

## **Pairing positive stimuli with parental contact to increase the demonstration of socially appropriate behaviour within a Parent- Adult relationship; Reducing reliance on challenging behaviour to escape aversive environments by modelling appropriate behaviour using Social Stories™.**

### **Background**

Philip is a 25-year-old man with a diagnosis of an Autism Spectrum Condition and a moderate learning difficulty, Philip is an “elective mute”, and when assessed he refused verbal prompts. When verbal prompts were provided, Philip would throw items, push and hit staff, members of the community and other clients. Staff had implemented a pen and pad, which they used to communicate with Philip, which although effective, meant when anxious Philip was unable to communicate effectively.

Philip’s relationship with his family had broken down substantially within the past year, according to the mother. There were many possible reasons for this identified, Philip was banned from a youth group which he enjoyed due to the expression of Challenging Behaviour, and following this was placed into a supported living scheme. On initial visits to the family home his behavioural presentation had increased to an incident where he put his family at serious risk and caused significant injury. Following this incident, he had limited contact with his family and would target them with physically challenging behaviour “whenever he saw them”.

Philip has a good understanding of written information and can write competently, he expresses some stereotypies which seem linked to his sensory processing, “walking backwards for weeks at a time occasionally, Standing on work surfaces repeatedly, an obsession with environmental sameness and a need for very fixed routines.”

### **Assessment and intervention**

#### **Behavioural topography**

Philip engages in two distinct types of challenging behaviour:

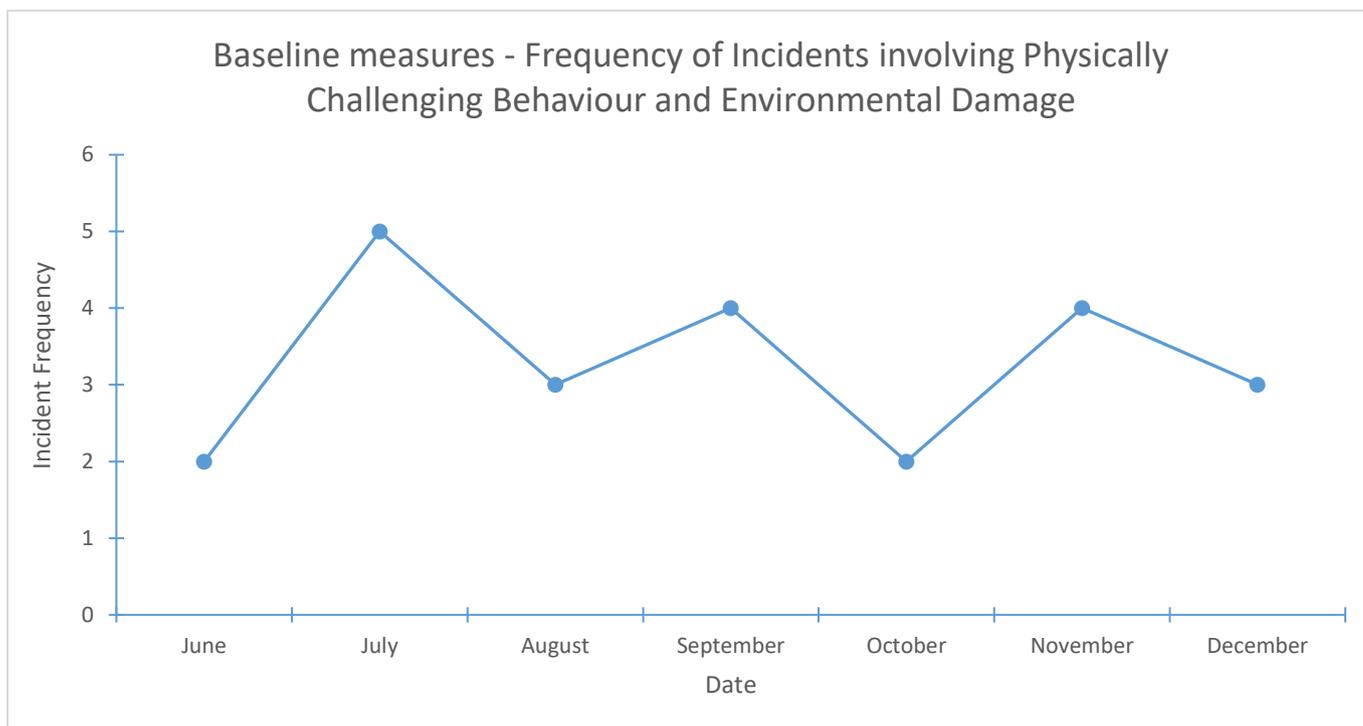
**Environmental damage**, defined as picking up or tipping items of furniture or small items and throwing them with enough force to move them from their original position, usually the items are tipped onto their side or top, occasionally directed at others, especially staff who are not looking at him or facing another direction. Or damage to personal items – Tablet, Game controller. Onset classified as the moment the first object is thrown, offset classified as latency of more than five minutes (5mins) between objects, all occurrences within 5mins of the previous occurrence are classified as a single occurrence. If 5mins occur between objects, these will be classed as separate occurrences.

**Physically aggressive challenging behaviour**, defined as Philip grabbing staff or others’ hands and squeezing with enough force to cause pain and discomfort. He will often ask people in the community for their hand, before squeezing them, and occasional scratching, usually forcible enough to break the skin. Philip has also been known to push staff and others with enough force to move them from their original position and on occasion to push them over. Onset classified as the moment Philip lays hand upon another individual. Offset classified as latency of more than five minutes (5mins) between occurrences, all occurrences within 5mins of the previous occurrence are classified as a single occurrence. If 5mins occur between events, these will be classed as separate occurrences.

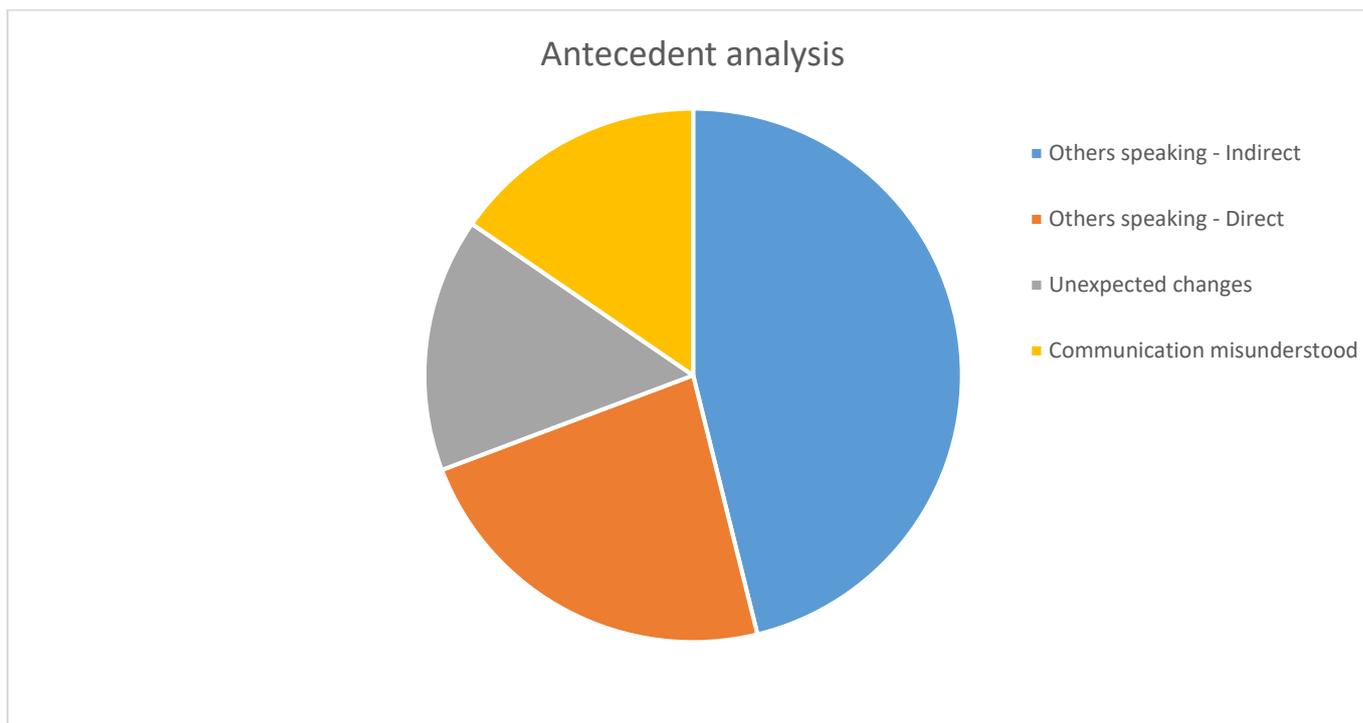
#### **Baseline measures**

Frequency data was recorded historically based upon ABC Forms and incident records for the previous 6 months, to identify patterns and antecedent and consequent data. The behavioural specialist compiled this data which is demonstrated graphically below.

## Frequency data



## Antecedent summary



## Baseline interpretation

The main antecedents identified for the expression of physically challenging behaviour, seem to be busy, or noisy environments, especially where there is loud talking “lady on the bus – shouting into phone”, or when he is greeted by members of the community “receptionist in a gym, shop assistant, gym instructor”. Based on the consequences reported, on 80% of occasions Philip is removed from these environments, and taken to a quieter place, or back to the service. Philip may return (30%) and re-engage with the task, although the amount of time he is removed from the aversive setting varies.

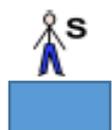
## Intervention rationale

Based upon the results of functional assessment and baseline recording, it is hypothesised that Philip's Physically Challenging Behaviour is negatively reinforced by removal of the aversive stimuli (environmental noise, others communication & staff prompt). We looked at environmental antecedent interventions which could act as a socially valid, and functionally equivalent signal that Philip was finding the environment aversive and give him the opportunity to leave and access a quieter environment as he was, at this time, electively mute, behaviour that challenged became the easiest way for him to remove himself from an aversive setting.

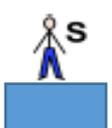
The other focus was to reengage his family into his life in a positive way which fostered a socially appropriate Adult-Parent relationship. The implementation of a contingency contract, was deemed to be the most suitable – Able to transition into novel environments, transferable skill teaching, suitable for his level of intellectual functioning (Dunlap, 1995). Due to his current refusal to communicate verbally, the best way to communicate the contingencies was deemed to be the use of Social Stories (Gray, 1995) This was put in place during family visits as well as pairing preferred activities with parental contact to rebuild this relationship. (Carr et al., 1994; Durand, 1990; Lucyshyn, 2002; Roberts, 1989) which was found to be an effective way of building rapport in services.

### Intervention summary

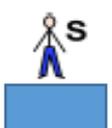
The first stage of the intervention was to complete a preference assessment to determine which preferred item or activity could be paired with parental contact (Lucyshyn, 2002). This was completed with Philip, a Keyworker who knew him well and his mother. Each of these was ranked and the top two (Dog walking and Milkshake) were selected to be introduced. A Social Story was developed incorporating these preferences, an example of one of the Social Stories™ used can be found below. This also incorporated a contingency for Philip to inform staff if he found the environment or interaction aversive (Gray, 1995).

 **S** is going to meet his  Dad and  dog

for a  walk at a  park.

 **S** and  Dad will then go for a

 milkshake and  cake at a  cafe

 **S** may  feel  upset or  scared, this is =

 ok.

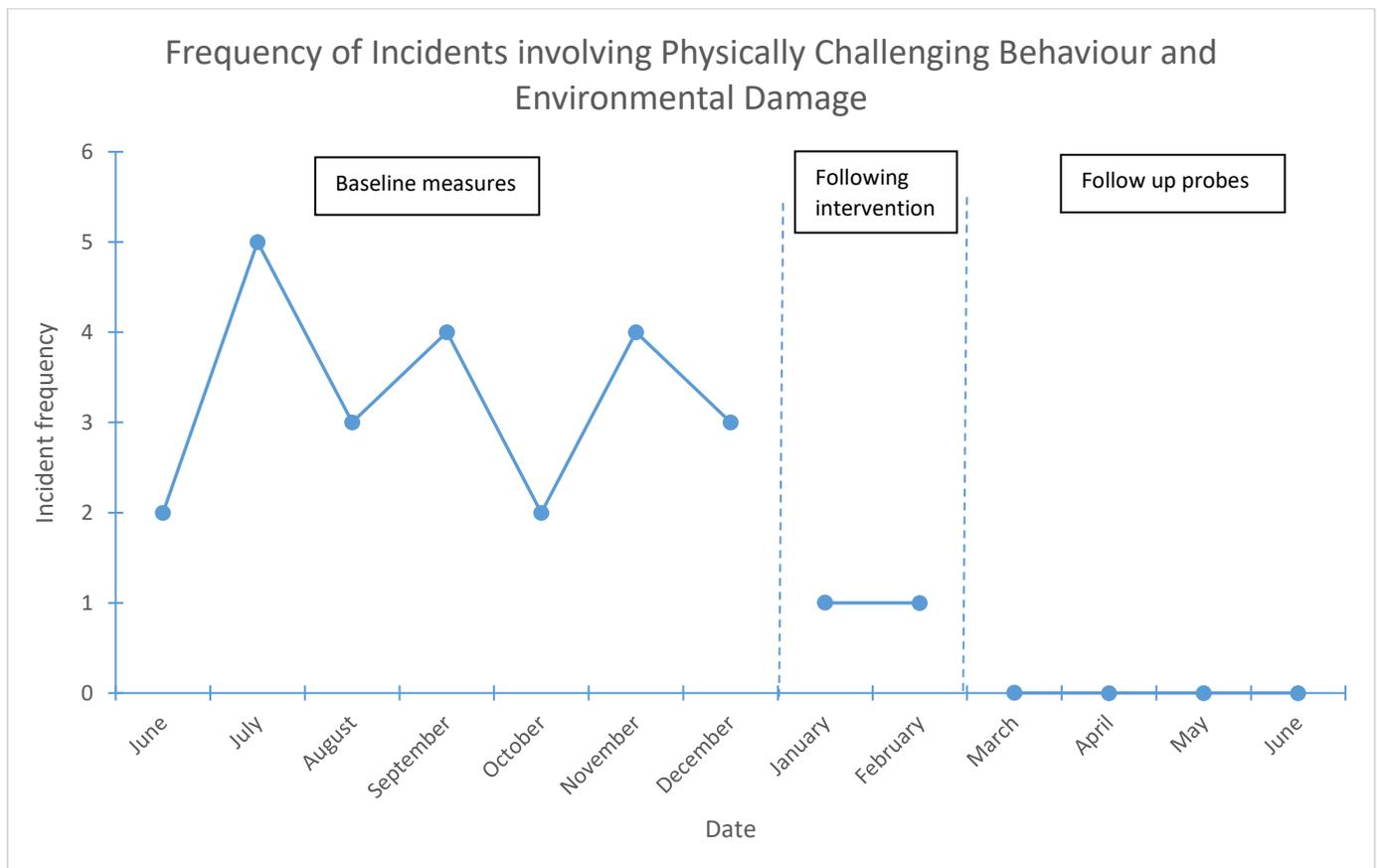
If  feels upset  or scared , he can

 ask  staff to leave, and  go  home.

 will have a nice time with  Dad. 

## Results

Total count data for the emission of environmental damage and physically challenging behaviour was recorded for 2 months consecutively to ensure enough data was gathered to inform future intervention development, followed by a further four months of follow up probes to ensure the consistency of the approach and continued reduction in challenging behaviour expression. The results are displayed graphically below.



Philip responded negatively to the first presentation of the Social Story, screwed the paper up and threw it away, however later in the day of first presentation, he wrote to staff and asked questions about the visit, this was reinforced by staff and the Social story re-presented.

Philip responded well to future presentation, and it is hypothesised that not only did the visual presentation give Philip the opportunity to leave if he felt anxiety, but also prepared Philip for the event, ensuring he was aware of the structure and plan for the activity. Since pairing began in January, there has been a substantial increase in both Parental and Philip's satisfaction in the relationship. The Parents could visit his service, which before wouldn't have been possible and came to a party at the house. His mother reports "He is dramatically calmer....at ease with the guys who are supporting him.... can even be around his Dad now.... Always has had an active life, which is coming back now.... He even went on holiday which is really positive.". The relationship continues to develop and they are now looking at his first visit home, unsupported by his support team.

Paired with this Philip is now accepting verbal prompts from staff, and now seeks out staff to communicate, along with pro-social physical interaction (fist-bump). The service manager reports "When he first joined us there was a lot of challenges supporting him, he has changed dramatically and we are so proud of him, and pleased he is a part of our service. He is finding change easier, waiting less stressful and his relationship with his family has improved". In total, there has been a 93% reduction in incidents of Challenging Behaviour within 6 months of intervention, with Philip not showing any episodes of Challenging Behaviour from March-June, which has continued to date of writing.

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