day centre setting.

METHODS

Subjects

1) *Individuals who engage in aggressive behaviour*

This study will identify individuals presenting with frequently aggressive behaviour attending day centre services in Glasgow. This will be done via one of the four community learning disability teams within Glasgow. This study will only include individuals with mild to moderate learning disabilities, between the ages of 16 – 65 years old. Behaviour will be classified as frequently aggressive using the Checklist of Challenging Behaviours (Harris et al. 1994). It is estimated 6-10 clients will be required. Limiting the number of target individuals, will minimise variations in attributions that are due to stimulus rather than rater variability.
2) Staff

This study will then identify centre staff working with the target individual, and ask them to participate in the study. Only those staff who have worked with the person for more than three months will be included. It is expected this will result in 6-8 staff members and health professionals per person. Advice regarding carrying out a power calculation was sought from Dr James Curral (User Services Manager, Department of Computing Services, University of Glasgow). Dr Curral advised that path analysis did not fit into existing frameworks for power calculations. He recommended that the study base sample size on previous studies in this area. Therefore, based on Sharrock et al. (1990; n = 34), and Dagnan et al. (1998; n = 40), the current study aimed to recruit 40 participants in total.

Measures

The framework for assessing cognitive and emotional responses of staff to CB draws upon that used by Dagnan et al. (1998). However, it is expanded to accommodate responses to an actual incident of aggressive behaviour.

1. The Attributional Style Questionnaire (ASQ) modified by Peterson (1982) allows open-ended identification of causes, and fixed scale ratings on four attributional dimensions. Examples of CB are given, and staff are asked to suggest possible causes for the behaviours. Staff then have to select the most likely cause, and rate
their attributions of this cause on a seven point bipolar scale for locus of control, stability, globality and controllability.

2. Staff will be asked to score the behaviour from completely neutral to extremely bad on a seven point bipolar scale. The evaluation of the person exhibiting the behaviour will be scored in the same way.

3. Staff will be asked to indicate their agreement or disagreement with three statements concerning the potential for changing each behaviour on a seven point bipolar scale. This method was derived from the Optimism-Pessimism scale used by Sharrock et al. (1990); which in itself was derived from work by Garety & Morris (1984).

4. Staff will be asked one question regarding their willingness to provide extra effort to help a person showing each behaviour (Sharrock et al. 1990; Weiner 1980). This will be scored on a seven point bipolar scale.

5. Staff will be asked for their emotional response to each behaviour by rating seven emotions (angry, disgusted, sympathetic, sad, fearful, happy, relaxed) on a seven point bipolar scale from ‘not at all’ to ‘extremely’.
Procedure:

Participants in the study will be assessed using an interview and questionnaire format. There will be two questionnaire formats; one for the vignettes (Appendix 3.2), and one relating to the target individual (Appendices 3.3-3.4). The questionnaire relating to the known person will be preceded by a brief semi-structured interview (Figure 1). This aims to gather information on incidents that have occurred, and to enhance the recollection of thoughts and feelings that occurred at the time. Staff will then be asked to recall a specific incident of aggression during which they were present and to recall how they felt and behaved at the time. They will also be asked about their general views of the person, and their behaviour. This general section will be included for several reasons. Firstly it is less likely that visiting health professionals will have been directly involved in any aggressive incidents. Secondly, it will be interesting to compare the responses of day centre staff to a general, versus a specific, incident of CB. Thirdly, it will increase the data pool collected with respect to actual behaviour, which will enhance statistical calculations.

Data Analysis

Figure 1 provides a schematic outline of the framework within in which data will be collected and analysed. Data will be stored in a locked filing cabinet within the Department of Psychological Medicine
Stage 1: Predictors of Helping Behaviour

The first stage of data analysis will follow the models of Sharrock et al. (1990) and Dagnan et al. (1998), by carrying out a path analysis to determine the role of the key variables (Figure 1) in predicting helping behaviour. This part of the analysis will be based primarily on the vignettes of CB.

Figure 1: Methodology

BEHAVIOUR

VIGNETTE

TARGET INDIVIDUAL

INTERVIEW

RESPONSE

Cognitive Attributions
↓ Emotion
↓ Optimism
↓ Behaviour
Helping

RESPONSE

Cognitive Attributions
↓ Emotion
↓ Optimism
↓ Behaviour
Helping

Path Analyses

Comparison of responses to vignette and actual incident of aggression (MANOVA)
Stage 2: Comparison of responses to hypothetical and actual incidents of CB

The next stage of data analysis will be to compare the findings for hypothetical and real to investigate significant differences. In the first instance the study will do this by determining if Weiner's model is supported with regard to the recalled incidents of aggressive behaviour. Secondly, MANOVA will be used to compare the specific components of the model across the two conditions. The dependent variables will be the staff ratings on the measures of the helping behaviour model (Figure 1). The within group independent variable will be whether responses were made with respect to the hypothetical vignette, or actual instance of aggression. The between group independent variable will be staff group (health professional / day centre staff).

Stage 3: Comparison of responses made by day centre staff and health professionals

Responses to the challenging behaviour vignettes will then be compared across the two staff groups, again using MANOVA. The dependent variables will be the responses to the vignettes. The between group independent variable will be staff group (health professional / day centre staff).
IMPLICATIONS

This study will:

- Expand upon existing literature by broadening out settings in which responses to challenging behaviours are examined.
- Begin to investigate links between staff attributions and behaviour in response to adults with a learning disability engaging in CB.
- Pave the way for designing specific cognitive behavioural interventions tailored to meet the needs of staff, by examining staff responses to CB within a systematic framework.
- Compare responses to real and hypothetical incidents of CB. This will have important methodological implications for the ecological validity of much of current literature in this area.

ETHICAL APPROVAL

This study will seek ethical approval from Greater Glasgow Primary Care NHS Trust.

TIMESCALES

Proposal Submitted: 31/3/99
Ethics Submission: 31/3/99
Pilot study data collection: 1/6/99 - 1/7/99
Pilot study completion 31/7/99
Main study data collection: 1/8/99 - 31/12/99
Data Analysis: 1/1/00 - 31/3/00
Draft: 31/6/00
Final Draft 31/7/00

AMENDMENTS TO MAJOR RESEARCH PROJECT PROPOSAL

1. Vignettes

Initially the intention was to administer six vignettes covering two examples of the three main topographies of CB (aggression, self injurious behaviour, stereotypy). This would replicate the procedure used by Dagnan et al. (1998), and aimed to determine if Weiner’s model of helping behaviour generalised to a day centre setting. However, after developing all the measures it became clear that the interview was very lengthy, and there was serious concern that the staff would be unwilling to provide responses to all six vignettes.

The focus of the study is CB in the mild to moderate learning disabled population, the most common category of learning disability in community services. As self injurious behaviour and stereotypy are less prevalent in this client group, it was thought likely that staff would have considerably less experience of working with
such behaviours, compared to aggression. Experience has a significant effect on the attributions staff make regarding CB (Hastings et al. 1995). Therefore, rather than cutting the number of vignettes by generating responses to only one example of each behaviour, it was felt a focus on aggression would generate more valid results for this sample of staff. Therefore, two vignettes describing incidents of physical and verbal aggression were retained in the assessment. This would determine whether different presentations of aggressive behaviour had an effect on staff responses.

It was also suggested that staff recall a specific incident of aggression, as well as describe a more general ‘typical’ incident. Responses would then be compared across these two conditions. However, it was thought that in practice staff would find it difficult to differentiate between a specific and typical incident, and again it would prove time consuming. Piloting of the revised measures (demographic information, two aggressive vignettes, a semi-structured interview, and rating the recalled incident of aggression) indicated this process took approximately one hour. This confirmed the decision to keep the measures as they stood.

2. Helping Professionals

Recruiting helping professionals was part of the study design. However, this proposal was not followed through, because of the amount of time necessary to identify and interview the appropriate individuals, and the limited time available for data collection. It was also thought likely that only a small sample would be obtained, making results analysis difficult. Furthermore, in light of the relatively
small numbers of staff on community learning disability teams, it was likely that
staff might be involved with more than one target individual. Interviews carried out
with the same staff member would again complicate data analysis.

3. Data Analysis

a) Path Analysis

As per Dagnan et al. (1998), it was originally proposed that path analysis would be
used to investigate the relationships between attributions, emotions, optimism and
helping behaviour. However when these relationships were examined, it was clear
that they did not support the model. Therefore path analysis was not pursued.

b) Comparison of responses to vignettes and recalled incidents of CB

The study planned to use MANOVA to compare responses across these two
conditions. However when advice was sought from Professor Dave Dagnan
(Consultant Clinical Psychologist, West Cumbria Health Care NHS Trust), he
suggested that MANOVA would add little to the analysis. Professor Dagnan advised
that MANOVA requires the clear inter-relation of outcome variables. This would
require separate analysis for attributions, emotions, optimism and helping behaviour
(the latter two would be ANOVA). Thus multiple analysis would still be required.
Furthermore, MANOVA determines a main effect only, and individual ANOVAs are
still required to determine the nature of any significant findings. In light of these
factors, and to keep the analysis as straightforward as possible, it was decided to use one way repeated measure ANOVAs to investigate for significant differences across the two vignettes and the recalled incident of aggression.

REFERENCES


4. MAJOR RESEARCH PROJECT PAPER

The responses of staff towards people with mild to moderate intellectual
disabilities who engage in aggressive behaviour: a cognitive emotional analysis.

Lilian K. Wanless
Department of Psychological Medicine, University of Glasgow

Prepared in accordance with guidelines for submission *Journal of Applied Research in Intellectual Disability* (Appendix 4.1).
The responses of staff towards people with mild to moderate intellectual disabilities who engage in aggressive behaviour: a cognitive emotional analysis.

Lilian K. Wanless
Department of Psychological Medicine, University of Glasgow

Address for reprints: Lilian K. Wanless, Department of Psychological Medicine, Gartnavel Royal Hospital, 1055 Great Western Road, Glasgow, G12 0XH; Tel: 0141 211 3920, Fax: 0141 357 4899
ABSTRACT

Recent studies have investigated the links between the attributions, emotions, and behaviour of staff in response to challenging behaviour; drawing upon Weiner's attributional model of helping behaviour. Typically the responses of staff have been generated in response to vignettes, however the validity of such a method is yet to be established. The aims of the present study were twofold: 1) to compare the cognitive and emotional responses of staff between vignettes and actual incidents of challenging behaviour; and 2) to test the application of Weiner's model of helping behaviour to staff working in day centre settings. Staff (n=38) who worked with frequently aggressive clients were asked to complete ratings in response to two vignettes, and an incident of aggressive behaviour in which they had been involved. When responses were compared across the hypothetical and real scenarios, using a series of one way ANOVAs, it was revealed that staff experienced more negative emotions in response to an actual incident of aggression. Relationships between variables were examined using Spearman Correlations. It was found that staff perceptions of the client engaging in the behaviour were linked to their cognitive and emotional responses to the behaviour. However, there was little evidence to support Weiner's model. Reasons as to why this might be the case were examined, and the implications for clinical practice discussed.
INTRODUCTION

Challenging behaviour (CB) in people with intellectual disabilities is often viewed as being a function of the social environment (e.g. Carr & Durand 1985; McGill 1993). Therefore, the actions of significant others, especially caregivers, are thought to constitute the antecedents and consequences to a large proportion of such behaviour (Hastings 1997a). Research into the interactions between carer and client emphasises the significant role that staff can play in the development and maintenance of CB (Hastings & Remington 1994a). Consequently, much effort has gone into identifying factors which can influence staff performance. Traditionally this research has been carried out from a behavioural perspective (Hatton & Emerson 1995), with the principles of behaviour analysis applied to the relationship between staff and client behaviour (Hastings & Remington 1994b). More recently it has been suggested that to develop a comprehensive account of staff performance, the incorporation of cognitive components into such models is necessary (Kushlick et al. 1997).

In particular the causal explanations, or attributions, staff make regarding CB are seen as having a central role in predicting their emotional and behavioural responses (Dunne 1994). Weiner's attributional model of helping behaviour (Weiner 1980; 1986) has been suggested as a useful framework in which to examine staff responses to CB (Sharrock et al. 1990; Fenwick 1995; Allen 1999). This model proposes that attributions of stability (whether the cause of a behaviour is viewed as being the same each time) and control (whether the cause of a behaviour is seen as under the control of the person being observed) are the primary determinants of the emotional reactions of sympathy or anger. In turn, these emotions are thought to promote or reduce the
likelihood of helping behaviour being offered. Thus if a person’s CB is perceived to be under their control (e.g. they are ‘seeking attention’), then Weiner’s model would predict that staff would be more likely to react with anger, and less likely to help the person.

In a direct test of this model, Dagnan et al. (1998) asked 39 care staff to rate six scenarios describing different examples of CB. Results were largely consistent with Weiner’s model, although staff’s optimism regarding the potential for change in the CB was also found to play an important role in predicting staff’s willingness to help. Specifically, staff’s pessimism regarding the potential for change in the behaviour reduced their willingness to help. Pessimism, in turn, was most predicted by negative emotions, such as anger and disgust. The prime determinant of negative emotion was the staff member’s attribution of the client’s control over their behaviour.

Dagnan et al. (1998) also found that when clients were perceived to be in control of their behaviour, they were held to blame, and they and their behaviour were evaluated equally negatively. This is an interesting finding, as staff perceptions of the person engaging in CB have typically been overlooked in the existing research. However, the conclusions that can be drawn from Dagnan et al. are limited. Evaluations of the client engaging in CB are generated with respect to a hypothetical person. Furthermore, no account is taken of characteristics of the client which might influence the attributions, or evaluations, that staff might make when faced with CB (Wanless 2000).
A recent study to examine the role of Weiner's model of helping behaviour used expanded vignettes to examine the influence of client factors on staff responses to CB (Stanley & Standen 2000). It was found that when the behaviour was described as being directed towards staff and other clients, and the more able clients were described to be; the greater the carers’ attributions of control and feelings of negative affect, and the less the likelihood of carers offering help. Thus aggressive and destructive behaviours in clients of 'high ability' were more likely to be perceived and reacted to negatively, than similar behaviours in clients of 'low ability'.

From the studies discussed above it is clear that significant progress is being achieved in developing an understanding of the potential determinants of staff behaviour in response to CB. Nonetheless, a serious limitation regarding the applicability of such analyses is that they are based on carer responses to theoretical rather than real life situations (Allen 1999; Wanless 2000). In common with many studies carried out in this area, hypothetical scenarios are used to evoke staff responses to CB (e.g. Oliver et al. 1996; Hastings 1997b). Such vignettes offer good stimulus control, and are a useful research tool. However, they represent an abstract event which may not have a great deal of personal significance to staff. Vignettes are unlikely, therefore, to evoke the same range and depth of cognitive and emotional reactions as actual incidents of CB, and their ecological validity has yet to be determined.

The present study aimed to build upon existing research by comparing the cognitive and emotional responses of staff to vignettes, with their reactions to incidents of CB in which they were personally involved. To compare responses across hypothetical
and real incidents of behaviour, these scenarios were matched for topography of CB, and level of disability. Accordingly, staff responses to aggression in people with mild to moderate intellectual disabilities were focused upon. It was predicted that in response to an actual incident of CB, staff would be more likely to rate the client as having control over their behaviour, and would report more negative emotions. It was also predicted that actual incidents of CB would evoke more negative evaluations of the client, and their behaviour. A second aim of the study was to examine Weiner's model of helping behaviour with regard to staff working in day centre settings. It was predicted that staff responses to vignettes and actual incidents of aggression would be consistent with Weiner's model.

METHODS

Participants

A total of 38 staff working in six centres providing day activities for adults with intellectual disabilities participated in the study. All staff approached agreed to take part in the study, however two staff members did not complete all measures due to constraints on their time. The demographic characteristics of participants are represented in Table 1. Staff were included in the study on the basis of having worked for six months or more with particular clients identified as engaging in frequently aggressive behaviour.
A modified version of the Harris Checklist of Challenging Behaviours (Harris 1994) was used to identify clients who presented with three or more incidents of verbal or physical aggression over a three month period. Eighteen day centres in a Scottish city were surveyed, and 45 clients with mild to moderate intellectual disabilities who met the above criteria for frequently aggressive behaviour were identified. For the purposes of the present study, seven centres were approached. One centre declined to participate due to the demands on staff time, however six agreed to take part and nominated a client from the survey. Table 1 summarises the main demographic characteristics of these clients. After obtaining each client’s consent, their key worker was then asked to nominate staff members who worked with the client on a regular basis, and had witnessed at least one incident of aggressive behaviour in the last 3 months. The number of staff interviewed per client ranged from 5 - 8.

**Measures and Procedure**

Participants were first asked to complete questionnaires containing 2 brief vignettes, describing an incident of physical and verbal aggression respectively (Appendix 4.3). Each vignette was followed by a series of seven-point bipolar scales. Ratings were obtained for: attributions (control, stability, internality, globality); emotions (angry, disgusted, sympathetic, frightened, sad, happy, relaxed); optimism (three items concerning potential for change in the behaviour); and helping behaviour (one item regarding willingness to provide extra effort to help the client). Staff were
also asked to rate the behaviour described, and the person engaging in the behaviour, from completely neutral to extremely bad. These measures were derived from Dagnan et al. (1998).

The next phase comprised of a cognitive behavioural interview adapted from a format developed by Trower et al. (1988; Appendix 4.4). The interview was designed to elicit emotions experienced in a situation of conflict, and the interpersonal appraisals which follow. Staff were asked to describe an incident of aggression involving themselves and the client in question, and to talk through the feelings they experienced at the time. Once the key emotions were identified, staff were then questioned regarding their perceptions of the client, and what they thought motivated the client to act as they did. The purpose of the interview was to make the recalled incident more immediate to staff. Following the interview, staff were then asked to complete the same ratings as for the vignettes, but this time regarding the incident just discussed.

Data Analysis

Data analysis was conducted in two stages. The first stage of analysis examined differences between the hypothetical and real conditions. A series of one-way ANOVAs with repeated measures were carried out for response type. There were three levels of the independent variable; responses to physical vignettes, verbal vignettes, and the actual incident of aggression. *Post hoc* analyses, using the Bonferroni adjustment for multiple comparisons, were conducted to test whether staff reacted more strongly to the actual incident of aggression compared to the vignettes.
Predictions regarding differences in the global ratings of the behaviour and the person were also tested at this stage. To determine if there was an effect due to the type of aggression experienced in the recalled incident, a series of Wilcoxon Signed Rank Tests were carried out. These tests compared responses to the physical vignettes with responses to actual incidents of physical aggression, and similarly for verbal aggression. In the second stage of the analysis Spearman correlations were used to examine the relationships between attributions, emotions, optimism and helping behaviour with regard to the vignettes, and to actual incidents of aggression. Optimism was included as part of this analysis, to determine if the results of the present study were consistent with the findings of Dagnan et al. (1998).

RESULTS

Responses to Vignettes Compared to Recalled Incidents of Aggression

Comparisons of attributions, emotions, optimism, and helping behaviour are presented first, before going on to compare global evaluations made regarding the behaviour, and person engaging in the behaviour. The means and standard deviations in response to the two vignettes and recalled incidents of aggression are represented in Table 2.
i) Attributions, Emotions, Optimism, and Helping Behaviour

a) Overall Comparisons of Responses to Vignettes and Recalled Incidents:
Significant main effects of response condition were found for: anger, F(2, 70) = 6.375; p = 0.003; and sympathy, F(2, 70) = 4.731; p = 0.012. Post hoc analyses revealed that in all cases there were no significant differences between either of the vignettes, however both vignettes differed significantly from the recalled condition. Specifically, participants rated experiencing more anger, and less sympathy in response to an actual incident of aggression.

b) Comparisons Controlling for Topography of Aggressive Behaviour:
To determine if there was an effect according to the type of aggressive behaviour being responded to, recalled episodes of conflict were categorised according to topography (verbal, n = 22; physical, n=15). When responses to verbal vignettes were compared to responses to the recalled incidents of verbal aggression, it was found that participants experienced more anger (z = 2.025; p=0.021), and less sympathy (z = 2.626; p=0.009) in response to the actual incident. When physical incidents were compared to physical vignettes, the same differences were obtained (anger, z = 2.303; p=0.021; sympathy, z = 2.263; p=0.024). Staff also indicated greater disgust (z = 2.539; p = 0.011); and feeling less relaxed (z = 3.079; p = 0.002) in response to the real incident of physical aggression.
ii) *Global Evaluations of Behaviour and the Person*

When perceptions of the hypothetical person and their behaviour were compared to perceptions of the real client and their behaviour, ANOVA revealed a main effect for evaluations of the person, $F(2, 70) = 13.707; p < .0001$. *Post hoc* analysis indicated that the person engaging in the behaviour was perceived more negatively in the recall condition than in either of the vignettes. The comparisons were then matched for topography. Ratings in response to verbal vignettes and actual incidents of verbal aggression were compared with each other, as were ratings for physical vignettes and actual incidents of physical aggression, again using Wilcoxon Signed Rank tests. Both sets of analyses indicated that the person engaging in the behaviour was evaluated more negatively in response to an actual incident of aggression (verbal, $z = 1.973; p = 0.048$; physical, $z = 2.284; p = 0.022$). Global evaluations of the behaviour were significantly more negative in response to actual incidents of physical aggression, compared to the physical vignettes ($z = 2.690; p = 0.007$).

**The relationship between attributions, emotions, optimism and helping behaviour**

Weiner's model identifies sympathy and anger as the emotions which respectively promote or reduce the likelihood of helping behaviour. In keeping with Weiner's model, the previous analysis indicated that anger and sympathy were key emotions for staff when responding to an incident of aggressive behaviour. Accordingly these two emotions were retained in the subsequent analysis. The relationship between attributions, emotions, optimism and helping behaviour are examined firstly with
respect to vignettes, then recalled incidents of aggression. Significant relationships between these variables, and global evaluations of the person and behaviour, are then presented.

i) Vignettes

As there were no significant differences between responses to the physical and verbal vignettes, data were collapsed into one group for subsequent analyses. Table 3 represents the bivariate correlations between the key measures of attributions, emotions, optimism, and helping behaviour; staff age; and length of service.

A number of significant correlations was obtained. Consistent with Weiner’s model, attributions of control were positively correlated with anger ($r_s = .419; p < 0.01$); and negatively correlated with sympathy ($r_s = -.336; p < 0.05$). Contrary to Weiner’s model, control was not associated with optimism or helping behaviour. Similarly, levels of anger and sympathy were not associated with optimism. Anger and helping behaviour were related, but in the opposite direction that predicted: anger being positively correlated with helping behaviour ($r_s = .410; p < 0.01$).
**ii) Recalled Incidents**

Responses to incidents of physical and verbal aggression were compared using a series of Mann-Whitney U tests. Results indicated that staff involved in an incident of physical aggression were significantly more frightened than staff who experienced verbal aggression ($U = 87.5; p = 0.012$). No other significant differences between the two behaviours were revealed. Therefore, in subsequent analyses responses to recalled incidents of physical and verbal aggression were collapsed into one group. Table 4 shows bivariate correlations between the key variables, staff age, and length of service for responses to the recalled incidents of aggression.

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*Insert Table 4 about here*

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A similar pattern of correlations to those found in response to the vignettes was obtained. Consistent with Weiner's model, attributions of control were positively correlated with anger ($r_s = .454; p < 0.01$), and negatively correlated with sympathy ($r_s = -.431; p < 0.01$). Optimism did not show any significant relationships. Control, anger, and sympathy were all related to helping behaviour, but again in opposite directions to those predicted by Weiner's model. Attributions of control ($r_s = .495; p < 0.01$), and anger ($r_s = .450; p < 0.05$) were both positively related to helping behaviour. Sympathy was inversely related to helping behaviour ($r_s = -.372; p < 0.05$).
iii) Global evaluations of the behaviour and the person

Examining the relationships between attributions, emotions, optimism and helping behaviour; similar results were obtained for staff responses to hypothetical and actual behaviour. Where the two conditions differed most was in the associations between these variables, and evaluations of the person and their behaviour. When responding to vignettes and a hypothetical client, Table 3 shows that few variables were significantly correlated with evaluations of the person and their behaviour. In contrast, responding to an actual client, and situation of conflict, negative evaluations of the person, and their behaviour were positively correlated with: attributions of internality and control; anger; and also with each other (see Table 4). Evaluations of the client were also negatively correlated with sympathy. In addition, Tables 3 and 4 show that the age of staff was negatively correlated with evaluations of the person and their behaviour; younger staff tending to evaluate the person and their behaviour more negatively.

DISCUSSION

The present study found that when staff responses to hypothetical and real scenarios of CB were compared, there were few significant differences. Differences identified were in the expected direction: a stronger emotional response was evoked, and more negative evaluations of the client and their behaviour were made, in response to actual incidents of aggression. Little evidence was found to support Weiner's model;
for both vignettes, and actual incidents of aggression. However, in response to actual incidents of aggression, staff perceptions of the client were closely linked to their cognitive and emotional responses to the behaviour. These relationships were not identified in response to vignettes.

The findings of the present study were in contrast with previous studies which have been supportive of Weiner's model (Sharrock et al. 1990; Dagnan et al. 1998; Stanley & Standen 2000). In response to recalled incidents and vignettes, the relationships between attributions and emotions were consistent with Wiener's model; when staff perceived clients as being in control of their behaviour, this was associated with increased feelings of anger, and less sympathy in response to the aggressive behaviour. However, optimism and helping behaviour did not demonstrate relationships as predicted. In fact associations were obtained that were in direct contrast to the model; for example, an increase in staffs' helping behaviour was associated with higher levels of anger, and the view that clients were in control of their aggressive behaviour.

One explanation for these counter-intuitive findings could lie at a methodological level. Staff responses to the rating scales (Table 2) indicated that positive emotions were as highly endorsed, if not more so, than negative emotions. Such results imply that staff felt relaxed and sympathetic, rather than angry or fearful, in response to aggressive behaviour. A situation of conflict would not be expected to make staff feel relaxed, yet to indicate otherwise might suggest that the staff member felt out of control. Overall, there appears an unwillingness to report negative reactions. This was particularly evident with regard to optimism, and helping behaviour; responses
to these two items were extremely skewed towards the positive ends of the rating scales. Such a response pattern suggests a tendency towards socially desirable responding (Rajecki 1990), on the part of staff.

Another reason for the lack of confirmation for Weiner’s model may well lie at a conceptual level. In past studies, optimism has been consistently associated with staff attributing a clients’ behaviour to a stable cause (Dagnan et al. 1998; Stanley & Standen 2000), such as a their level of dependency. For example, optimism is suggested to be most relevant to staff responding to clients with high dependency, who engage in self injurious behaviour (Stanley & Standen 2000). As the present study investigates staff attributions towards clients with low dependency, who engage in aggressive behaviour, it is not surprising optimism did not demonstrate significant relationships. With regard to staff likelihood of helping, this comprised of a rating of willingness to offer extra help. However for paid carers, not offering to help is perhaps not a readily available option (Dagnan et al. 1998). Thus, the relevance of helping behaviour as a concept in day care settings becomes open to question.

As anticipated, staff were more angry, and less sympathetic, in response to actual incidents of aggression than to the vignettes. However, there were no differences in the attributions staff made regarding causes of the hypothetical or real behaviour. Where, perhaps unsurprisingly, responses to vignettes differed most from responses to actual incidents of aggression, was with regard to staff perceptions’ of the client engaging in the behaviour. Actual clients with difficult behaviour were in fact viewed quite negatively by staff; significantly more so than was apparent when staff were asked to evaluate people who engage in CB at an abstract level. Furthermore,
these negative appraisals of the client were associated with increased attributions of control, and stronger emotional responses to the situation by staff. These relationships were only found in response to real situations, not vignettes. Overall, these findings suggest that vignettes are a valid measure of staffs' attributions, however, they are not as emotive as actual incidents of aggression. This is particularly the case with regard to staff perceptions of the person engaging in the behaviour.

Existing research has focused mainly on the relationship between attributions and staff behaviour (Hastings & Remington 1994b; Hastings 1997ab). The results described above might indicate that staff attributions represent a general cognitive style, which applies across incidents of CB. In contrast, evaluations of the person may be a more immediate cognitive response to an actual incident of CB. Such cognitions are likely to represent specific negative thoughts about the client in question. If such cognitions are more immediate, and specific to the situation, they could be more closely linked to staff's behaviour in that situation (Ajzen 1982).

There are limitations to the current study, which constrain the conclusions that can be drawn. Aggression is an interpersonal behaviour that is likely to impact directly upon staff (Emerson & Bromley 1995). As such the relationship between staff evaluations of the client, and their response towards that client, may be heightened. Further investigation is required to determine if the interpersonal appraisals made by staff have a significant role to play in response to other forms of CB, such as self injury. It has also been suggested that the accuracy of Weiner's model in predicting staff responses to CB is increased by including a broad range of
challenging behaviours, and levels of dependency (Stanley & Standen 2000). The current study was designed to control for such variation, to compare responses across vignettes and actual incidents of aggression. As a consequence there was less variability in staff responses, making the detection of significant relationships less likely. Nonetheless, one would still expect the overall pattern of relationships predicted by Weiner's model to be upheld, if not significant.

Despite these limitations, the findings of the present study suggest there is perhaps a need to move away from Weiner's model per se, towards a more general cognitive-emotional analysis relevant to staff working with people who engage in challenging behaviour. In future studies it may be useful to explore how the different cognitive responses staff make to CB affect their emotional and behavioural responses to the behaviour in question. It will also be useful to begin to investigate the links between cognition, emotion, and forms of behaviour directly relevant to the job in question; for example whether, or how, staff intervene in an incident of challenging behaviour.

Such work has clear implications for current clinical practice. The analysis of the cognitive and emotional responses of staff to challenging behaviour allows the specification of cognitive behavioural interventions which might be effective in producing beneficial changes in staff behaviour (Kushlick et al. 1997). For example, when working with people who present with aggressive behaviour, staff can be encouraged to explore their attributions of control regarding the behaviour. This may help reduce negative emotions such as frustration and anger, thereby promoting the likelihood of a more positive, or adaptive, response to the client when they engage in CB. Exploring staffs' subjective feelings towards the client in question, may enhance
staff motivation and participation in such interventions: staff who are positively disposed towards to a client, or who have worked through some of their negative feelings, may be more likely to engage in work around a person and their CB.

As well as investigating the impact of client characteristics on staff behaviour, future research would also benefit from investigating the relationship between staff characteristics and their responses to CB. The present study found that younger staff tended to evaluate both the client, and their behaviour more negatively. This suggests that older staff members, are more tolerant of difficult behaviour, and less likely to react negatively to the person. Previous work has also identified that experience has an effect on the causal attributions made by staff (Hastings et al. 1995). There is a need to determine if, and how, such variables relate to staff performance. Such research would have important implications for planning services for people with difficult behaviour, and would also allow staff training to be tailored to the needs of specific staff groups.

CONCLUSIONS

The present study did not find the expected relationships between the cognitive, emotional, and behavioural responses of staff to incidents of aggressive behaviour. However, this may have been a result of conceptual and methodological difficulties. What is required now are studies of cognition, emotion, and behaviour that are directly relevant to staff working with clients who engage in CB. However, studies
will need to pay close attention to how this research is to be carried out. The current practise is to use hypothetical descriptions of incidents of CB. However, vignettes by their very nature focus attention on the behaviour, at the expense of the individual engaging in the behaviour. This implies that characteristics of the behaviour are the most important influence on staff performance. However, the results of the present study suggest otherwise. While vignettes undoubtedly have their uses, caution must be exercised so that research in this area is not overly reliant on, and therefore restricted by, such methods.

While it is important to understand what drives staff responses to incidents of difficult behaviour, it is also important not to lose sight of the broader social context in which CB is embedded. The findings of the current study suggest that how staff feel about a client may be an important source of influence over how they respond to an actual incident of aggressive behaviour. Such feelings are likely to also influence how staff respond to the client in general, outwith incidents of CB. Given that many CBs persist through life (Emerson 1992), it is vital that even when these remain, opportunities for a high quality of life are still offered to people with CB. For this to happen, positive relationships with staff need to be maintained (Bromley & Emerson 1995), and areas of stress and difficulty which impact on this relationship identified.

Acknowledgements

I would like to thank Professor Dave Dagnan (University of Northumbria) for his help and advice during the development of this study.
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<tr>
<th>Table</th>
<th>Title</th>
<th>Pages</th>
</tr>
</thead>
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<tr>
<td>Table 4</td>
<td>Spearman Correlations Between Key Variables - Recalled Incident</td>
<td>100</td>
</tr>
</tbody>
</table>
**TABLE 1: Demographic Characteristics of Staff and Clients**

<table>
<thead>
<tr>
<th>STAFF VARIABLES</th>
<th>DESCRIPTIVES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (mean)</td>
<td>42.7 years (SD = 9.67; 24-60)</td>
</tr>
<tr>
<td>Gender</td>
<td>Female = 22 (57.9%)</td>
</tr>
<tr>
<td></td>
<td>Male = 16 (42.1%)</td>
</tr>
<tr>
<td>Length of Service (mean)</td>
<td>8.4 years (SD = 5.01; 1-17)</td>
</tr>
<tr>
<td>Position</td>
<td>Day centre officers = 33 (86.8 %)</td>
</tr>
<tr>
<td></td>
<td>Management = 5 ( 13.2%)</td>
</tr>
<tr>
<td>Time worked with client (mean)</td>
<td>4.04 years (SD = 3.95; 0.5-15)</td>
</tr>
<tr>
<td>Contact with client/ week</td>
<td>Frequent = 22 (57.9%)</td>
</tr>
<tr>
<td></td>
<td>Occasional = 15 (39.5 %)</td>
</tr>
<tr>
<td></td>
<td>Infrequent = 1 (2.6%)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>CLIENT VARIABLES</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (mean)</td>
<td>41.6 years (SD = 5.64; 34-49)</td>
</tr>
<tr>
<td>Gender</td>
<td>Female = 2</td>
</tr>
<tr>
<td></td>
<td>Male = 4</td>
</tr>
</tbody>
</table>
**TABLE 2: Mean Scores on Key Variables**

<table>
<thead>
<tr>
<th></th>
<th>Physical Vignette</th>
<th>Verbal Vignette</th>
<th>Recall of Incident</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>SD</td>
<td>Mean</td>
</tr>
<tr>
<td><strong>Attributions</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Internality</td>
<td>4.34</td>
<td>1.32</td>
<td>4.19</td>
</tr>
<tr>
<td>Stability</td>
<td>3.71</td>
<td>1.64</td>
<td>3.73</td>
</tr>
<tr>
<td>Globality</td>
<td>4.50</td>
<td>1.74</td>
<td>4.41</td>
</tr>
<tr>
<td>Control</td>
<td>3.18</td>
<td>1.75</td>
<td>3.54</td>
</tr>
<tr>
<td><strong>Emotions</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Anger</td>
<td>2.71</td>
<td>1.61</td>
<td>2.89</td>
</tr>
<tr>
<td>Happy</td>
<td>2.13</td>
<td>1.21</td>
<td>2.49</td>
</tr>
<tr>
<td>Sad</td>
<td>2.89</td>
<td>1.75</td>
<td>2.89</td>
</tr>
<tr>
<td>Sympathy</td>
<td>4.58</td>
<td>1.48</td>
<td>4.51</td>
</tr>
<tr>
<td>Fear</td>
<td>2.92</td>
<td>1.71</td>
<td>2.95</td>
</tr>
<tr>
<td>Disgust</td>
<td>1.61</td>
<td>.92</td>
<td>2.32</td>
</tr>
<tr>
<td>Relax</td>
<td>3.16</td>
<td>1.33</td>
<td>3.32</td>
</tr>
<tr>
<td><strong>Optimism</strong></td>
<td>18.18</td>
<td>3.56</td>
<td>18.00</td>
</tr>
<tr>
<td><strong>Helping Behaviour</strong></td>
<td>1.34</td>
<td>.75</td>
<td>1.49</td>
</tr>
<tr>
<td><strong>Evaluations</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Behaviour</td>
<td>4.55</td>
<td>4.27</td>
<td>4.27</td>
</tr>
<tr>
<td>Person</td>
<td>3.03</td>
<td>3.43</td>
<td>3.43</td>
</tr>
<tr>
<td>Age</td>
<td>Self Service</td>
<td>Internally</td>
<td>Sympathy</td>
</tr>
<tr>
<td>------</td>
<td>--------------</td>
<td>------------</td>
<td>----------</td>
</tr>
<tr>
<td>68</td>
<td>.96</td>
<td>.18</td>
<td>.65</td>
</tr>
<tr>
<td>77</td>
<td>.93</td>
<td>.22</td>
<td>.26</td>
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<tr>
<td>86</td>
<td>.96</td>
<td>.24</td>
<td>.23</td>
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<tr>
<td>95</td>
<td>.93</td>
<td>.26</td>
<td>.28</td>
</tr>
<tr>
<td>104</td>
<td>.96</td>
<td>.28</td>
<td>.32</td>
</tr>
</tbody>
</table>

**Correlation is significant at 0.01 level (2-tailed)**

- Table 3: Spearman Correlations Between Key Variables - Vigettes
<table>
<thead>
<tr>
<th>Age</th>
<th>Service</th>
<th>Internality</th>
<th>Stability</th>
<th>Control</th>
<th>Anxer</th>
<th>Sympathy</th>
<th>Optimism</th>
<th>Helpine</th>
<th>Behaviour</th>
<th>Person</th>
</tr>
</thead>
<tbody>
<tr>
<td>0.00</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>0.67</td>
<td>1.00</td>
<td>1.00</td>
<td>0.17</td>
<td>0.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>0.15</td>
<td>0.28</td>
<td>0.00</td>
<td>1.00</td>
<td>0.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>0.17</td>
<td>0.22</td>
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<td>1.00</td>
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<td></td>
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<tr>
<td>0.59</td>
<td>0.45</td>
<td>0.00</td>
<td>0.00</td>
<td>1.00</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>0.86</td>
<td>0.56</td>
<td>0.00</td>
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<td>1.00</td>
<td></td>
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</tr>
</tbody>
</table>

Note: Correlation is significant at 0.01 level (2-tailed)

Table 4: Spearman Correlations Between Key Variables - Rejected Incident
REFERENCES


5. CLINICAL CASE RESEARCH STUDY


Lilian K. Wanless
Department of Psychological Medicine, University of Glasgow

Prepared in accordance with guidelines for submission to Behaviour Research and Therapy (Appendix 1.1)
ABSTRACT

Controversy surrounds the efficacy of behavioural versus cognitive behavioural interventions in the treatment of depression (Jacobson & Gortner 2000). It has been identified that behavioural activation techniques result in treatment gains of the same magnitude as schema focused cognitive therapy (Jacobson, Dobson, Truax, Addis, Koerner, Gollan, et al. 1996). This has considerable implications not only for treatment, but also underlying theoretical models of depression. This study adopted single case methodology to investigate the competing theories of change put forward by behavioural and cognitive models of depression. An ABC design was utilised to systematically investigate changes associated with behavioural and cognitive interventions across the outcome measures of affect, behaviour, and cognition. In the first phase of treatment (B), behavioural techniques were associated with substantial improvements in mood, and moderate changes in behavioural and cognitive variables. However, these appeared vulnerable to external stress. In the second phase of the design (C), the introduction of cognitive techniques was associated with further improvements across all outcome measures. These improvements showed less reactivity to external pressures. These findings highlighted the potential of single case methodology to investigate processes of change in therapy, and the implications for clinical practise were discussed.

Keywords:

Behaviour therapy, cognitive therapy, treatment outcome, process, depression
APPENDIX 1: SMALL SCALE SERVICE EVALUATION

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NOTES FOR CONTRIBUTORS

Disability and Rehabilitation seeks to encourage a better understanding of all aspects of disability and to promote the rehabilitation process. Papers on the severity and magnitude of disability, clinical medicine including gerontology, psychosocial adjustment, social policy issues, vocational and educational training, rehabilitation engineering, and on all other relevant subjects are encouraged.

Disability and Rehabilitation is an international interdisciplinary journal and particularly welcomes contributions from a wide range of professional groups, including medical practitioners, occupational therapists, physiotherapists, speech and language therapists, clinical psychologists and those involved in nursing, education, ergonomics, and engineering.

Review articles, experimental and clinical Research Papers, Case Studies, Clinical Commentaries, reports on Rehabilitation in Practice, Rehabilitation Engineering, and major Book Reviews will be included in the journal.

Submissions

- Three copies of a paper should be submitted with the originals of any tables, figures, or photographs, all of which should be of high quality suitable for reproduction. Submissions should be in English presented on one side of the paper in double line spacing. All tables, figures, and photographs should be marked in pencil on the back identifying the author(s) and the order of appearance in the text.
- The submission should include a separate title page with the name(s) and affiliation(s) of the author(s) and the name and address for offprint requests with a telephone and fax number (including country and area codes).
- There should follow another separate page listing key words and a summary. Up to five keywords or short phrases should be provided. Summaries should be no more than 150 words.
- Authors should use non-sexist language.
- References should be numbered consecutively in the order in which they are first cited and should appear in numerical order at the end of the paper. The format of the references is based on that given by the International Steering Committee of Medical Editors, except that titles of journals should be cited in full. All authors should be listed when six or less; when seven or more list only the first three followed by et al. The following styles should be adhered to:

  article in a journal

  chapter in an edited book

  book

- Submissions should be accompanied by a covering letter signed by every author and should include where appropriate a formal statement that ethical consent for the work to be carried out has been given. Recognizable photographs of patients should be avoided, but if essential patients' consent in writing must accompany manuscript.
- Artwork submitted for publication will not normally be returned and will be destroyed after publication. Whilst every care will be taken of artwork, neither the Editor nor Taylor & Francis shall bear any responsibility or liability for non-return, loss, or damage of artwork, nor for any associated costs or compensation. Authors are strongly advised to insure appropriately.
- Authors are encouraged to request blind refereeing and should prepare the manuscript accordingly.
- Proofs are sent to the corresponding author who must return them to the publisher, by post or fax, within three working days of receipt.
- Following the proof stage authors are not at liberty to alter papers other than in response to additional requests for information from the copy editor. Changes introduced by authors will be charged in order to reduce the costs of the Journal and to maximize subscriptions.
- There are no page charges. Three complimentary copies of the issue in which your article appears will be sent to the principal or sole author of the article. Larger quantities may be ordered at a special discount price. An order form will accompany the proofs, which must be completed and returned, irrespective of whether you require additional copies.
- Submissions should be sent to:

  Professor Dave Müller
  Disability and Rehabilitation
  University College Suffolk
  Rope Walk
  Ipswich IP4 1LT, UK
  Tel: +44 1473 296521
  Fax: +44 1473 260014
APPENDIX 1.2

Back Pain School; Client Survey

We are interested in finding out more about the people who attend the Back school. This will help us in providing a service that matches the needs of users. We would therefore be grateful if you could answer the questions set out below.

Please circle the relevant answers

Date of Birth ................................ Sex: Male Female

1. Occupation: Employed Unemployed Retired Housewife Absent due to ill health

2. Marital Status: Single Married/ Cohabiting Divorced Widow/er

3. What is your current level of pain?

We are interested in the level of pain you are currently experiencing. People agree that the five words below represent pain of increasing intensity.

Which word describes your pain right now?

1 Mild 2 Discomforting 3 Distressing 4 Horrible 5 Excruciating

4. How much control do you have over your pain?

Based on the things you do to cope or deal with your back pain, on an average day, how much control do you feel you have over it? Please circle the number which best describes your current pain control level.

0 1 2 3 4 5 6
No control Some control Complete control
5. How physically active are you at present?

Please tick the description that best describes your current level of exercise.

- Fairly inactive (e.g. little or no exercise at all)
- Moderately active (e.g. walking, swimming, gentle exercise once or twice a week)
- Very active (e.g. weight training, running, digging the garden more than twice a week)

6. We would like you to think about activities in your life which are affected by your back pain problems. In the list below, tick YES for each activity affected by your pain, NO for those activities unaffected, and DOES NOT APPLY for those activities not relevant to yourself.

At present is your pain causing problems with your

<table>
<thead>
<tr>
<th>Activity</th>
<th>Yes</th>
<th>No</th>
<th>Does Not Apply</th>
</tr>
</thead>
<tbody>
<tr>
<td>Job (i.e. paid employment)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Looking after your home (i.e. cleaning, cooking, repairs, etc.)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social life (i.e. going out, seeing friends)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Home life (i.e. relationships with people at home)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sex life</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Interests and hobbies (i.e. sports, crafts, DIY)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Holidays</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

7. What would you like to get out of attending the back school? Please tick the line next to whichever answer(s) apply to you.

- Not sure what to expect
- A reduction in the amount of pain I am in
- Information about the physical aspects of back pain
- Information about how back pain might affect my life
- Exercises to help me cope with back pain
- An increase in the flexibility and strength of my back
- Support from health professionals
- Support from other people with back pain
- Other (please specify in the space below)
Emotions can play a large part in most health problems. It is therefore important we identify what emotions are typically experienced by people using the back pain school, so that these emotional needs can be met. This part of the questionnaire is designed to help us know how you feel. Please read each item below and tick the reply which comes closest to how you have been feeling in the last week.

<table>
<thead>
<tr>
<th>I feel tense or 'wound up'</th>
<th>I feel as if I am slowed down</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Most of the time</td>
<td>Nearly all the time</td>
<td></td>
</tr>
<tr>
<td>A lot of the time</td>
<td>Very often</td>
<td></td>
</tr>
<tr>
<td>From time to time, occasionally</td>
<td>Sometimes</td>
<td></td>
</tr>
<tr>
<td>Not at all</td>
<td>Not at all</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>I enjoy the things I used to enjoy</th>
<th>I get a sort of frightened feeling like 'butterflies' in the stomach</th>
</tr>
</thead>
<tbody>
<tr>
<td>Definitely as much</td>
<td>Not at all</td>
</tr>
<tr>
<td>Not quite as much</td>
<td>Occasionally</td>
</tr>
<tr>
<td>Only a little</td>
<td>Quite often</td>
</tr>
<tr>
<td>Hardly at all</td>
<td>Very often</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>I get a sort of frightened feeling as if something very awful is about to happen</th>
<th>I have lost interest in my appearance</th>
</tr>
</thead>
<tbody>
<tr>
<td>Very definitely, and quite badly</td>
<td>Definitely</td>
</tr>
<tr>
<td>Yes, but not too badly</td>
<td>I don't take as much care as I should</td>
</tr>
<tr>
<td>A little, but it doesn't worry me</td>
<td>I may not take quite as much care</td>
</tr>
<tr>
<td>Not at all</td>
<td>I take just as much care as ever</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>I can laugh and see the funny side of things</th>
<th>I feel restless as if I have to be on the move</th>
</tr>
</thead>
<tbody>
<tr>
<td>As much as I always could</td>
<td>Very much indeed</td>
</tr>
<tr>
<td>Not quite so much now</td>
<td>Quite a lot</td>
</tr>
<tr>
<td>Definitely not so much now</td>
<td>Not very much</td>
</tr>
<tr>
<td>Not at all</td>
<td>Not at all</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Worrying thoughts go through my mind</th>
<th>I look forward with enjoyment to things</th>
</tr>
</thead>
<tbody>
<tr>
<td>A great deal of the time</td>
<td>As much as I ever did</td>
</tr>
<tr>
<td>A lot of the time</td>
<td>Rather less than I used to</td>
</tr>
<tr>
<td>Not too often</td>
<td>Definitely less than I used to</td>
</tr>
<tr>
<td>Very little</td>
<td>Hardly at all</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>I feel cheerful</th>
<th>I get sudden feelings of panic</th>
</tr>
</thead>
<tbody>
<tr>
<td>Never</td>
<td>Very often indeed</td>
</tr>
<tr>
<td>Not often</td>
<td>Quite often</td>
</tr>
<tr>
<td>Sometimes</td>
<td>Not very much</td>
</tr>
<tr>
<td>Most of the time</td>
<td>Not at all</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>I can sit at ease and feel relaxed</th>
<th>I can enjoy a good book, radio or TV programme</th>
</tr>
</thead>
<tbody>
<tr>
<td>Definitely</td>
<td>Often</td>
</tr>
<tr>
<td>Usually</td>
<td>Sometimes</td>
</tr>
<tr>
<td>Not often</td>
<td>Not often</td>
</tr>
<tr>
<td>Not at all</td>
<td>Very seldom</td>
</tr>
</tbody>
</table>
APPENDIX 1.3

Back Pain School: Client Survey

We are interested in finding out more about the people who attend the Back school. This will help us in providing a service that matches the needs of users. We would therefore be grateful if you could answer the questions set out below.

Please circle the relevant answers

Date of Birth ................................ Sex: Male Female

1. Occupation: Employed Unemployed Retired Housewife
   Absent due to ill health

2. Marital Status: Single Married/ Cohabiting Divorced Widow/er

3. What is your current level of pain?

We are interested in the level of pain you are currently experiencing. People agree that the following five words represent pain of increasing intensity. They are:

1 2 3 4 5
Mild Discomforting Distressing Horrible Excruciating

Please answer the questions below by writing the number of the most appropriate word on the line beside the question.

Which word describes your pain right now? ................................
Which word describes your pain at its worst? .................................
Which word describes your pain at its least? .................................

4. How much control do you have over your pain?

Based on the things you do to cope or deal with your back pain, on an average day, how much control do you feel you have over it? Please circle the number which best describes your current ability to control your pain.

0 1 2 3 4 5 6
No control Some control Complete control

Based on the things you do to cope or deal with your pain, on an average day, how much are you able decrease it? Please circle the number which best describes your current ability to control your pain.

0 1 2 3 4 5 6
Can’t decrease it at all Can decrease it somewhat Can decrease it completely
5. How physically active are you at present? Please tick the description that best describes your current level of exercise.

Fairly inactive (e.g. little or no exercise at all)  
Moderately active (e.g. walking, swimming, gentle exercise once or twice a week)  
Active (e.g. sport, or light gardening about twice a week)  
Very active (e.g. weight training, running, digging the garden more than twice a week)  

6. Does your back pain affect different activities in your life? In the list below, tick YES for each activity which is being affected by your pain, and NO for each activity not affected, or that does not apply to you.

At present is your pain causing problems with your  

<table>
<thead>
<tr>
<th>Activity</th>
<th>Yes</th>
<th>No</th>
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<tbody>
<tr>
<td>Job (i.e. paid employment)</td>
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<tr>
<td>Looking after your home (i.e. cleaning, cooking, repairs, etc.)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social life (i.e. going out, seeing friends)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Home life (i.e. relationships with people at home)</td>
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<tr>
<td>Sex life</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Interests and hobbies (i.e. sports, crafts, DIY)</td>
<td></td>
<td></td>
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<tr>
<td>Holidays</td>
<td></td>
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</table>

7. What would you like to get out of attending the back school? Please tick the line next to whichever answer(s) apply to you.

- A reduction in the amount of pain I am in  
- Information about the physical aspects of back pain  
- Information about how back pain might affect my life  
- Exercises to help me cope with back pain  
- An increase in the flexibility and strength of my back  
- Support from health professionals  
- Support from other people with back pain  
- Other (please specify in the space below)
Emotions can play a large part in most health problems. It is therefore important we identify what emotions are typically experienced by people using the back pain school, so that these emotional needs can be met. This part of the questionnaire is designed to help us know how you feel. Please read each item below and tick the reply which comes closest to how you have been feeling in the last week.

**I feel tense or 'wound up'**
- Most of the time
- A lot of the time
- From time to time, occasionally
- Not at all

**I feel as if I am slowed down**
- Nearly all the time
- Very often
- Sometimes
- Not at all

**I enjoy the things I used to enjoy**
- Definitely as much
- Not quite as much
- Only a little
- Hardly at all

**I get a sort of frightened feeling like 'butterflies' in the stomach**
- Not at all
- Occasionally
- Quite often
- Very often

**I get a sort of frightened feeling as if something very awful is about to happen**
- Very definitely, and quite badly
- Yes, but not too badly
- A little, but it doesn’t worry me
- Not at all

**I can laugh and see the funny side of things**
- As much as I always could
- Not quite so much now
- Definitely not so much now
- Not at all

**Worrying thoughts go through my mind**
- A great deal of the time
- A lot of the time
- Not too often
- Very little

**I feel restless as if I have to be on the move**
- Very much indeed
- Quite a lot
- Not very much
- Not at all

**I feel cheerful**
- Never
- Not often
- Sometimes
- Most of the time

**I get sudden feelings of panic**
- Very often indeed
- Quite often
- Not very much
- Not at all

**I can sit at ease and feel relaxed**
- Definitely
- Usually
- Not often
- Not at all

**I can enjoy a good book, radio or TV programme**
- Often
- Sometimes
- Not often
- Very seldom

Thank you for taking the time to complete this questionnaire.
APPENDIX 2: MAJOR PROJECT LITERATURE REVIEW

CONTENTS

<table>
<thead>
<tr>
<th>Appendix 2.1</th>
<th>Notes for Contributors: <em>Journal of Applied Research in Intellectual Disabilities</em></th>
<th>Page</th>
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<td>115</td>
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NOTES ON THE SUBMISSION OF MANUSCRIPTS

1. The journal aims to draw together the findings derived from original applied research undertaken in the UK and overseas, by authors from all professional disciplines, and to make these available to an international, multidisciplinary, readership. Theoretical papers will also be considered provided the implications for treatment are clear and important. The text should be written in the third person, in 'plain English'; descriptions should be clear and concise and terminology specific to a particular profession should be explained for the benefit of people in other professions. The term 'intellectual disabilities' should be used in preference to 'mental retardation', 'mental handicap', 'learning disabilities' or 'developmental disabilities'. Other terms may occasionally be acceptable under certain conditions. Full references to the sources of all statistical measures used must be supplied.

2. Articles should not normally exceed 7000 words.

3. Brief Reports should not normally exceed 2000 words.

4. Submissions for the Letters to the Editor section should be no more than 750 words in length.

5. Manuscripts should be typed, double-spaced on A4 paper, with ample left- and right-hand margins, on one side of the paper only. A cover page should contain only the title, thereby facilitating anonymous reviewing by three independent assessors. The first name and surname of each author, with details of their respective professional addresses, should be given on a separate page. Where there is more than one author, the address for correspondence should be indicated.

6. If presented on disc, we require files to be saved on an IBM-PC compatible 3.5 or 5.25 inch disc, or a 3.5 inch high-density AppleMac disc. Material should be saved in the author's normal word-processor format, together with a note of the name of the word-processor used. Tables and Figures should be saved in separate files from the rest of the manuscript.

7. An abstract should be included. This should not exceed 200 words.

8. To facilitate the production of the annual subject index, a list of key words (not more than six) should be provided, under which the paper may be indexed.

9. Four copies of the article must be submitted.

10. Footnotes should be avoided. Essential notes should be numbered in the text and grouped together at the end of the article. Diagrams and Figures, if they are considered essential, should be clearly related to the section of the text to which they refer. The original diagrams and figures should be submitted with the top copy. It is the responsibility of the author(s) to obtain all necessary permissions to reproduce copyrighted material, and to confirm in writing that such permissions have been granted.


12. References in the text of an article should be by the author's name and year of publication, as in these examples: Jones (1987) in a paper on ...; Jones (1978c) states that ...; evidence is given by Smith et al. (1984); further exploration of this aspect may be found in many sources (e.g. White, 1981a; Brown & Green, 1982; Jackson, 1983).

13. The Editors reserve the right to edit any contribution to ensure that it conforms with the requirements of the journal. The author of an article accepted for publication will receive page proofs for correction but this stage must not be used as an opportunity to revise the paper, because alterations are extremely costly; extensive changes will be charged to the author and will probably result in the article being delayed to a later issue. Speedy return of corrected proofs is important.

14. Copyright in any article accepted for publication in the journal is assigned to the publishers (BILD Publications) by the author(s) at the time of acceptance. The author(s) must confirm in an accompanying letter at the time of submission that the paper has not been published previously and will not be submitted for consideration elsewhere.

15. Authors will receive 5 copies of the journal, free of charge. Additional copies may be ordered when returning corrected proofs and a scale of charges will be sent at the appropriate time.

16. Contributions and queries should be sent to the Editors:

c/o Multilingual Matters Ltd, Frankfurt Lodge, Clevedon Hall, Victoria Road, Clevedon BS21 7HH, England.
## APPENDIX 3: MAJOR RESEARCH PROJECT PROPOSAL

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| Appendix 3.3 | Questionnaire 2: Recall of Specific Incident of Aggression | 123 |
| Appendix 3.4 | Questionnaire 3: Recall of General Example of Behaviour | 127 |
| Appendix 3.5 | Ethical Approval Document | 130 |
APPENDIX 3.1

1.1 Applicants - names and addresses including the names of co-workers and supervisor(s) if known

1.2 Title - no more than 15 words

1.3 Summary - No more than 300 words, including a reference to where the study will be carried out.

1.4 Introduction - of less than 600 words summarising previous work in the field, drawing attention to gaps in present knowledge and stating how the project will add to knowledge and understanding

1.5 Aims and hypotheses to be tested - these should wherever possible be stated as a list of questions to which answers will be sought.

1.6 Plan of investigation - consisting of a statement of the practical details of how it is proposed to obtain answers to the questions posed. The proposal should contain information on Research Methods and Design i.e.

   1.6.1 Subjects - a brief statement of inclusion and exclusion criteria and anticipated number of participants

   1.6.2 Measures - a brief explanation of interviews / observations / rating scales etc. to be employed, including references where appropriate.

   1.6.3 Design and Procedure - a brief explanation of the overall experimental design with references to comparisons to be made, control populations, timing of measurements etc., A summary chart may be helpful to explain the research process.

   1.6.4 Settings and equipment - a statement on the location(s) to be used and resources or equipment which will be employed (if any)

   1.6.5 Data analysis - a brief explanation of how data will be collected, stored and analysed

1.7 Practical Applications - the applicants should state the practical use to which the research findings could be put

1.8 Timescales - the proposed starting date and duration of the project

1.9 Ethical Approval - stating whether this is necessary and if so, whether it has been obtained
APPENDIX 3.2

A person with a learning disability is aggressive to others by pulling hair, or hitting out

Write down the possible causes of this behaviour

Underline what you think is the most likely reason: thinking of this reason please show your agreement with the following statements by circling one number.

1. Was this due to the person, or due to other people or circumstances?
   It is totally due to others 1 2 3 4 5 6 7 It is totally due to the person

2. If this behaviour happens over a long period of time will it be for the same reason?
   Never for the same reason 1 2 3 4 5 6 7 Always for the same reason

3. Does this reason apply to just this situation or all situations in the person's life?
   Just this situation 1 2 3 4 5 6 7 All situations

4. Is the reason under the person's control?
   Not under his control 1 2 3 4 5 6 7 Totally under his control

How would this behaviour make you feel? Circle one number

Not angry at all 1 2 3 4 5 6 7 Extremely angry
Not happy at all 1 2 3 4 5 6 7 Extremely happy
Not sad at all 1 2 3 4 5 6 7 Extremely sad
Not sympathetic at all 1 2 3 4 5 6 7 Extremely sympathetic
Not frightened at all 1 2 3 4 5 6 7 Extremely frightened
Not disgusted at all 1 2 3 4 5 6 7 Extremely disgusted
Not relaxed at all 1 2 3 4 5 6 7 Extremely relaxed

Given your experience with this type of problem, how much do you agree with the following statements?

All one can do for a person with this behaviour is look after their basic physical needs
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

A person will always have this behaviour once they have developed it
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

This type of behaviour is usually so well established that it will not respond to treatment programmes
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

Given your experience with this type of behaviour how much extra effort would you be prepared to put in to help the person

As much extra effort as possible 1 2 3 4 5 6 7 No extra effort at all
A person with a learning disability is aggressive to others by pulling hair, or hitting out

**How bad is this behaviour?**

<table>
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<tr>
<th>Not bad at all</th>
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**How bad is the person when they show this behaviour?**

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**How responsible do you think the person is for the development of this behaviour?**

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**How responsible do you think other people have been for the development of this behaviour?**

<table>
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<tr>
<td>Not responsible at all</td>
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**How responsible is the person for any future change in the behaviour?**

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<th>Totally responsible</th>
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<th>6</th>
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<tr>
<td>Not responsible at all</td>
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**How responsible are you for future change in this behaviour?**

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<tbody>
<tr>
<td>Not responsible at all</td>
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**What would you do about this behaviour? Please write the first thing you can think of...**
A person with a learning disability repeatedly hits themselves hard on the head, so that they cause bruising

Write down the possible causes of this behaviour

Underline what you think is the most likely reason: thinking of this reason please show your agreement with the following statements by circling one number.

1. Was this due to the person, or due to other people or circumstances?
   It is totally due to others 1 2 3 4 5 6 7 It is totally due to the person

2. If this behaviour happens over a long period of time will it be for the same reason?
   Never for the same reason 1 2 3 4 5 6 7 Always for the same reason

3. Does this reason apply to just this situation or all situations in the person’s life?
   Just this situation 1 2 3 4 5 6 7 All situations

4. Is the reason under the person’s control?
   Not under his control 1 2 3 4 5 6 7 Totally under his control

How would this behaviour make you feel? Circle one number

- Not angry at all 1 2 3 4 5 6 7 Extremely angry
- Not happy at all 1 2 3 4 5 6 7 Extremely happy
- Not sad at all 1 2 3 4 5 6 7 Extremely sad
- Not sympathetic at all 1 2 3 4 5 6 7 Extremely sympathetic
- Not frightened at all 1 2 3 4 5 6 7 Extremely frightened
- Not disgusted at all 1 2 3 4 5 6 7 Extremely disgusted
- Not relaxed at all 1 2 3 4 5 6 7 Extremely relaxed

Given your experience with this type of problem, how much do you agree with the following statements?

All one can do for a person with this behaviour is look after their basic physical needs
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

A person will always have this behaviour once they have developed it
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

This type of behaviour is usually so well established that it will not respond to treatment programmes
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

Given your experience with this type of behaviour how much extra effort would you be prepared to put in to help the person

- As much extra effort as possible 1 2 3 4 5 6 7 No extra effort at all

A person with a learning disability repeatedly hits themselves hard on the head, so that they cause bruising
### How bad is this behaviour?

<table>
<thead>
<tr>
<th>Not bad at all</th>
<th>Totally bad</th>
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<tr>
<td>1 2 3 4 5 6 7</td>
<td>1 2 3 4 5 6 7</td>
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### How bad is the person when they show this behaviour?

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<th>Not bad at all</th>
<th>Totally bad</th>
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<td>1 2 3 4 5 6 7</td>
<td>1 2 3 4 5 6 7</td>
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### How responsible do you think the person is for the development of this behaviour?

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<tr>
<th>Totally responsible</th>
<th>Not responsible at all</th>
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</thead>
<tbody>
<tr>
<td>1 2 3 4 5 6 7</td>
<td>1 2 3 4 5 6 7</td>
</tr>
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</table>

### How responsible do you think other people have been for the development of this behaviour?

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<tr>
<th>Totally responsible</th>
<th>Not responsible at all</th>
</tr>
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<tbody>
<tr>
<td>1 2 3 4 5 6 7</td>
<td>1 2 3 4 5 6 7</td>
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</table>

### How responsible is the person for any future change in the behaviour?

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<tr>
<th>Totally responsible</th>
<th>Not responsible at all</th>
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<tbody>
<tr>
<td>1 2 3 4 5 6 7</td>
<td>1 2 3 4 5 6 7</td>
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### How responsible are you for future change in this behaviour?

<table>
<thead>
<tr>
<th>Totally responsible</th>
<th>Not responsible at all</th>
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</thead>
<tbody>
<tr>
<td>1 2 3 4 5 6 7</td>
<td>1 2 3 4 5 6 7</td>
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</table>

### What would you do about this behaviour? Please write the first thing you can think of...

A person with a learning disability repeatedly rocks their body by moving their weight from one foot to another
Write down the possible causes of this behaviour

Underline what you think is the most likely reason: thinking of this reason please show your agreement with the following statements by circling one number.

1. Was this due to the person, or due to other people or circumstances?
   - It is totally due to others 1 2 3 4 5 6 7
   - It is totally due to the person

2. If this behaviour happens over a long period of time will it be for the same reason?
   - Never for the same reason 1 2 3 4 5 6 7
   - Always for the same reason

3. Does this reason apply to just this situation or all situations in the person's life?
   - Just this situation 1 2 3 4 5 6 7
   - All situations

4. Is the reason under the person's control?
   - Not under his control 1 2 3 4 5 6 7
   - Totally under his control

How would this behaviour make you feel? Circle one number

- Not angry at all 1 2 3 4 5 6 7 Extremely angry
- Not happy at all 1 2 3 4 5 6 7 Extremely happy
- Not sad at all 1 2 3 4 5 6 7 Extremely sad
- Not sympathetic at all 1 2 3 4 5 6 7 Extremely sympathetic
- Not frightened at all 1 2 3 4 5 6 7 Extremely frightened
- Not disgusted at all 1 2 3 4 5 6 7 Extremely disgusted
- Not relaxed at all 1 2 3 4 5 6 7 Extremely relaxed

Given your experience with this type of problem, how much do you agree with the following statements?

- All one can do for a person with this behaviour is look after their basic physical needs
  - Strongly agree 1 2 3 4 5 6 7 Strongly disagree

- A person will always have this behaviour once they have developed it
  - Strongly agree 1 2 3 4 5 6 7 Strongly disagree

- This type of behaviour is usually so well established that it will not respond to treatment programmes
  - Strongly agree 1 2 3 4 5 6 7 Strongly disagree

Given your experience with this type of behaviour how much extra effort would you be prepared to put in to help the person

- As much extra effort as possible 1 2 3 4 5 6 7 No extra effort at all
A person with a learning disability repeatedly rocks their body by moving their weight from one foot to another.

**How bad is this behaviour?**

It is not bad at all 1 2 3 4 5 6 7 It is totally bad

**How bad is the person when they show this behaviour?**

They are not bad at all 1 2 3 4 5 6 7 They are totally bad

**How responsible do you think the person is for the development of this behaviour?**

They are totally responsible 1 2 3 4 5 6 7 They are not responsible at all

**How responsible do you think other people have been for the development of this behaviour?**

Other people are totally responsible 1 2 3 4 5 6 7 Other people are not responsible at all

**How responsible is the person for any future change in the behaviour?**

They are totally responsible 1 2 3 4 5 6 7 They are not responsible at all

**How responsible are you for future change in this behaviour?**

I am totally responsible 1 2 3 4 5 6 7 I am not responsible at all

**What would you do about this behaviour? Please write the first thing you can think of...**
APPENDIX 3.3

Recall of a Specific Incident of Aggression

1. When was the last time X behaved aggressively when you were present?

2. Can you describe what happened?

3. Why do you think X behaved as he did?

4. How did you feel at the time this incident happened?

5. What do you think made you feel like this?

6. What did you do about X’s behaviour?

7. Why did you choose this form of response?
With the incident you have just described in mind, can you complete the following questions

What is the most likely reason for X’s behaviour?

Thinking of this reason please show your agreement with the following statements by circling one number.

1. Is this due to X, or due to other people or circumstances?
   It is totally due to others 1 2 3 4 5 6 7 It is totally due to X

2. If this behaviour happens over a long period of time will it be for the same reason?
   Never for the same reason 1 2 3 4 5 6 7 Always for the same reason

3. Does this reason apply to just this situation or all situations in X’s life?
   Just this situation 1 2 3 4 5 6 7 All situations

4. Is the reason under X’s control?
   Not under their control 1 2 3 4 5 6 7 Totally under their control

How did this behaviour make you feel? Circle one number

Not angry at all 1 2 3 4 5 6 7 Extremely angry
Not happy at all 1 2 3 4 5 6 7 Extremely happy
Not sad at all 1 2 3 4 5 6 7 Extremely sad
Not sympathetic at all 1 2 3 4 5 6 7 Extremely sympathetic
Not frightened at all 1 2 3 4 5 6 7 Extremely frightened
Not disgusted at all 1 2 3 4 5 6 7 Extremely disgusted
Not relaxed at all 1 2 3 4 5 6 7 Extremely relaxed

How much do you agree with the following statements?

All one can do for X is look after his basic physical needs
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

X will always have this behaviour now he has developed it
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

This type of behaviour is probably so well established that it will not respond to treatment programmes
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

Given your experience with this behaviour how much extra effort would you be prepared to put in to help X

As much extra effort as possible 1 2 3 4 5 6 7 No extra effort at all
Still thinking of the behaviour you have described, can you answer the following questions

### How bad is X's behaviour?

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<th>It is totally bad</th>
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### How bad is X when he showed this behaviour?

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<th>He is totally bad</th>
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### How responsible do you think X is for the development of this behaviour?

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<th>6</th>
<th>7</th>
<th>He is not responsible at all</th>
</tr>
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</table>

### How responsible do you think other people have been for the development of this behaviour?

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<th>6</th>
<th>7</th>
<th>Other people are not responsible at all</th>
</tr>
</thead>
</table>

### How responsible is X for any future change in his behaviour?

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<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>He is not responsible at all</th>
</tr>
</thead>
</table>

### How responsible are you for future change in this behaviour?

<table>
<thead>
<tr>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>I am not responsible at all</th>
</tr>
</thead>
</table>
APPENDIX 3.4

Recall of an incident of aggression

1. Can you describe a typical example of X when he behaves in an aggressive manner?

2. Have you been present during such an incident?

3. Why do you think X behaves aggressively?

4. How would you feel during such an incident?

5. Why do you think you would feel like this?

6. What would you do about this behaviour? Please write the first thing you can think of...

7. Why would you choose this form of response?
Thinking of X, when he behaves in an aggressive manner, please complete the following questions

What is the most likely reason for his behaviour

Thinking of this reason please show your agreement with the following statements by circling one number.

1. Is this due to X, or due to other people or circumstances?
   - It is totally due to others 1 2 3 4 5 6 7
   - It is totally due to X

2. If this behaviour happens over a long period of time will it be for the same reason?
   - Never for the same reason 1 2 3 4 5 6 7
   - Always for the same reason

3. Does this reason apply to just this situation or all situations in X's life?
   - Just this situation 1 2 3 4 5 6 7
   - All situations

4. Is the reason under X's control?
   - Not under their control 1 2 3 4 5 6 7
   - Totally under their control

How would this behaviour make you feel? Circle one number

- Not angry at all 1 2 3 4 5 6 7
- Not happy at all 1 2 3 4 5 6 7
- Not sad at all 1 2 3 4 5 6 7
- Not sympathetic at all 1 2 3 4 5 6 7
- Not frightened at all 1 2 3 4 5 6 7
- Not disgusted at all 1 2 3 4 5 6 7
- Not relaxed at all 1 2 3 4 5 6 7

How much do you agree with the following statements?

- All one can do for a person with this behaviour is look after their basic physical needs
  - Strongly agree 1 2 3 4 5 6 7
  - Strongly disagree

- A person will always have this behaviour once they have developed it
  - Strongly agree 1 2 3 4 5 6 7
  - Strongly disagree

- This type of behaviour is usually so well established that it will not respond to treatment programmes
  - Strongly agree 1 2 3 4 5 6 7
  - Strongly disagree

Given your experience with this type of behaviour, how much extra effort would you be prepared to put in to help the person?

- As much extra effort as possible 1 2 3 4 5 6 7
- No extra effort at all
Still thinking of X, can you answer the following questions

How bad is X's behaviour?
- It is not bad at all  1 2 3 4 5 6 7
- It is totally bad

How bad is X when he shows this behaviour?
- He is not bad at all  1 2 3 4 5 6 7
- He is totally bad

How responsible do you think X is for the development of this behaviour?
- They are totally responsible  1 2 3 4 5 6 7
- They are not responsible at all

How responsible do you think other people have been for the development of this behaviour?
- Other people are totally responsible  1 2 3 4 5 6 7
- Other people are not responsible at all

How responsible is X for any future change in his behaviour?
- He is totally responsible  1 2 3 4 5 6 7
- He is not responsible at all

How responsible are you for future change in this behaviour?
- I am totally responsible  1 2 3 4 5 6 7
- I am not responsible at all
Ms L Wanless  
Academic Centre  
Gartnavel Royal Hospital  
1055 Great Western Road  
Glasgow  
G12 0HX  

Dear Ms Wanless

PROJECT: The responses of day centre staff to challenging behaviour in adults with a learning disability: a cognitive emotional analysis

Many thanks for sending the required amendments to the Research Ethics Committee. These were discussed at the Committee meeting on Thursday 12th August 1999. I am pleased to be able to tell you that the Committee now has no objections from an ethical point of view to this project proceeding and ethical approval is formally granted.

I would also like to take this opportunity to remind you that you should notify the Committee if there are any changes or untoward developments connected with the study. The Committee would then require to further reconsider your application for approval. The Committee would be grateful if a brief final report on your project could be forwarded to the Committee when the project reaches its conclusion. The Committee would also be grateful to receive regular reports on your submission and failure to do so could result in ethical approval being withdrawn.

May I wish you every success with your study.

Yours sincerely

A W McMAHON  
Administrator – Research Ethics Committee
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NOTES ON THE SUBMISSION OF MANUSCRIPTS

1. The journal aims to draw together the findings derived from original applied research undertaken in the UK and overseas, by authors from all professional disciplines, and to make these available to an international, multidisciplinary, readership. Theoretical papers will also be considered provided the implications for treatment are clear and important. The text should be written in the third person, in 'plain English'; descriptions should be clear and concise and terminology specific to a particular profession should be explained for the benefit of people in other professions. The term 'intellectual disabilities' should be used in preference to 'mental retardation', 'mental handicap', 'learning disabilities' or 'developmental disabilities'. Other terms may occasionally be acceptable under certain conditions. Full references to the sources of all statistical measures used must be supplied.

2. Articles should not normally exceed 7000 words.

3. Brief Reports should not normally exceed 2000 words.

4. Submissions for the Letters to the Editor section should be no more than 750 words in length.

5. Manuscripts should be typed, double-spaced on A4 paper, with ample left- and right-hand margins, on one side of the paper only. A cover page should contain only the title, thereby facilitating anonymous reviewing by three independent assessors. The first name and surname of each author, with details of their respective professional addresses, should be given on a separate page. Where there is more than one author, the address for correspondence should be indicated.

6. If presented on disc, we require files to be saved on an IBM-PC compatible 3.5 or 5.25 inch disc, or a 3.5 inch high-density AppleMac disc. Material should be saved in the author's normal word-processor format, together with a note of the name of the word-processor used. Tables and Figures should be saved in separate files from the rest of the manuscript.

7. An abstract should be included. This should not exceed 200 words.

8. To facilitate the production of the annual subject index, a list of key words (not more than six) should be provided, under which the paper may be indexed.

9. Four copies of the article must be submitted.

10. Footnotes should be avoided. Essential notes should be numbered in the text and grouped together at the end of the article. Diagrams and Figures, if they are considered essential, should be clearly related to the section of the text to which they refer. The original diagrams and figures should be submitted with the top copy. It is the responsibility of the author(s) to obtain all necessary permissions to reproduce copyrighted material, and to confirm in writing that such permissions have been granted.


12. References in the text of an article should be by the author's name and year of publication, as in these examples: Jones (1987) in a paper on ... Jones (1978c) states that ...; evidence is given by Smith et al. (1984) ... Further exploration of this aspect may be found in many sources (e.g. White, 1981a; Brown & Green, 1982; Jackson, 1983).

13. The Editors reserve the right to edit any contribution to ensure that it conforms with the requirements of the journal. The author of an article accepted for publication will receive page proofs for correction but this stage must not be used as an opportunity to revise the paper, because alterations are extremely costly; extensive changes will be charged to the author and will probably result in the article being delayed to a later issue. Speedy return of corrected proofs is important.

14. Copyright in any article accepted for publication in the journal is assigned to the publishers (BILD Publications) by the author(s) at the time of acceptance. The author(s) must confirm in an accompanying letter at the time of submission that the paper has not been published previously and will not be submitted for consideration elsewhere.

15. Authors will receive 5 copies of the journal, free of charge. Additional copies may be ordered when returning corrected proofs and a scale of charges will be sent at the appropriate time.

16. Contributions and queries should be sent to the Editors:

c/o Multilingual Matters Ltd, Frankfurt Lodge, Clevedon Hall, Victoria Road, Clevedon BS21 7HH, England.
APPENDIX 4.2

Information Sheet

Centre: __________________________________________

Profession/position: __________________________________________

Initials: ________ Age: ________ Male / Female

WORK HISTORY

1. How long have you worked in the centre?

   < 1yr  1-5yrs  6-10yrs  >10yrs

2. How long have you worked in learning disability services?

   < 1yr  1-5yrs  6-10yrs  >10yrs

3. What do you regard as the key aspects of your role in the centre?

   ... Trainer / Instructor  ... Provider of practical support
   ... Supervisor  ... Provider of emotional support
   ... Creation of positive social environment  ... Planning and development of services / activities
   ... Identification of needs of client  ... Advocacy

4. What do you enjoy about your work?

   ... Social interaction with clients  ... Developing activities
   ... Variety of job  ... Opportunity to learn new skills
   ... Helping / supporting others  ... Work atmosphere

5. What are the challenges you face working in this centre?

   Organisational
   ... Staff shortages
   ... Lack of support from management
   ... Lack of involvement in decision making
   ... Lack of facilities

   Personal
   ... Boredom
   ... Lack of skills for demands of job
TRAINING

1. What formal training in CB have you received?

<table>
<thead>
<tr>
<th>... None</th>
<th>... Distance learning</th>
</tr>
</thead>
<tbody>
<tr>
<td>... In house training</td>
<td>... Other</td>
</tr>
<tr>
<td>... Workshops</td>
<td></td>
</tr>
</tbody>
</table>

2. Is this sufficient for the work you carry out? Yes / No

3. What has been the most useful information source with regards how to respond to an incident of CB?

<table>
<thead>
<tr>
<th>... Personal Experience</th>
<th>... Other staff</th>
</tr>
</thead>
<tbody>
<tr>
<td>... Formal Training</td>
<td>... Management</td>
</tr>
<tr>
<td></td>
<td>... Outside professionals e.g. Nursing, Psychology etc.</td>
</tr>
</tbody>
</table>

WORK WITH X

1. How long have you worked with X?

<table>
<thead>
<tr>
<th>6 -12 mths</th>
<th>1-5 yrs</th>
<th>6 -10 yrs</th>
<th>&gt; 10 yrs</th>
</tr>
</thead>
</table>

2. On average how much contact do you have with X?

- Structured group activities
  - ... Frequent contact every day
  - ... Occasional contact every day
  - ... Every other day
  - ... Once / twice a week
  - ... < once a week

- Informal social interaction
  - ... Frequent contact every day
  - ... Occasional contact every day
  - ... Every other day
  - ... Once / twice a week
  - ... < once a week
APPENDIX 4.3

A person with a learning disability is aggressive by pulling your hair, or hitting out at you

Write down the possible causes of this behaviour

Underline what you think is the most likely reason: thinking of this reason please show your agreement with the following statements by circling one number.

1. Was this due to the person, or due to other people or circumstances?

   It is totally due to others 1 2 3 4 5 6 7
   It is totally due to the person

2. If this behaviour happens over a long period of time will it be for the same reason?

   Never for the same reason 1 2 3 4 5 6 7
   Always for the same reason

3. Does this reason apply to just this situation or all situations in the person's life?

   Just this situation 1 2 3 4 5 6 7
   All situations

4. Is the reason under the person's control?

   Not under his control 1 2 3 4 5 6 7
   Totally under his control

How would this behaviour make you feel? Circle one number

Not angry at all 1 2 3 4 5 6 7
Extremely angry

Not happy at all 1 2 3 4 5 6 7
Extremely happy

Not sad at all 1 2 3 4 5 6 7
Extremely sad

Not sympathetic at all 1 2 3 4 5 6 7
Extremely sympathetic

Not frightened at all 1 2 3 4 5 6 7
Extremely frightened

Not disgusted at all 1 2 3 4 5 6 7
Extremely disgusted

Not relaxed at all 1 2 3 4 5 6 7
Extremely relaxed

Given your experience with this type of problem, how much do you agree with the following statements?

All one can do for a person with this behaviour is look after their basic physical needs

   Strongly agree 1 2 3 4 5 6 7
   Strongly disagree

A person will always have this behaviour once they have developed it

   Strongly agree 1 2 3 4 5 6 7
   Strongly disagree

This type of behaviour is usually so well established that it will not respond to treatment programmes

   Strongly agree 1 2 3 4 5 6 7
   Strongly disagree

Given your experience with this type of behaviour how much extra effort would you be prepared to put in to help the person

As much extra effort as possible 1 2 3 4 5 6 7
No extra effort at all
A person with a learning disability is aggressive by pulling your hair, or hitting out at you

**How bad is this behaviour?**

<table>
<thead>
<tr>
<th>Rating</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>It is not bad at all</td>
</tr>
<tr>
<td>2</td>
<td>It is moderately bad</td>
</tr>
<tr>
<td>3</td>
<td>It is bad</td>
</tr>
<tr>
<td>4</td>
<td>It is very bad</td>
</tr>
<tr>
<td>5</td>
<td>It is totally bad</td>
</tr>
</tbody>
</table>

**How bad is the person when they show this behaviour?**

<table>
<thead>
<tr>
<th>Rating</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>They are not bad at all</td>
</tr>
<tr>
<td>2</td>
<td>They are moderately bad</td>
</tr>
<tr>
<td>3</td>
<td>They are bad</td>
</tr>
<tr>
<td>4</td>
<td>They are very bad</td>
</tr>
<tr>
<td>5</td>
<td>They are totally bad</td>
</tr>
</tbody>
</table>

**How responsible do you think the person is for the development of this behaviour?**

<table>
<thead>
<tr>
<th>Rating</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>They are not responsible at all</td>
</tr>
<tr>
<td>2</td>
<td>They are slightly responsible</td>
</tr>
<tr>
<td>3</td>
<td>They are moderately responsible</td>
</tr>
<tr>
<td>4</td>
<td>They are totally responsible</td>
</tr>
</tbody>
</table>

**How responsible do you think other people have been for the development of this behaviour?**

<table>
<thead>
<tr>
<th>Rating</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Other people are not responsible at all</td>
</tr>
<tr>
<td>2</td>
<td>Other people are slightly responsible</td>
</tr>
<tr>
<td>3</td>
<td>Other people are moderately responsible</td>
</tr>
<tr>
<td>4</td>
<td>Other people are totally responsible</td>
</tr>
</tbody>
</table>

**How responsible is the person for any future change in the behaviour?**

<table>
<thead>
<tr>
<th>Rating</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>They are not responsible at all</td>
</tr>
<tr>
<td>2</td>
<td>They are slightly responsible</td>
</tr>
<tr>
<td>3</td>
<td>They are moderately responsible</td>
</tr>
<tr>
<td>4</td>
<td>They are totally responsible</td>
</tr>
</tbody>
</table>

**How responsible are you for future change in this behaviour?**

<table>
<thead>
<tr>
<th>Rating</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>You are not responsible at all</td>
</tr>
<tr>
<td>2</td>
<td>You are slightly responsible</td>
</tr>
<tr>
<td>3</td>
<td>You are moderately responsible</td>
</tr>
<tr>
<td>4</td>
<td>You are totally responsible</td>
</tr>
</tbody>
</table>

**What would you do about this behaviour? Please write the first thing you can think of...**
A person with a learning disability is aggressive by swearing at you, and being abusive towards you

Write down the possible causes of this behaviour

Underline what you think is the most likely reason: thinking of this reason please show your agreement with the following statements by circling one number.

1. Was this due to the person, or due to other people or circumstances?
   It is totally due to others 1 2 3 4 5 6 7 It is totally due to the person
2. If this behaviour happens over a long period of time will it be for the same reason?
   Never for the same reason 1 2 3 4 5 6 7 Always for the same reason
3. Does this reason apply to just this situation or all situations in the person's life?
   Just this situation 1 2 3 4 5 6 7 All situations
4. Is the reason under the person's control?
   Not under his control 1 2 3 4 5 6 7 Totally under his control

How would this behaviour make you feel? Circle one number

Not angry at all 1 2 3 4 5 6 7 Extremely angry
Not happy at all 1 2 3 4 5 6 7 Extremely happy
Not sad at all 1 2 3 4 5 6 7 Extremely sad
Not sympathetic at all 1 2 3 4 5 6 7 Extremely sympathetic
Not frightened at all 1 2 3 4 5 6 7 Extremely frightened
Not disgusted at all 1 2 3 4 5 6 7 Extremely disgusted
Not relaxed at all 1 2 3 4 5 6 7 Extremely relaxed

Given your experience with this type of problem, how much do you agree with the following statements?

All one can do for a person with this behaviour is look after their basic physical needs
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree
A person will always have this behaviour once they have developed it
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree
This type of behaviour is usually so well established that it will not respond to treatment programmes
   Strongly agree 1 2 3 4 5 6 7 Strongly disagree

Given your experience with this type of behaviour how much extra effort would you be prepared to put in to help the person

As much extra effort as possible 1 2 3 4 5 6 7 No extra effort at all
A person with a learning disability is aggressive by swearing at you, and being abusive towards you

How bad is this behaviour?

| It is not bad at all | 1 2 3 4 5 6 7 | It is totally bad |

How bad is the person when they show this behaviour?

| They are not bad at all | 1 2 3 4 5 6 7 | They are totally bad |

How responsible do you think the person is for the development of this behaviour?

| They are totally responsible | 1 2 3 4 5 6 7 | They are not responsible at all |

How responsible do you think other people have been for the development of this behaviour?

| Other people are totally responsible | 1 2 3 4 5 6 7 | Other people are not responsible at all |

How responsible is the person for any future change in the behaviour?

| They are totally responsible | 1 2 3 4 5 6 7 | They are not responsible at all |

How responsible are you for future change in this behaviour?

| I am totally responsible | 1 2 3 4 5 6 7 | I am not responsible at all |

What would you do about this behaviour? Please write the first thing you can think of...
APPENDIX 4.4

RECALL OF AN INCIDENT OF AGGRESSION

Think of an incident involving X that still bothers/upsets you when you think about it.

ACTIVATING EVENT

Can you tell me what happened?

| On a scale of 1 –10, how aggressively would you rate X’s behaviour? |
|---|---|---|---|---|---|---|---|---|---|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
| (Not at all aggressive) |  |  |  |  |  |  |  |  |  | (Extremely aggressive) |

EMOTION

How you were feeling as X ...?

| Again on a scale of 1 –10, how strong would you say that feeling was? |
|---|---|---|---|---|---|---|---|---|---|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
| (Neutral) |  |  |  |  |  |  |  |  | (Max.) |
BELIEFS

OTHER-SELF:
What was it about X’s behaviour that made you feel ...

When X was doing ... how do you feel you were being treated / s/he was treating you? (Perceived motivation behind X’s behaviour)

SELF-SELF:
Did you think X’s behaviour was understandable?

How justifiable did you feel X’s behaviour was?

SELF-OTHER:
What did you think of X for behaving as s/he did? / When you were feeling really ... what kind of person did you think X was?
ACTION

Given that you were feeling ... about X doing ... what did you want to do at that moment in time?
What was instinctive / impulsive reaction to that feeling? (E.g. If angry feeling what was the angry impulse that went along with that?)

What might have happened if you had done that?

What stopped you from reacting like this?
APPENDIX 4.5

Keeping in mind the incident you have just described, and how it made you feel and react, please complete the following questions.

What do you think is the most likely reason for X’s behaviour?

Thinking of this reason please show your agreement with the following statements by circling one number.

1. Is this reason for X’s behaviour due to X, or due to other people or circumstances?
   - It is totally due to others 1 2 3 4 5 6 7 It is totally due to X
2. If this behaviour happens over a long period of time will it be for the same reason?
   - Never for the same reason 1 2 3 4 5 6 7 Always for the same reason
3. Does this reason apply to just this situation or all situations in X’s life?
   - Just this situation 1 2 3 4 5 6 7 All situations
4. Is the reason for X’s behaviour under X’s control?
   - Not under his control 1 2 3 4 5 6 7 Totally under his control

How did this behaviour make you feel? Circle one number.

- Not angry at all 1 2 3 4 5 6 7 Extremely angry
- Not happy at all 1 2 3 4 5 6 7 Extremely happy
- Not sad at all 1 2 3 4 5 6 7 Extremely sad
- Not sympathetic at all 1 2 3 4 5 6 7 Extremely sympathetic
- Not frightened at all 1 2 3 4 5 6 7 Extremely frightened
- Not disgusted at all 1 2 3 4 5 6 7 Extremely disgusted
- Not relaxed at all 1 2 3 4 5 6 7 Extremely relaxed

How much do you agree with the following statements?

All one can do for X is look after his basic physical needs
- Strongly agree 1 2 3 4 5 6 7 Strongly disagree

X will always have this behaviour now he has developed it
- Strongly agree 1 2 3 4 5 6 7 Strongly disagree

This type of behaviour is probably so well established that it will not respond to treatment programmes
- Strongly agree 1 2 3 4 5 6 7 Strongly disagree

Given your experience with this behaviour how much extra effort would you be prepared to put in to help X?
- As much extra effort as possible 1 2 3 4 5 6 7 No extra effort at all
Still thinking of the behaviour you have described, can you answer the following questions

How bad is X's behaviour?
It is not bad at all 1 2 3 4 5 6 7 It is totally bad

How bad is X when he showed this behaviour?
He is not bad at all 1 2 3 4 5 6 7 He is totally bad

How responsible do you think X is for the development of this behaviour?
He is totally responsible 1 2 3 4 5 6 7 He is not responsible at all

How responsible do you think other people have been for the development of this behaviour?
Other people are totally responsible 1 2 3 4 5 6 7 Other people are not responsible at all

How responsible is X for any future change in his behaviour?
He is totally responsible 1 2 3 4 5 6 7 He is not responsible at all

How responsible are you for future change in this behaviour?
I am totally responsible 1 2 3 4 5 6 7 I am not responsible at all