The Use of Physical Interventions with People with Intellectual Disabilities and Challenging Behaviour – the Experiences of Service Users and Staff Members

Sarah Hawkins*, David Allen† and Rosemary Jenkins‡


Accepted for publication 23 July 2004

Background  The views of both service users with intellectual disability and their support staff on the use of physical interventions are largely unknown. The research that does exist describes a largely negative pattern of responses. The present study aimed to explore the personal impact of receiving and implementing physical interventions, and also how service users and staff felt the use of such procedures impacted on each other.

Method  Eight service user/staff pairs were interviewed about their experiences of physical intervention within 1 week of their mutual involvement in a behavioural incident requiring restraint use. A qualitative methodology was employed to obtain views on a non-pain compliance approach to physical intervention.

Results  Service user and staff experiences were intrinsically linked, highlighting the interactional nature of physical interventions. It was apparent that experiences of physical intervention were dependent on far more than the application of techniques alone.

Conclusions  Participants’ accounts were primarily negative. Service user and staff experiences were clearly affected by their appraisals of each other’s behaviour throughout the physical intervention process.

Keywords: intellectual disabilities, physical restraint, service user, staff views

Introduction

Contemporary approaches to working with people who have intellectual disabilities and challenging behaviour differentiate between proactive behaviour change strategies and reactive behaviour management strategies (Allen 2003). The former enable service users to develop adaptive, functionally equivalent or functionally alternative behaviours in the long term. They include ecological change, antecedent change, skill development and differential reinforcement. In contrast, behaviour management strategies enable carers to respond safely and efficiently to episodes of challenging behaviour when they occur. They are generally designed to be used in the short term, and include non-physical procedures such as distraction and defusion strategies, and physical interventions such as ‘breakaway’ techniques and restraint. The latter is of two main types – manual or mechanical. In manual restraint, pressure is applied by one or more carers in order to restrict the movement of a service user. In mechanical restraint this result is obtained via the use of materials or equipment such as ties, belts or splints. Seclusion may also be regarded as a form of physical intervention as, by definition, placing someone in seclusion will involve a degree of ‘hands-on’ contact.

Within the UK, the use of manual restraint appears much more prevalent than mechanical, with upwards of 50–60% of children and adults with intellectual disabilities and challenging behaviour experiencing this type of restraint on a regular basis (Emerson 2003). Considerable concern has been expressed about methods of manual restraint that depend on inflicting pain on service users...
users for their effectiveness, notably in relation to one particular approach, Control & Restraint (C&R). C&R was originally designed for use in the UK prison service, but was then cascaded, initially with little or no modification, into a range of care settings. Anxieties about the ethics and legalities of such approaches has led to the creation of a ‘new wave’ of approaches to physical intervention that have rejected the use of procedures deliberately designed to inflict pain (e.g. McDonnell et al. 1993; Stirling & McHugh 1997; Baker & Bissmire 2000; Allen et al. 2003).

Physical interventions are dynamic social events in which the attitudes and perceptions of the parties involved are enmeshed (Sequeira & Halstead 2002). Despite the intrusive nature of these procedures, there is very little published research into the views of those who receive and carry out the interventions.

While the existing service user research describes a largely negative pattern of responses (e.g. Sheridan et al. 1990; Sundram et al. 1994; Mason 1995; Meehan et al. 2000; Sequeira & Halstead 2002), it also has a number of significant limitations. First, it consists largely of retrospective surveys. The validity of retrospective data is questionable because it relies heavily on recall memory, which may be poor in certain populations of service users, such as those with intellectual disabilities or mental health problems (Booth & Booth 1998). Second, there has been an over-reliance on the use of questionnaires to gather information, which reduces the complexity of service user accounts, tends to limit data to emotional responses and has meant that there is very little understanding about why individuals experience physical interventions in the way that they report (Sequeira & Halstead 2002). Third, the bulk of the research has been carried out with service users with mental health problems, and has enquired about their experiences of physical interventions in inpatient psychiatric facilities. The generalizability of the findings to other populations of service users in other settings is therefore questionable. Fourth, the work has mainly been conducted in North America, thus limiting applicability to a UK population. Finally, the majority of the studies focused on seclusion and mechanical restraint. Hardly any studies examine service user experiences of manual restraint, and those that do focus on C&R or its derivatives.

As a result of these limitations, very little is known about the personal impact of the use of manual physical interventions on service users in British services for people with intellectual disabilities. Two studies mention responses to physical interventions by people with intellectual disabilities as a product of wider service evaluations (e.g. Clare & Murphy 1993; Murphy et al. 1996). In a review of the Mental Impairment Evaluation and Treatment Service (MIETS), Clare & Murphy (1993) interviewed the first six people to be discharged from a hospital-based unit for people with challenging behaviour about their experiences of the service. Participants reported favourable opinions of the service overall, but generally disliked aspects relating to restrictions of personal liberty. Seclusion, locked doors and restraint were all mentioned. In a follow-up study, Murphy et al. (1996) interviewed 26 people after they had left the service. The use of restraint was viewed entirely negatively by the respondents. The majority of participants reported feeling angry about being restrained, three people felt sad and one person reported that they had been scared by the experience. Neither of these studies explored the reasons why people evaluated these interventions in this way.

The only study to specifically examine the views of people with intellectual disabilities about the use of physical interventions has been conducted by Sequeira & Halstead (2001). This study investigated the use of seclusion, manual restraint (C&R), and emergency medication in an independent psychiatric hospital, and then interviewed five women with intellectual disabilities about their experiences of these interventions. The research aimed to explore the personal impact of physical interventions on the women by asking them about their thoughts and feelings before, during and after intervention use. The authors noted that each episode of physical intervention typically involved a combination of two or three of the intervention procedures examined in the study. The four main themes identified were: physical pain or discomfort (participants’ comments included ‘It really hurts’, ‘make my throat go all funny’ and ‘stretching my legs apart, my poorly leg’); anxiety and mental distress (which included reports of anxiety, fear, upset and sadness); intentions/feelings of nursing staff involved in the interventions (a common perception was that staff were using interventions to punish and control people ‘The staff are angry with me, angry with me. It is meant to hurt, is it?’); and anger and an urge to express further aggression (participants felt angry about the physical interventions, and this seemed to increase the likelihood that they would exhibit further aggression).

Investigations into the impact of physical interventions on service users far outweigh those relating to staff. As Edwards (1999a, p. 136) states: ‘Peculiarly, the opinions of staff are at the periphery, or worse still, absent from the arena.’ A handful of studies have simultaneously considered the views of both service users with mental health problems and staff about the use of physical interventions.
(e.g. Soliday 1985; Outlaw & Lowery 1994). However, these studies only examine similarities and differences between views held by the two parties about service user experiences, and do not actually investigate the personal impact of intervention use on the staff themselves. Early studies by Plutchik et al. (1978) and Mattson & Sacks (1978) indicated that there may be differences in the way that staff and service users view the experiences of service users of physical interventions. These studies have been criticized for examining the views of the two parties using completely different methods (e.g. Soliday 1985).

Studies by Soliday (1985) and Outlaw & Lowery (1994) made direct comparisons between the views of psychiatric patients and nursing staff about seclusion (Soliday 1985) and seclusion and restraint (Outlaw & Lowery 1994) by posing the same questions to both groups. Both studies found little consensus between the two parties, with views and accounts differing widely over a range of topics including the effects of the physical interventions on emotional reactions, causes of the initiation of restraint and seclusion, and beliefs about the positive and negative aspects of the experience. Tooke & Brown (1992) observed that patients, to a greater degree than nursing staff, thought that nurses were punitive in the use of seclusion. McElroy (1985) suggests that a form of ‘cognitive dissonance’ may exist among staff (i.e. between the belief that they work as caring professionals and the belief that procedures are restrictive and distressing), which interferes with their full understanding of the experience of physical interventions from the service user perspective. It is proposed that staff may discount the negative aspects of interventions that are expressed by service users in an attempt to reduce this dissonance, as it is psychologically uncomfortable.

In a qualitative study, Edwards (1999a,b) interviewed 11 staff members working in an assessment and treatment unit for people with intellectual disabilities and challenging behaviour about the use of physical restraint (C&R). The study highlighted staff members’ perception of the impact of training in physical interventions on practice (1999a), especially in relation to the theme of ‘teamwork’ and increased equality in the relative roles of male and female staff in the restraint process (1999b). Edwards’ (1999a,b) study does not directly address the emotional impact on staff members of carrying out physical interventions, and therefore, as with service users, little is known about this component of the experience in staff working in services for people with intellectual disabilities.

The aim of the present paper was to begin to address the identified gaps in the existing evidence base in physical intervention use. As described above, some training approaches in physical interventions have evolved following widespread criticism of existing pain-compliance methods. Although, in theory, these approaches have been designed to be less aversive than C&R-based techniques, it is impossible to make conclusions about the safety, aversiveness, and degree/type of personal impact of different types of interventions, without asking the opinion of those who receive them.

The broad objective was to explore the views and experiences of service users and staff in community services for people with intellectual disabilities about the use of physical interventions. The focus of the study was on a previously researched (Allen et al. 1997, 2003; Allen & Tynan 2000; Kaye & Allen 2002) approach to manual physical interventions called ‘Positive Behavioural Management’ (PBM). PBM was developed specifically for use with people with intellectual disabilities and challenging behaviour. It avoids the use of pain-compliance procedures, features a ‘gradient of control’ (in which least intrusive approaches, i.e. defusion and distraction techniques, are employed before more intrusive and restrictive procedures, i.e. breakaways and restraints), is acceptable for use in a wide variety of community settings, focuses on giving control back to the person as quickly as possible, and is capable of being performed by all key carers (i.e. effective implementation of the techniques is not dependent on gender or physical size and strength).

Data were collected from service users and staff members of both genders who were based in community settings. The purpose of the study was not to directly compare views about this approach with views about C&R-based approaches, but instead to draw inferences about how the findings fit in with the existing literature in this area, and if appropriate, to develop new models of the experience of physical interventions for both service users and staff. A qualitative interview-based methodology was therefore employed to examine the following research questions:

- What is the personal impact (e.g. associated thoughts, feelings and behaviours) of physical interventions on the service users directly involved?
- What is the staff’s perception of the personal impact on the service user receiving the intervention?
- What is the personal impact of physical interventions on the staff members directly involved?
- What is the service users’ perception of the personal impact on the staff carrying out the interventions?
- What similarities or differences exist between the accounts of service users and staff about physical intervention use?
Methodology

Measures

The qualitative data were collected using semi-structured interview schedules. In particular, participants were asked about their experiences before, during and after the physical intervention. Different interview schedules were used for service user and staff member participants. The interview schedule used with staff members consisted of a small number of thematic questions and a series of verbal prompts for important areas not covered during conversation.

The service user interview for the current study was more structured than the staff interview, with a greater number of direct questions. Close attention was paid to the form of the questions and the language that was used (e.g. no double-negatives or complex, layered questions). The schedule included ‘warm-up’ questions to ease the participants into the interview and ‘wind-down’ questions to bring the interview to a positive end. Visual prompts (i.e. pictures of physical interventions, male and female body maps, cartoon faces expressing a variety of emotions, empty thought bubbles) were incorporated that could be available if necessary throughout the interviews, in order to maximize understanding and responsivity.

Participants

The total population of service users eligible for the study were all individuals that were currently receiving input from a specialist challenging behaviour service (n = 47). All individuals within this sample were aged 18 years or over and lived in community residential houses run by local service providers. Two criteria were applied in the selection of potential service user participants from this sample. First, participants must be written up for manual restraint and second, they must be sufficiently verbal for interviewing purposes. Nineteen service users, living in 10 different community residential houses, run by a total of six local service providers, met the criteria. Of the six service providers approached, one opted out at the initial stages, leaving a pool of 15 service users in eight houses. A further two service users were discounted from participation as it was felt that their initial selection had been inappropriate. Therefore, a final pool of 13 potential service user participants remained. A total of 111 staff worked with the 13 service users, of whom 68 consented to participate in the study from the outset (61% response rate).

The final staff sample comprised of eight staff members from six community residential houses, run by four different service providers. Five were male and three were female. They included two house managers, two senior support workers and four support workers. Their ages ranged from 26 to 53 years (mean = 36.62), and they had been working in the intellectual disability field for between 1 and 17 years (mean = 6 years, 6 months). The length of the participants’ experience of working with people with challenging behaviour ranged from 3 months to 7 years (mean = 4 years, 3 months). All of the participants had received training in PBM within the 6 months prior to their interview.

The final service user sample consisted of six males and two females. Their ages ranged from 18 to 43 years (mean = 29.50), and they had been living in their current placements for between 2 months and 10 years (mean = 2 years, 4 months). Prior to this, they had lived in wide range of settings, including institutional, residential schools, at home with parents, prison and inpatient units. The service user participants had been involved in a total of 683 behavioural incidents over a specified 6-month period (range = 33–269; mean = 85.38), with restrictive physical interventions being used by staff members 476 times. The specialist service were asked to provide an overall rating of the severity of each participant’s challenging behaviour over the preceding 12 months on a scale from 1 to 10, with ‘1’ indicating extremely mild challenging behaviour and ‘10’ indicating extremely severe challenging behaviour. Ratings ranged from 6 to 10 (mean = 8.25). None of the service user participants had any diagnosed mental health problems.

Procedure

Data collection took place over a 5-month period. A post-incident procedure was used, which involved the first author telephoning each house twice a week to enquire if any behavioural incidents had occurred resulting in restraint with the identified service users. If such an incident had occurred, a convenient time was arranged to obtain informed service user consent and conduct interviews with the two parties involved in the physical intervention.

Individual audiotaped interviews were conducted with eight service user – staff pairs within a week of the identified incident. Each physical intervention involved two members of staff. The interviews did not proceed unless the service user and one member of staff agreed.
All interviews were carried out by the first author and took place at the relevant community residential homes in a private room. Interviews with service user participants lasted between 5 and 20 min, depending on the responsiveness and verbal ability of the individuals involved. The approximate average duration of the staff interviews was 50 min. Three procedural protocols were used during the data collection, which detailed: (i) interviewer safety, (ii) dealing with emotional reactions within interviews and (iii) circumstances under which confidentiality should be broken.

Data analysis

The qualitative methodology employed in the current study was Grounded Theory, which is described in detail by Strauss & Corbin (1998). In essence, it is a non-mathematical qualitative form of analysis, which combines different levels of explanation into a framework, which evolves throughout the study (Clegg et al. 1996). The process is both inductive and iterative and is characterized by the emergence of theory that is ‘grounded in the empirical reality reflected by the data’ (West 1996, p. 353).

Analysis of the qualitative data was conducted simultaneously with data collection beginning immediately after completion of the first pair of interviews. The audiotaped interviews were transcribed verbatim and all identifying information was removed from the transcripts.

Data were handled using the computer software package NUD*IST 4 (Non-numerical Unstructured Data Indexing, Searching and Theorising; Qualitative Solutions and Research 2000). The coding procedures proposed by Strauss & Corbin (1998) were used to aid the analysis of the data (i.e. open, axial and selective coding). In summary, the transcripts were broken down into discrete parts (e.g. words, sentences, paragraphs), and concepts that appeared to be significant were identified and coded. Through continuously comparing incoming data for similarities and differences, concepts were developed further and the relationships between them were explored, resulting in the hierarchical organization of concepts into core categories, categories and subcategories. A system of memo-writing was used during this process to help to step back from the data and make sense of the codes and their relationships. Following coding, the emergent theory was reviewed in light of the existing literature.

Two independent raters coded 25% of the data (i.e. two service user and two staff member transcripts), after being given a full list of codes and definitions. Following discussion about any arising discrepancies, the mean inter-rater agreement on the coding system was calculated at 96%, using the formula: number of agreements/number of agreements and disagreements × 100.

Internal and external validity were enhanced via strategies suggested by the research literature (e.g. Turpin et al. 1997; Elliott et al. 1999). For example, behavioural monitoring forms completed for the incidents were used to verify factual information and aid interpretation of the interview data; interview questions were modified in the light of emergent findings in order to confirm, modify or discard hypotheses; the first author kept a diary throughout the research process to enable her to monitor and minimize her own impact on data collection and analysis; and, an attempt was made to present the research findings in a way that both fitted the research topic and was understandable to the outside reader.

Results

It was clear that the staff had a good understanding of the PBM model and appeared to follow it in practice. This provided a degree of confidence that the experiences described by both parties were rooted in physical intervention procedures that had been carried out in the correct manner. It was also important to emphasize that, despite wide variations in the service users’ cognitive and communicative abilities, all eight of the participants provided valuable contributions to the overall analysis.

The emergent grounded theory consisted of three interrelated core categories, each with their own categories and subcategories. The entire grounded theory is illustrated in Figure 1. Overall, the model reflected the interactional nature of physical intervention use and emphasized that the experiences of service users and staff members were intrinsically linked and that the reported experiences depended on far more than the direct experience of the application of the techniques alone. Core category 1 was labelled Service User Experience and was concerned with the experiences of service users during the physical intervention process from the perspectives of the service users themselves and via the perceptions of the staff members. Staff Member Experience was core category 2. This described the physical intervention experience from the perspectives of the staff and also contained service user beliefs about what the experience might involve for staff. Core category 3 surrounded core categories 1 and 2 and was entitled Factors

References to core categories, categories and sub-categories are italicized within the text for emphasis.
Related to the Physical Intervention Experience. As an outer layer of the grounded theory, this core category discussed factors that affect, and were affected by, the direct experience of physical interventions for both service users and staff, described in core categories 1 and 2.

The current paper focuses on the key findings from core categories 1 and 2, which are illustrated with quotations from the participants’ transcripts. The data from core category three will be presented in a later paper.

1. Service User Experience

Understanding the process

In terms of service users’ level of understanding and perception about the roles and positions of the two parties during physical intervention use, the majority of the service user participants \((n = 5)\) had some idea about their Personal Role in relation to the initiation of a physical intervention:

Service user 1 (female): For the safety. That’s why they have to hold me.

Interviewer: Do you mean so that you’re safe or so that they’re safe?

Service user 1: So they’re safe from me. That’s why they hold me. I might hurt them.

However, it was clear that the remaining three participants had no understanding. For example, service user 2 seemed resigned to the fact that physical interventions just ‘happen’ to him, without acknowledging that he may have a Personal Role to play in their occurrence:

Service user 2 (male): It’s just one of those things that I’ve had since I first moved in...I don’t know when it’s going to happen, it just does.

The service users’ Personal Roles in the ending of physical interventions were far less clear to them. Although five of the participants had been able to recognize that physical interventions occurred in relation to their own behaviour, six of the participants did not recognize that a physical intervention ending was also dependent on their behaviour:
Service user 3 (male): I don’t know why they stopped. They just felt like doing it.

The perceived degree of Personal Control that a service user had over their behaviour and how this was used was discussed by six staff and proved to be an important variable in determining aspects of Staff Member Experience. The level of Personal Control over the course of events that service users actually experienced appeared to be partly related to the extent of their understanding of their Personal Role in physical interventions. However, having a good level of understanding about the use of physical interventions did not necessarily translate to a service user exerting Personal Control over their behaviour to prevent or halt their use. Staff proposed two possible reasons for this. First, five of the staff believed that service users get ‘lost in it all’ and ‘so tied up in things’ that they are unable to Control the escalation of their behaviour, despite attempts from staff to calm them down:

Staff 1 (female): …it’s almost as if she’s got a death wish, and that she cannot control this behaviour sufficiently to prevent it from happening. It will escalate to a pitch which requires a physical intervention.

Second, a number of staff \( n = 4 \) felt that service users sometimes used their understanding of their Personal Role to Control a situation by intentionally instigating physical interventions:

Staff 1 (female): As soon as we left her on her own, she began self-injuring again. She knew that it would lead to us going in there and the intervention becoming more and more physical.

These ideas about intentional behaviour are linked to the Positive Gain subcategory of the Living the Experience category.

Living the experience

This category encompassed both the service user participants’ comments about their personal experiences during the use of a physical intervention and the degree of empathic understanding that the staff had about these experiences.

One of the service user participants had encountered the use of C&R procedures in a previous placement and evaluated PBM more positively through comparison. The following excerpt illustrates her overall experience of the two approaches:

Interviewer: Did the staff hold you in the same way there as they do now?
Service user 1 (Female): No. Different way.
Interviewer: How did they hold you before?
Service user 1: On the floor.
Interviewer: Were you face-down or on your back?
Service user 1: Face-down.
Interviewer: What was that like?
Service user 1: Horrible.
Interviewer: More horrible than now?
Service user 1: Yeah.
Interviewer: How many staff would hold you then?
Service user 1: Four or five.
Interviewer: Gosh. So this is very different then.
Service user 1: Yeah.
Interviewer: How did that used to make you feel?
Service user 1: Sad.
Interviewer: How did your body feel when you were on the floor?
Service user 1: It hurt on the floor.
Interviewer: Does it hurt when you’re restrained now?
Service user 1: No.

All eight service users cited Negative Emotional Reactions in response to physical interventions, which were, in order of frequency of citation: general dislike, sadness, anger, fear/anxiety and disappointment:

Service user 4 (male): It’s not very nice.
Service user 5 (female): When I get restrained, I feel a bit sad.
Service user 2 (male): See what it is I get so tight…— yeah, I’m going to lose it. That’s when I’m going to lose it. I just want to blow my top… want to smash something up.
Service user 6 (male): I feel silly and daft…because of what I’ve done. I feel like it shouldn’t have happened. Like I’ve let myself down. I feel those sorts of things.

The service users’ overall dislike of physical interventions was recognized by all eight staff. Staff members were also able to recognize service users’ sadness in response to a physical intervention by observations of ‘remorseful behaviour’, which usually included crying, and three of the staff recognized that the use of physical interventions could stimulate further anger in the service users:
Staff 2 (female): I think it’s pure anger on his part really...It’s like, you know, ‘you bastards’, ‘get off me, leave me go’. The language really comes out when he’s being restrained. I think for a split second he actually really hates us.

Seven of the service user participants described their experiences during a physical intervention in terms of particular Body Sensations. The most frequently cited sensation was pain ($n = 3$), which appeared to be mainly experienced in the lower limbs:

Service user 2 (male): People sitting on my two legs and it hurts my legs. And my arms get bent.

Service user 7 (male): Hurts...legs, knees...hurts knees. Sore.

Service user 4 (male): It hurts...on my legs and on my ankles.

Most of the staff ($n = 6$) seemed to dismiss the idea that a service user may experience physical interventions as painful.

Two of the service users alluded to the fact that physical interventions caused a degree of discomfort. Conversely, the only positive comment made by a service user was related to comfort and came from service user 1. In response to the question ‘How does your body feel?’, she replied ‘comfortable’. Her experience is examined further in the Positive Gain subcategory.

Finally, service user 3 commented that receiving a physical intervention made his body feel ‘worn out’, indicating a level of fatigue. Staff participant 3 suggested that service users got ‘exhausted from the struggling’ during restraint.

A number of the staff felt that certain service users may gain something that they find positively reinforcing during a physical intervention. The idea of Positive Gain is related to staff beliefs that service users may intentionally provoke physical intervention use in order to obtain these reinforcing consequences. Three staff members felt that attention was the main reinforcer for service users:

Staff 3: I think he uses challenging behaviour knowing he’ll get restrained, to gain the attention he’s been seeking.

Staff 4 felt that the service user that she worked with enjoyed being held during a physical intervention because it made her feel ‘safe’.

Staff 4: I think that physically, she relaxes into you holding her like that, you know, and I don’t know what sort of emotional payback she gets from that. Sometimes you wonder if she immediately starts to target you again afterwards because she wants you to restrain her again. She wants you to be holding her. So whether or not when she’s got two of us holding her, she feels safe, I don’t know.

In this account, the staff member was talking about service user 1, who had described her body as feeling ‘comfortable’ during a physical intervention in the Body Sensations subcategory, which may indicate that actual and perceived experiences in this instance are congruent. Staff perceptions of the reasons for service user challenging behaviour, including Positive Gain, had a bearing on certain parts of Staff Member Experience.

Two service users described feeling helpless against the degree of force used by staff when held in restraint. This Perception of Force links in strongly with service users’ degree of Personal Control over a situation:

Service user 2 (male): They just put me down really...too hard. I can’t move. Just put me down gently.

Service user 4 (male): When they’ve got my arms down, they pin...you know, they just push really hard and stuff like that. You can’t do anything about it.

Coping with the experience

This category describes methods that help service users to deal with both their building aggression and the personal impact of the use of physical interventions.

Five of the service user participants spoke about strategies employed by either themselves or staff that they felt helped them to calm down when they were angry. Two self-strategies for calming were cited by two of the participants and were talking and relaxation:

Service user 8 (male): I try talking...try and keep talking.

Service user 1 (female): I relax and do my deep breathing.

The remaining six service users did not appear to have any self-strategies for calming.
The staff participants were unsure about whether service users had effective skills for calming themselves down that they could utilize when angry. Six staff felt that it was ‘always up to staff to try to de-escalate the situation.’ These perceptions seemed to relate to their prevailing view that service users had a lack of Personal Control over their behaviour once escalated.

Service user participants commented that medication, distraction and restraint were methods used by staff that helped them to calm down.

Two of the service users appeared to cognitively distract themselves during a physical intervention by thinking about something unrelated. For example, when asked ‘What do you think about whilst staff are holding you?’, service user 5 said:

Service user 5 (female): That I’d like to be out for a walk somewhere.

Alternatively, user 4 described letting his mind go blank during restraint, in order to ‘block out’ the experience. He also felt the need to distract himself after the physical intervention had ended so that he did not think about what had just happened:

Service user 4 (male): I talk to staff about nice things...take my mind off it.

Staff participants did not acknowledge that the service users might use, or need to use, strategies to cope with their experiences during a physical intervention. However, six staff highlighted ways in which they thought service users coped with what had happened after the physical intervention had ended. These included: apologizing to staff, thinking through the incident, initiating conversations with staff about the incident, forgetting about it and seeking reassurance.

2. Staff Member Experience

As a result of the wide variations in ability, only five of the service user participants were able to consider what the impact of physical interventions on staff might be. Only a few comments were made and all of these related to emotional reactions.

Before the physical intervention

All eight staff cited Negative Emotional Reactions that they experienced Before the Physical Intervention. Fifty per cent said that they normally felt frustrated. This frustration appeared to be mainly because of the fact that less restrictive strategies were proving ineffective in calming a service user, resulting in the realization that a physical intervention was probably going to have to be used and a desperate attempt to try to discover the reason for the behaviour, in order to prevent this:

Staff 3 (male): I do find myself feeling frustration when I know that I’m going to have to intervene with a PBM strategy because a service user isn’t calming down. And that’s me as a calm person.

Feelings of fear, anger and distress were described by five staff and were directly related to the type and level of intensity of the service users’ challenging behaviour:

Staff 3 (male): At the end of the day, you might be faced with someone making an unreasonable demand and basically being damn right rude to you. Sometimes spitting in your face. It’s bound to make you uptight and angry about the situation.

The majority of the staff (n = 7) spoke of an overwhelming feeling of dread Before the Physical Intervention, associated with thoughts about what lay ahead of them:

Staff 4 (female): I think for most of us, once we know (service user’s) started an escalated period of behaviour, it’s dread really. It’s dread because it’s the thought of ‘Oh no, I’m not sure that I can face this’. It’s dread because you know it’s going to be long and hard.

In the words of staff member 3, these results suggest that staff are experiencing ‘pretty strong emotions just before restraint,’ which as demonstrated next, combine with the Level of Predictability of service user behaviour and a Rise in Adrenaline, to impact on the Decision to Intervene.

Six staff found service user behaviour and the course of events within a physical intervention to be unpredictable:

Staff 5 (female): One minute he’ll be quite emotional and then he’ll be aggressive. Then, when you think he’s calmed down, all of a sudden he might go for you again.

Differences in Levels of Predictability were evident across service users and within particular incidents,
which meant that staff were generally ‘on edge’ in the build up to physical intervention use, contributing to a Rise in Adrenaline levels and provoking and exacerbating Negative Emotional Reactions.

All eight staff described a strong physiological reaction to the events leading up to a physical intervention, characterized by a Rise in Adrenaline levels, which as staff 3 exemplified, was then ‘going for most of the time you’re involved in the situation.’ They tended to attribute this Rise in Adrenaline to the fear that they described in the Negative Emotional Reactions category and being ‘on edge,’ because of variations in the Level of Predictability of service user behaviour:

Staff 6 (male): I don’t know really. Perhaps fear. There’s just this sort of tenseness in the atmosphere. You know he’s at that point where he takes things really sensitively. A point where he could really do anything next. So it’s sort of just being on edge that gets the adrenaline going.

This Rise in Adrenaline appeared to have an impact on staff behaviour. It was evident from the participants’ accounts that high levels of adrenaline carried them along throughout the physical intervention process, helping them to counteract the ‘fight’ or ‘flight’ response to challenging behaviour, by making their responses more automatic and self-controlled.

In accordance with the philosophy of the PBM model, all of the staff viewed physical interventions as an ‘end-point’ in a hierarchy of responses to service user behaviour, from less to more restrictive strategies. However, in reality, the Decision to Intervene was far more complex than the use of a set pattern of behaviours. Although overall, staff felt that ‘you just seem to know when it’s the right time to restrain,’ their accounts indicated that the Decision to Intervene was complicated by: their Negative Emotional Reactions, the Level of Predictability of the course of an incident and their associated Rise in Adrenaline. It was suggested by four participants that experiencing strong emotions, being in an unpredictable situation and feeling the urge to respond automatically, could result in staff responding with a physical intervention too early in the process.

In addition to deciding when to intervene, three staff talked about having to work through debates in their minds in order to proceed with the physical intervention. These debates appeared to be both distracting and distressing for the individuals concerned, and included:

• I should have prevented this from happening vs. the service user is so worked up that there’s nothing that I could have done.
• I just want to walk away from this situation vs. I can’t walk away, this is my job.
• Service user hates being restrained vs. restraint is the only option at this point in time.

During the physical intervention

The biggest impact of the direct experience of staff members During the Physical Intervention was emotional. All eight staff reported emotional reactions in response to actually carrying out a physical intervention, which ranged in intensity and appeared to fluctuate in relation to the behaviour and responses of the service users. As a result of the general Level of Predictability of service user behaviour being poor, staff members tended to find themselves moving quickly between feelings such as ‘hope’ that a service user was going to calm down and ‘frustration’ when the challenging behaviour worsened again. Accordingly, four staff likened the experience to being on an Emotional Rollercoaster:

Staff 3 (male): It’s a bit of a rollercoaster ride working through an incident with him. It could be a series of calmer periods, followed by a worsening of agitation.

Staff noted the following negative emotions During the Physical Intervention: fear, anger, sadness, worry, shock, frustration, boredom and self-doubt.

Staff member 3 pointed out that staff experience During the Physical Intervention did not solely entail negative emotions:

Staff 3 (male): And then there are other feelings. I mean you’re asserting control and preventing danger or preventing harm. So there are positive feelings as well as negative feelings. It’s a mixture of things.

Staff 3, 6 and 7 discussed the fact that whether positive or negative emotions arise During the Physical Intervention is partly dependent upon a cognitive evaluation of the perceived reason for the onset of the behaviour. Beliefs about Positive Gain are relevant here. For example:

Staff 7 (male): If you can see that he’s upset about something that’s happened, you feel a bit more
compassion for him. That’s if there’s a good reason for it, which he can usually tell you. But if it seems like he’s just trying to challenge the staff, to get one over on us...if he wants a fight, then I probably do feel a bit angry. You know, this is not what I’m here for. I’m not here to have a duel.

The comments made by the service user participants tended to relate to staff emotions elicited in response to the service users themselves, as opposed to the experience of actually carrying out the physical interventions. In this sense, although simple, their perceptions were remarkably congruent with actual Staff Member Experience, as it has already been demonstrated that staff experience During the Physical Intervention relates strongly to their beliefs about, and experiences of, service user behaviour. Three of the service users made the following comments:

Service user 5 (female): Not very happy...because I was restrained and rude again.

Service user 4 (Male): Probably fed up...fed up with me.

Service user 1 (female): They feel sad when they have to restrain me all the time. Sad when I’m angry.

Only one service user commented on the potential emotional impact on staff of carrying out a physical intervention:

Service user 8 (male): Not very nice for them. They don’t really want to restrain me. And um...they’re probably stressed out.

Six staff described experiencing Physical Exhaustion During the Physical Intervention, which impacted on the way that they felt After the Physical Intervention had ended. The Physical Exhaustion was attributed to: the continuous Rise in Adrenaline, the physical nature of the restraint techniques requiring muscle tension and long durations of physical interventions:

Staff 4 (female): You’re aching at the time. Like sometimes you have to tense your muscles to hold her, but then at some points you can relax a bit, but then you’ll have to tense again. It’s very wearing...the tension is physically exhausting.

A primary concern for staff During the Physical Intervention was getting the techniques right and following the procedures correctly. It was clear from their accounts that Getting it Right required staff to remain focused on what they were doing, which appeared to be difficult when they were experiencing an Emotional Rollercoaster and Physical Exhaustion:

Staff 6 (male): It can be hard to keep focused depending on the service user and the impact of their behaviour on you. You’ve got to keep focused obviously. You’ve got to keep to the correct restraint process.

According to five staff, the main reason for Getting it Right was to ensure the safety of the service user, themselves and their colleagues.

Generally, the Decision to Stop a physical intervention involved a gradual process of monitoring the changing level of tension in a service users muscles through close body alignment and a joint decision between the two staff members involved. As with the Decision to Intervene, certain factors appeared to impinge on staff’s Decision to Stop, which related to the Rise in Adrenaline throughout the incident and concern about Getting it Right. Four participants explained that although a service user could be showing signs of calming, the staff may still be experiencing high adrenaline levels as a result of being ‘on edge’ because of the low Level of Predictability of service user behaviour. It appeared that this tended to keep staff in action mode, from which it was difficult to disengage:

Staff 7 (male): It’s a changing judgement of what you think he’s doing. I often just want to walk away from the situation...but you wonder what will
happen if you stop the restraint at the wrong time, what he might do.

After the physical intervention

The majority of the staff ($n = 6$) described how they felt like they were Walking on Eggshells after the intervention, largely because of the low Level of Predictability about what might happen next. This resulted in them continuing to feel ‘on edge’:

Staff 7 (male): I guess your head is still in restraint mode. You’re still on edge in case something happens again…you’re still checking and watching.

They indicated that they were faced with a dilemma about how best to approach the service user at this time, without re-triggering or reinforcing the challenging behaviour. In particular, Walking on Eggshells resulted in the avoidance of trying to talk to the service user about the incident:

Staff 8 (female): It’s difficult with (service user) because of what could have triggered the behaviour. If we talk about it, it could trigger him again. Also, if we comfort him, it might reinforce the behaviour.

All staff described feeling the Physical and Emotional Aftermath of the intervention, once the Walking on Eggshells period had passed, which was accompanied by an enormous sense of relief that it was all over.

Staff 2 (female): I go over it in my mind and think things like ‘Could we have done that bit differently?’ or ‘Could we have done it this way?’ Yeah, I do spend time thinking about it all. But I think that’s normal really… I think of the service user, because obviously I think when the time comes to be restrained, it’s quite hard for them really. In a way you’re taking something away from them. I feel sorry for them really.

Discussion

Consistent with previous research, the service user accounts reflected primarily negative experiences of physical intervention use. Two main hypotheses can be made about the generation of negative emotional reactions. First, the service users’ poor understanding about the process and low level of coping skills may predispose them to experiencing stress reactions to physical interventions characterized by negative affect. Second, whilst acknowledging the individualized nature of appraisal processes, there are clear aspects of the physical intervention experience described by the user participants that may provide the basis for a threat appraisal to be made, which generates negative emotions (Lazarus & Folkman 1984). These are the sense of helplessness and the unpredictability of events as a result of a poor understanding of personal role and a low level of personal control, the perception of force used by staff members during the physical interventions and the experience of aversive body sensations.

The most frequent body sensations cited by service users were pain and discomfort. Although these sensations are reported in the existing literature (e.g. Sequeira & Halstead 2001, 2002), their occurrence in the present study was more unexpected, because of the fact that PBM advocates the use of non-pain-compliant techniques. However, as Hughes et al. (J. C. Hughes, H. Berry, D. Allen, J. Hutchings, E. Ingram, E.F. Tilley, unpublished data) have commented, any physical intervention may cause discomfort because of the application of force against resistance. It is unclear from the participants’ accounts as to exactly which aspects of the physical intervention pain is attributed to, but it seemed to be mainly experienced in the lower limbs. It is plausible that the reports of pain are in some way related to their perception of force used by staff.

Anger, fear and pain are all linked with further aggression in the literature (e.g. Ulrich & Azrin 1962; Strumpf & Evans 1988; Adshead & Mezey 1997).
Therefore, the experience of negative emotions and aversive body sensations may increase the likelihood that further aggression will be exhibited (Sequeira & Halstead 2001), thus possibly resulting in a physical intervention needing to be used for a longer period of time.

The level of congruence between staff perceptions of service user experience and actual service user experience was varied. Actual service user experience was more negative than the staff had believed, which is consistent with the existing literature (e.g. Soliday 1985; Outlaw & Lowery 1994). This difference indicates that many staff do not realize in what ways and how greatly physical interventions affect service users. One possible reason for this observed discrepancy is that staff members could be ignoring or discounting the negative aspects of service user experience in order to reduce their own cognitive dissonance (McElroy 1985).

Staff also failed to acknowledge some of the more positive aspects of the experience, such as the use of self-strategies for calming and coping by some service users. As they generally felt that it was ‘always up to staff to try to de-escalate the situation’ and that service users get too ‘lost in it all,’ they might unintentionally be taking away a service user’s opportunity to exert some personal control via the use of such strategies.

The results suggest that a range of factors affect staff’s experience of physical interventions. Although all of the themes in the current study contained mainly negative elements, a number of more positive aspects of the experience were also identified. The present study found that staff: experience some positive emotions during a physical intervention, demonstrate positive regard for a service user’s feelings throughout the process, place a high degree of emphasis on getting the techniques right and engage in self-debriefing to lessen the negative impact.

The causal explanations which staff had about a service user’s challenging behaviour seemed to affect the nature of the emotions that they experienced during a physical intervention. These causal explanations tended to operate at the ‘controllability’ dimension of attributions. In line with previous research, the elicitation of negative emotions was related to perceptions of a high level of controllability (e.g. Dagnan et al. 1998), and more positive emotions were generated when a low degree of controllability was perceived (e.g. Stanley & Standen 2000). In the current study, the main factor that contributed to a perception of controllability was the belief that service user behaviour was intentional.

The poor level of predictability of a service user’s behaviour throughout the physical intervention process had a clearly negative effect on staff experiences. This is consistent with Bromley & Emerson’s (1995) study, which found that unpredictability was the most significant source of stress for staff when attempting to deal with a challenging situation. Whittington & Mason (1995) state that low predictability events are more aversive than predictable ones, and increase the likelihood that a threat appraisal will be made, which, in turn, increases the likelihood that negative emotional reactions will be experienced.

Much of the existing research on challenging behaviour is concerned with how staff’s emotional and cognitive reactions affect their behavioural responses to the behaviour (e.g. Hastings 1995, 1996; Dagnan et al. 1998; Stanley & Standen 2000). In the current study, rather than avoiding a situation or responding in an ad hoc way, all staff appeared to follow set written guidelines for responding to individual service users, which may be an indicator of the effectiveness of training.

Eliciting service user perceptions of staff experience proved difficult. Comments that were made acknowledged a number of emotions that were described by the staff participants, but did not make reference to the other domains of actual staff experience. The majority of the comments made related to staff emotions elicited in response to their own behaviour (e.g. ‘Not very happy...because I was restrained and rude again.’), which although accurate, may feedback negatively into their own appraisal processes (i.e. interpreting the actions of others to have exaggerated personal significance) (Novaco, 1994).

The principal similarity between service user and staff accounts was the concurrent generation of negative emotional reactions during a physical intervention, which could obviously have a detrimental effect on the interaction between the two parties. In addition to this, both parties described feeling physically tired, the unpredictability of aspects of the process and the use of self-strategies to cope with the situation. Differences between the accounts were more difficult to identify, because of the limited nature of the service user reports, but overall, the physical intervention process appeared to reflect imbalances in levels of understanding and control, with staff having much higher levels of both. It was also noticeable that the sensations of pain and discomfort were prevalent in service user accounts, but absent from staff’s. It was also apparent that whilst staff had a range of debriefing options available to them, service users did not. This lack of
opportunity was exacerbated by the fact that staff were fearful about talking to service users after an incident in case this re-triggered the challenging behaviour (i.e. Walking on Eggshells).

A number of implications arise from the study. Given that service users appeared to have a limited understanding about the reasons for physical intervention use and termination, information for service users about why physical interventions are used and how their own behaviour is related to decisions to initiate and cease physical interventions, in clear and simple terms, may help to redress the imbalance between service user and staff member understanding. There are also clear ethical concerns about the use of interventions that are not understood properly by service users, in terms of implications for gaining informed consent to treatment.

The research findings clearly reaffirm the importance of debriefing service users after a physical intervention is often missed. Service users experience strong emotional reactions during a physical intervention and there is evidence in the mental health literature that the impact can last for a considerable amount of time (e.g. Wadeson & Carpenter 1976). The use of debriefing may help service users to understand why a physical intervention occurred and may assist them in overcoming their negative feelings in order to reduce the likelihood of further aggression.

Staff may benefit from being taught emotion-focused coping strategies, such as stress or anger management skills, which they can use to reduce their levels of arousal throughout the physical intervention process. Such skills may help staff to deal with the unpredictability of service user behaviour, provide an alternative coping strategy for terminating aversive experiences to the use of a physical intervention, reduce the likelihood of distorted thinking which arises at high levels of arousal and prevent strong emotions from being taken out in the wrong way during a physical intervention. Interventions aimed at reducing staff stress may also have wider implications, such as improving the interactions between service users and staff (Rose et al. 1998).

The unhelpful attributions that staff hold about service users and their behaviour during a physical intervention could also be explored with the use of cognitive-behavioural techniques. It is also important to inform staff about the impact of physical intervention use on service users. This would serve to increase their level of empathic understanding and may make them more mindful about the impact of their own behaviour during the physical intervention process on the appraisal processes and behaviour of the service user.

The results also highlight an implication for the PBM training approach. Comments by some of the service users and staff indicate that some of the techniques may need to be re-examined with regard to issues of pain and ease of use.

Finally, the methodological implications of the study need to be considered. The study obviously involves a very small sample, is biased towards people with higher levels of cognitive ability, and focuses on one very specific approach to physical intervention. All these factors limit the generalizability of the results. Although a number of steps were made to improve the reliability and validity of the qualitative methodology, triangulation with quantitative methods of data collection may have increased the validity of the findings. Feeding back the emergent themes may also have enhanced validity.

In conclusion, the study contributes to the understanding of physical interventions as a complex and diverse experience. The interactional nature of their use is highlighted and it has been demonstrated that the perceptions that each party holds about the other and their behaviour has an impact on their own experiences. Overall, although PBM strove to reduce the aversive nature of physical interventions, their use was still a primarily negative experience for those involved, a finding which is largely in accord with the existing literature.

**Correspondence**

Any correspondence should be directed to Dr Sarah Hawkins, Intensive Support Service, Meridian Court, North Road, Cardiff, CF14 3BG (e-mail: Sarah.Hawkins@bromor-tr.wales.nhs.uk).

**References**


Qualitative Solutions and Research (2000) NUD*IST 4. QSR Pty Ltd, Melbourne, Australia.


