Classical and operant conditioning for maladaptive behaviour

<u>Applying classical and operant conditioning therapies to change maladaptive human behaviour</u>

Psychologists who study the behaviourism approach suggest that behaviours of a human are learnt through either classical or operant conditioning. These behaviours can be changed through therapies. This assignment assesses the values of applying classical and operant conditioning therapies to change maladaptive human behaviour.

Operant conditioning is when behaviours are learnt through consequences; doing something to get something. " Operant conditioning creates a higher probability of repeated behaviour through reinforcement" (Collin *et al* , 2012). A human would receive positive or negative reinforcement or even punishment for their behaviour. Consequently this would lead to repeated behaviour, changed behaviour or even stop the behaviour depending on the reinforcement received. B. F Skinner explained operant conditioning by conducting experiments in a box that he designed called the ' Skinner box' (1948, cited in Barker, 2002). For example a hungry rat was placed in a box, there was only a lever and a food dish inside. The rat knocked the lever and soon learnt that he received food for his action and kept repeating the behaviour to gain more food. This is an example of positive reinforcement because the rat received food for its action. Skinner (1948, cited in Collin, 2012) later introduced electric grids to the Skinner box which would give the rat an electric shock when the lever was activated. The rat's behaviour of pressing the lever decreased. This experiment showed that the receiving of negative reinforcement caused the rat to change its previous behaviour.

There are several therapies that use operant conditioning, one is called token economy. Behaviour is modified through reinforcement and also punishment; it has been used in many types of care units, such as mental hospitals, eating disorder clinics or even juveniles acting up (Barker, 2002). The patients involved in token economy would receive rewards in forms of tokens or points for good behaviour, this is positive reinforcement. On the other hand if bad behaviour was shown by the patients tokens would be taken away, this is negative reinforcement. Tokens can then be used for outings, privileges, goods, food or even extended visits with their family (Allen, 2013). When patients demonstrate good behaviour and are therefore rewarded with tokens it is hoped that the positive behaviour would be repeated with the aim of gaining more rewards. Eventually their pattern of behaviour would consequently change and would happen naturally. However if tokens were taken away for bad behaviour this would be negative reinforcement. The patient would realise that if they behaved badly, negative consequences would follow such as less tokens to spend on privileges or extra food. Eventually this would hopefully change the behaviour of the patient and their bad actions would decrease.

One study that showed token economy was carried out in an adolescent service at Boston hospital by Kris and Schiff (1968, cited in Thomas, 1974). They delivered the token economy therapy in the hospital for adolescents in the form of point cards. Each point gained was worth one penny which then could be accumulated and spent on food, privileges and outings. Each patient had a small plastic point card with their name and identification number embossed. Each time a patient earned points they would be given a

point's receipt and their point card would be stamped. All points would be added up at the end of the week and the reward of money would be given. The adolescents could gain 30 points by carrying out room maintenance such as bed making and also 10 points for arriving on time for lessons. Points would be taken away for lateness and untidy rooms.

The study demonstrated positive and negative reinforcement. The adolescents learnt that the cleaner their room and the quicker they went to class the more points they received, this is positive reinforcement. The behaviour would change and they would be better behaved and follow instructions. When points were taken away for lateness or no room maintenance being completed they would learn that these actions needed to be completed and they would change their behaviour and start showing up for lessons and also making their beds, this is negative reinforcement.

This interesting study showed improvement in adolescent's behaviour at the hospital however it should be noted that in some cases the adolescents were seen to steal receipt books and point stamps to try and give themselves points. The disadvantages for this study was that it wasn't very cost affective, the printing of point cards and receipts was very expensive. Also there was over a hundred staff members employed at this hospital and it was hard to train each staff member properly on the token economy point system and some staff would feel harassed and under pressure if working alone which meant they would give points out just so the adolescents would stop harassing them. (Thomas, 1974).

Another research was completed by Allyon and Azrin (1968, cited in Allen, 2013) who used token economy therapy to control the behaviour of 45 people with schizophrenia who had been in an institution for roughly sixteen years. The patients were given tokens for combing their hair or even making their own beds. The results of the therapy showed patients' chores each day rise from five a day to over forty. The patients that were receiving positive reinforcement by gaining tokens for completing more chores each day.

Token economy has positive and negative points to change maladaptive human behaviour. Token economy may work inside clinics or institutions but may not necessarily relate to life at home and living independently. Going from being praised for good behaviour and then having no one at home praising them may let the person slip back into their old way of behaving. Token economy may hide the underlying reason for someone's behaviour. It may make the behaviours and actions go away for a short period due to the person wanting to receive tokens to use for food and privileges but the underlying reason why they are behaving in the first reason will still be there. Using this therapy in institutions and clinics would require a lot of commitment and training from staff. It may not be cost effective to put every staff member through training. Also some staff may not be as committed as others and give out tokens to favoured patients or give out tokens to stop feeling harassed or under pressure. It would be important for staff to be consistent in their actions. Corrigan (1995, cited in Allen, 2013) claims that the therapy is humiliating and abusive to patients and is unethical. Token economy does change behaviour quickly and is good at changing unwanted

behaviour which shows in the study completed by Allyon and Azrin (1968, cited in Allen, 2013).

Classical conditioning is learning through association. Behaviours are learnt by associating one thing with another. Pavlov (1902, cited in Collin, 2012) showed classical conditioning by experimenting on dogs and their responses to food. He carried out several tests which involved dogs and the salivation glands. He used dogs and put them in restraints, when the dog salivated at different times he measured the amount of saliva produced. An unconditioned stimulus such as food was presented to the dogs which then provoked an unconditioned response; salivation. Pavlov then introduced a neutral stimulus such as a bell with the unconditioned stimulus; the food. The dogs started to salivate at the noise of the bell which was accompanied by food. After repeated tests the dogs started to salivate at the sound of the bell without any food which was a conditioned response; salivation without no food presented. This means the dog had learnt to associate the bell with food and would salivate before the food was given.

Systematic desensitisation (SD) therapy uses the principle of classical conditioning to reduce people's fears and phobias. Through several sessions a client would go through relaxation and becomes aware of the bodily cues associated with relaxation. The client then has more sessions to be trained step by step on how to relax in the presence of their fear. (Barker, 2002)

One study which was carried out was by Lang and Lazovik (1963, cited in Banyard and Grayson, 2000) which was called ' Fear today, gone tomorrow'. The study was a simple experiment which used twenty four students who

had a strong phobia of snakes. The students were given a list of twenty situations, including holding a snake to seeing a picture of a snake and were told to list them from least feared to most feared in a fear hierarchy. The students then started there SD, which included eleven forty five minute sessions which started with hypnosis and deep muscle relaxation and then slowly they worked through their fear hierarchy by imagining them. They were allowed to move onto the next fear once they could show they were relaxed during and after the previous one. Once all the sessions were completed the students had to carry out the ' snake avoidance test'. A snake was placed in a glass box 15 feet away and the students got marked out of 19 on how close they could get to the snake or to see if they could touch it. The results were compared to students that hadn't received SD therapy and they showed that the students that had completed the sessions could stand much closer to the snake and even some students could hold or touch the snake.

The idea of SD therapy is to associate the fear with relaxation. In the above study it shows that the students that went through SD could associate the deep relaxation with the snakes and in some cases even hold them. The students remaining calm meant they associated there calmness with a fear, which in turn the students could move on to their next fear and keep moving through them. SD is effective where the behaviour is a learned phobia or anxiety of a specific thing, McGrath et al (1990, cited in Allen, 2013) claims that SD works for around seventy five percent of people with phobias that are specific. However it only treats symptoms of the phobia or anxiety and doesn't help the underlying issue or reason and other therapies would need

to be used to look into these reasons. It doesn't work well with depression or schizophrenic clients. SD is a very slow process due to the amount of sessions needed to work through the relaxation process and then the fear its self but the longer the therapy and technique take the more effective it is.

Overall token economy and systematic desensitisation therapies do work but do have their negative points. Both therapies only resolve the symptoms and don't resolve the underlying reasons why the person's behaviour happened originally. This means eventually they could stop working especially if their environment changes and the treatment stops. Other therapies for other approaches would need to be considered to really understand and change the maladaptive behaviours of a person.

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