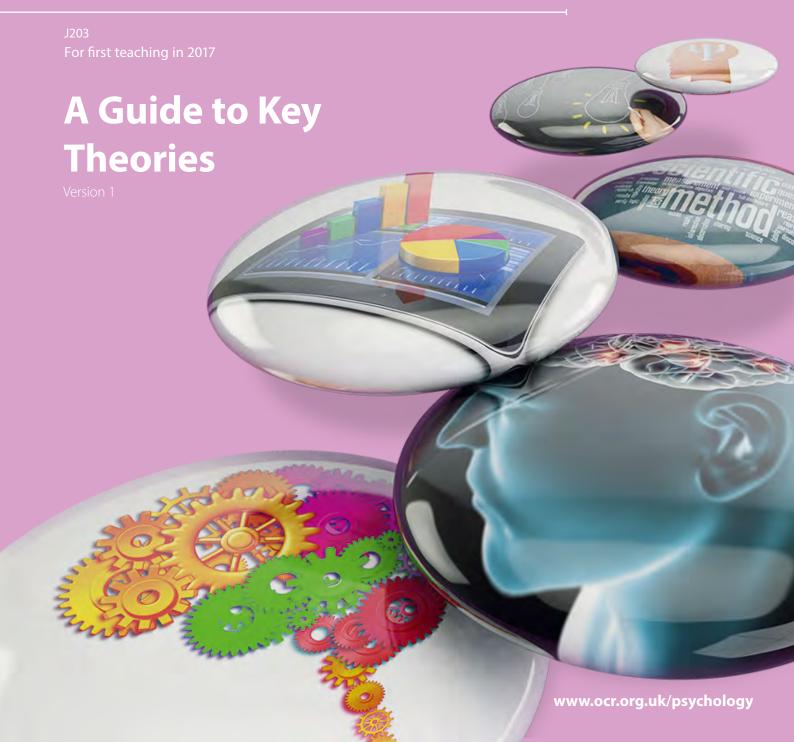
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GCSE (9–1)
Teacher Guide

# **PSYCHOLOGY**



## GCSE (9-1) PSYCHOLOGY

#### Introduction

This resource is to be used as a guide to help provide teachers and students with an understanding of the key theories used within GCSE (9-1) Psychology.

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#### **Criminal psychology**

#### The Social Learning Theory of Criminality:

The Social Learning Theory was developed by the North American behavioural psychologist **Albert Bandura**. Bandura suggested that all behaviour is learnt through observation and that children are particularly influenced by what they see. Social Learning Theory can be used to explain many behaviours including aggression and criminality. A real life example of Social Learning Theory occurred in 1993; Jamie Bulger a two year old boy was murdered by two ten year old boys. It was alleged that the boys had been watching aggressive and violent films, such as Childs Play III and they imitated the violence they saw from a scene that they observed.

Children will have **role models** who they look up to; these people are often parents or older siblings, they could also be TV or film stars, or even video game characters who they want to be like. Children will **identify** with role models, particularly if they have similar characteristics to them. In the case of criminal/anti-social behaviour a child may **observe** a criminal act which creates a mental representation in their mind, because they have seen this particular behaviour they are more likely to copy or imitate the act. The likelihood of the criminality being imitated is further increased by the process of **vicarious reinforcement**, these are any rewards that the observer might witness. For example, a role model could be rewarded for their criminality; financially or through an increased status. The observation of such consequences are much more likely to lead to criminality being imitated compared to a situation where **vicarious punishment** may occur; this may be witnessing a criminal being arrested or sent to prison.

After observation has occurred the person may have **internalised** the criminal act, e.g. knowing how to pick-pocket. Once this has happened the observer may decide to carry out the act themselves. If they are successful in the criminal act and are not caught, then they will receive **direct reinforcement** through the gaining of the item they have stolen. The consequences of this direct experience determine whether criminality will continue.

The Social Learning Theory of Criminality can be supported by research evidence including the study by **Cooper and Mackie** (1986) who found that playing and observing aggressive video games increases the likelihood that they will subsequently play with aggressive toys.

The theory however can be **criticised** for ignoring the role of **nature** and focusing too much on **nurture**; not every person who observes criminal behaviour will be a criminal themselves. Furthermore, supporters of SLT would state that the offspring of criminals become criminals themselves because of what they are exposed to, however it is possible that the reason for criminality may be due to the biology that they share such as their genes or brain dysfunctions.

## Eysenck's Criminal Personality Theories (1964 and 1992) and the Biological Basis of Personality (1967)

**Eysenck's Criminal Personality Theory** states that criminal behaviour relates to the functioning of the **central nervous system** (**CNS**). Three personality types were associated with criminal behaviour; **extraversion**, **neuroticism and psychoticism**. These are measured by completing an **Eysenck Personality Questionnaire** (**EPQ**.)

**Extraverts** are highly sociable, impulsive and, risk and sensation seeking. Levels of extraversion are controlled by the level of **arousal** in an individual's CNS and **autonomic nervous system** (ANS). Extraverts will have low levels of arousal and will require stimulation from the environment. Engaging in criminal behaviour may be a way of stimulation. People with high **neuroticism** scores are anxious, depressed and react very strongly to aversive stimuli. If somebody is neurotic they are anxious and are easily distressed. Levels of neuroticism are affected by the overall level of stability of the CNS. High neuroticism is thought to be caused by a high degree of instability and reactivity in the CNS. Finally, **psychoticism** is characterised by a lack of empathy and egocentrism and is associated with anti-social and aggressive behaviour. Eysenck was not entirely clear on how psychoticism related to the nervous system.

However, Eysenck (1992) suggested that psychoticism may be caused by an **overactive dopamine system** and the reduced inhibition of **dopaminergic neurons**, which results in an excessive production of dopamine.

Arousal is regulated by an area of the brain called the **reticular activating system (RAS)**. Studies such as Gray (1970) have shown that this area is more active in introverts than extroverts. This therefore suggests that arousal levels are not well controlled in extroverts.

Research has found evidence of an inverse correlation between cortical thickness and extraversion in the right inferior frontal cortex (Wright *et al.*, 2006). This means that extraverts are more likely to have a thinner right inferior frontal cortex, compared to introverts. Therefore brain thickness may cause extraversion!

When stressed, people with high levels of neuroticism will quickly activate their ANS and **limbic system**, and it is slow to decrease its activity once the stress has disappeared, showing that it is highly reactive.

According to Eysenck these personality types and risk of criminality develops mainly due to genetics and arousal, but early socialisation and difficulties in conditioning can also play a part.

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Eysenck believed criminal behaviour is due to immaturity, selfishness and the inability to delay gratification. **Socialisation** teaches children to delay gratification through **conditioning**. When children act in immature ways they are punished and therefore **associate** anxiety with anti-social behaviour and therefore avoids this behaviour. Eysenck thought that people with high levels of extraversion and neuroticism have a CNS that makes them difficult to control due to the low levels of arousals and high levels of instability respectively and as a result they are not easy to socialise. As a result they are more likely to engage in criminal and anti-social behaviour as they do not associate it with negative consequences.

The Eysenck's Criminal Personality Theory was tested by **Heaven (1996)** who found although the psychoticism, extroversion and low self-esteem (this was tested instead of neuroticism) may be correlated with self-reported delinquency they cannot be said to be the cause of delinquency and therefore the study does not show significant support for the hypothesis.

The theory can be **criticised** for ignoring the issue of individual differences, in that there are many other factors in addition to the three personalities which contributes to a person's behaviour that Eysenck has ignored.

#### **Development**

#### Piaget's Theory of Cognitive Development

Swiss Psychologist Jean Piaget is probably the most famous developmental psychologist and his Theory of Cognitive Development is still influential today. Piaget developed his theory through observing his own children and their friends and tested them on their cognitive abilities at different ages. Piaget claims that all children go through these development stages at a fixed age (**invariant**) and therefore the theory is universal. Children are little scientists who develop through the four stages, because of their interactions with the environment and as a result of biological maturation.

As we get older we develop schemas (although we are born with some), a **schema** is a mental representation, thought, expectation or an idea based on our experiences. For example a schema for psychology might be that it is an amazing and interesting subject. Schemas assist with our cognitive development, this can be through assimilation; whereby an existing schema is used to deal with a new object or situation and it is incorporated into our existing ideas. While **accommodation** is when an existing schema does not fit and therefore needs to be changed in order to deal with the new information; for example developing the knowledge that a zebra is not a horse.

The first of the invariant stages is the **sensori-motor stage** which is from birth to 2 years of age. In the stage the infant develops motor co-ordination, as well as a body schema and so recognises themselves in the mirror. At birth children will lack object permanence, meaning that they will think that when an object disappears it no longer exists. At around 8 months children will search for hidden objects, therefore demonstrating the development of **object permanence**.

From ages 2 to 7 the children will be within the **pre-operational stage** of development. During this stage children will think that inanimate objects such as a teddy bear are living beings and have feelings, this is called **animism**. Children will also lack **reversibility** in their thinking; a child could identify that they have a mummy, but if they were asked if their mummy has a child they will say 'no'. Another characteristic of this stage is **egocentrism** which is the inability to view something from someone else's perspective.

The next stage is the **concrete-operational stage** which is from 7 to 11 years of age. There are a number of key developmental milestones during this period; animism is no longer present, reversibility develops and they no longer think egocentrically, so therefore can decentre. **Decentration** is the ability to understand more than one feature of an object such as it being tall *and* thin. Children can also order things such as tallest to smallest (**seriation**), as well as developing linguistic humour. One of the biggest developmental achievements at this stage is **conservation**. This is where a child is able to tell that something stays the same in quantity even though its appearance changes; such as the amount liquid in a tall thin glass and in a small wide glass.

The final stage is the **formal operational stage** which is from 11 years of age to adulthood. This is characterised by the ability to think in abstract and hypothetical ways and to successfully solve problems.

Piaget's Theory of Cognitive Development can be supported by research evidence including the **Piaget (1952)** study into the conservation of number, which found that children in the concrete-operational stage are more likely to be able to conserve number than children in the pre-operational stage.

The theory however can be **criticised** for being too **reductionist** in suggesting that all children automatically go through the same stages based on their biological maturation. Piaget ignores a more **holistic** view that many other factors contribute to children's cognitive development such as the role of teachers, parents, peers as well as cultural influences.

#### Learning theories of development; Dweck's Mindset Theory

In her 2006 book 'Mindset' Carol Dweck argues that abilities such as intelligence can either develop as a result of hard work, or that our talents are innate and will reach a certain level regardless of learning. Mindset relates to the way that we think in relation to where our talents come from and whether these are changeable. Those with a **fixed mindset** believe that intelligence is predefined and we our born with certain abilities. Those with a **growth mindset** however, believe intelligence can be developed through experiences and if we work hard and learn skills then our abilities and therefore our intelligence will improve.

We may not be aware of our mindset. Although our mindset will influence our behaviour, the amount of **effort** that we make, our response to feedback and it can also influence expectations of our own performance. Those with a fixed mindset fear failure as it reflects badly on their innate talents.

Teachers and parents play an important part in the development of different mindsets through the type of **praise** that they give. If children are given feedback such as "good job, you are very smart" a fixed mindset is likely to develop as these comments highlight the child's innate ability. On the other hand if they receive praise such as "good job, you worked very hard" a growth mindset is likely to develop because this implies that high performance is due to the amount of effort made. The growth mindset can aid students who may be failing, as they can be encouraged to persist and work harder to achieve success. **Blackwell et al.'s (2007)** study into fixed and growth mindsets provides support for Dweck's theory. Students with a growth mindset were found to have stronger learning goals, hold more positive beliefs about effort, and had greater motivation levels. Students with a growth mindset also had increased levels of maths achievement compared to those with a fixed mindset.

Dweck's theory can be **criticised** for focusing too much on the importance of nurture in that achievement is dependent on effort praise. Dweck ignores examples of people who will achieve well based solely on innate intelligence levels.

#### Willingham's Learning Theory

**Ideas on the myth of learning styles:** The idea behind learning styles is that different students have different ways of learning, and learning can improved if a teacher matches their teaching to that preferred learning styles. Visual, auditory and kinaesthetic are examples of such learning styles. Daniel Willingham believes that there is no evidence that learning styles exist and in fact they are a myth!

Supporters of learning styles state that individuals have preferences about how to learn and this is regardless of both ability and content of what they have learning, if they learn in this way it will have a positive and meaningful impact on their learning. However, Willingham states there is no evidence to support the view that simply changing the style of teaching and learning to match the learning style will improve learning. For example when given a list words to remember and a some images to remember, if learning styles theory was correct then visual learners should recall the images better, this is often not the case.

According to Willingham students are different in their abilities, interests and prior knowledge, but not in their learning styles. There are preferences about how to learn, but teaching to these preferences will not lead to better learning. Therefore, information should be presented for that content, while also considering abilities and interests of students.

**Willingham's ideas on the importance of meaning for learning:** Finally, Willingham states that meaning is what is important for learning. When in class, most of the information that you are required to learn is not visual or auditory, it is in fact meaning based. Learning Willingham's theory in a kinaesthetic way will not be helpful, regardless of your learning style. Occasionally we need to learn things visually (such as a map) and this is best way to learn that particularly content. But most learning takes place through understanding the meaning.

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#### **Psychological problems**

### The Biological Theory of Schizophrenia:

**The Dopamine Hypothesis of Schizophrenia** proposes that this mental illness is caused by high levels of dopamine. The theory states that the **dopamine system is overactive**, therefore **dopaminergic neurons** transmit signals more often than normal, which leads to high levels of dopamine binding to receptors. Furthermore, it is also thought that there are more **dopamine receptors** than normal in certain people's brains, therefore making it more likely that dopamine will bind to receptors, which could cause schizophrenia.

When our brains are not functioning as they should this will have a negative impact on our thoughts and behaviour. For example the brain being **over or under active**, or the **structures have been damaged**, or are **an abnormal volume** all may have an impact. The biological explanation proposes that brain dysfunction in a number of areas of the brain is reason for the development of schizophrenia.

The **frontal lobe** is the area of the brain that is responsible for logic, reasoning, problem solving, planning and judgement. People with schizophrenia have been shown to have poor performance in these areas. Psychologists have carried out brain scans on individuals diagnosed with schizophrenia when performing tasks such as the **Wisconsin Card Sort Test (WCST)** and have found **low levels of activity** in the frontal lobe; this suggests that abnormal brain activity in the frontal lobes may cause symptoms of schizophrenia.

From your study of memory you will know about the importance of the **hippocampus**. Patients with schizophrenia have shown difficulties using and accessing memories, therefore psychologists decided to investigate the role of the hippocampus in the disorder. Studies have found **reduced volume** of this part of the brain which can explain the poor levels of cognitive functioning. Heckers (2001) also reports abnormal levels of hippocampal activity when individuals are experiencing auditory hallucinations (hearing voices).

Another area of the brain associated with hallucinations in those with schizophrenia is the **temporal lobes**, researchers have also found this to be **overactive**. This brain dysfunction is also thought to adversely affect emotions (negative symptoms) and cause delusions, hallucinations and disordered thinking (Mandal, 2002).

Support for the biological theory of schizophrenia comes from **Daniel et al.** (1991) who found that biological treatments such as amphetamines enhance the ability of the pre-frontal cortex during a WCST task.

The biological theory of schizophrenia can be **criticised** for focusing too much on the **role of nature**; namely biological abnormalities such as high levels of dopamine and brain dysfunctions. However, these explanations ignore the importance of psychological factors such as upbringing and life events which support the **nurture** argument.

#### The Psychological Theory of schizophrenia - The Social Drift Theory

The social drift theory states that when someone is diagnosed with a mental illness, such as Schizophrenia, the very 'label' in itself could lead to the condition worsening. This is due to the associated **stigma** around mental illness which can then lead onto discrimination. Being labelled as someone with a mental illness can automatically lead to a downward shift in social class as a result of **rejection by society** which may include employers and friends. People may experience a lack of appropriate support which may in turn result in the loss of their job and even their home. The person with Schizophrenia may then choose to **disengage from society** even further because of this fear of discrimination and/or poor treatment. This can then lead to a deterioration of their mental health. Society's lack of awareness and understanding therefore causes further social drift for the person with the condition and they become more isolated within society. This theory opposes the **social causation theory** which claims that it is social class which instigates a mental illness and those who are from a low social status are more likely to experience mental illness (Cooper, 2005). The social drift theory states mental illness comes first and it is society which contributes to deterioration of the condition and their lowered social status.

The Social Drift Theory can be **criticised** as it doesn't actually provide an explanation for the *cause* of schizophrenia, it only explains the *effect* of being diagnosed with schizophrenia.

## The Biological Theory – The Social Rank Theory of Clinical Depression

**Evolutionary explanations** claim that we behave in a certain way for survival reasons, so that we can pass on our genes. Anthony Stevens and John Price developed the **social rank theory** as a way of explaining the evolutionary function of depression. When we lose a level of status or rank we can lose confidence in our abilities to regain it. If we were to fight to try and regain our rank we may suffer further losses which would be detrimental for our survival. Therefore depression allows us to accept a subordinate role. Symptoms of depression such as loss of energy or motivation and low mood will prevent the defeated individual loser from competing further and reduce their ambitions; this will prevent the loser from suffering further defeat in a conflict. Outward symptoms of depression such as sadness and crying signal to others that the loser is not fit to compete, and they also discourage others from attempting to restore the loser's rank.

**Taking on the role of a lower rank is adaptive as it reduces future conflict**; due to the way they are feeling the 'depressed loser' does not attempt to fight back, the depressive symptoms further reassures the winner that the conflict has ended with no further damage to the loser.

Support for the Social Rank Theory comes from **Tandoc** *et al.* (2015) who found Facebook envy can be linked to symptoms of depression, as a response to the perception of being a lower rank/status to others on Facebook. Tandoc *et al.* conclude that Social rank theory is a useful framework to understand the complex process of depression among college students.

However the theory has been **criticised** for failing to consider the complex nature of depression and reducing the explanation to an outdated evolutionary view, rather than considering the holistic view that depression can be caused by a wide variety of factors.

#### The Psychological Theory - the ABC Model of Clinical Depression

Ellis (1957) proposed the **ABC model**, which states that depression is the result of an **Activating event**, which leads to **irrational Beliefs**, which then cause negative **Consequences**. According to Ellis the 'B' is the most important part of the model. An individual who is not susceptible to mental illness will have a very different cognitive response to someone who is susceptible. For example, two students may fail an exam; one may believe that they must work harder, while another may respond with negative thoughts and feelings such as despair which could consequently mean the development of depression. Therefore, the ABC Model proposes that depression is the result of irrational beliefs, individuals who are prone to depression will perceive events in a more negative way than other people. Irrational beliefs include **catastrophising** which is the belief that something is far worse than it actually is, "**black and white thinking**" where something is either a success or a complete failure, and **personalising** which is where the person believes that anything that goes is completely their fault.

The theory can be **criticised** in relation to the freewill/determinism debate. The idea of freewill suggests that the individual is in control of their own thoughts, rather than them being determined by other factors such as our physiology. However, the ABC model does consider the contributory role of activating events. Unfortunately though, this means that cognitive explanations suggest that individuals are to blame for their own mental illness, although through **Cognitive Behavioural Therapy** this thinking can be changed.

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#### **Social Influence**

#### The effect of situational factors (other people and social) on behaviours:

**Majority influence on conformity:** Conformity occurs when a person is exposed to the beliefs and/or behaviours of a larger group of people, if the person changes their attitudes and actions to go along the group it can be said that they have been subject to majority influence.

Various situational explanations can explain majority influence on conformity. Compliance is where you conform to the group behaviour to gain their approval, but will privately disagree. On the other hand internalisation will occur in situations where the majority opinion has led you to change your opinion and accept the majority position and behaviour – you may conform to dress the same as your friends, as you genuinely believe that it looks good. In Asch's (1951) famous conformity experiment participants showed compliance in that they went along with majority's view in a line comparison task, when it seemed obvious they were giving the wrong answer. They complied by giving incorrect answers in order to avoid disapproval of the group.

Collective and crowd behaviour, including deindividuation: According to Le Bon (1895) when an individual is put in a crowd situation they will become anonymous and part of the faceless crowd. Rather than thinking as they normally would as an individual they would take on the collective mind of the crowd. This is known as deindividuation; a psychological state where people have a lowered level of self-evaluation and decreased concerns about the evaluation of others - meaning they do not think about consequences of their actions. As a result, normal constraints on behaviour and inhibitions are lowered and as a consequence anti-social behaviour is more likely to occur.

**Culture on pro-social and anti-social behaviour:** Nobles (1976) theory suggests that individualistic cultures such as western societies are focused more on personal goals and are therefore more anti-social and less pro-social. While non-western societies such as **collectivist groups** are more focused on the needs of the group and community tend to be far more pro-social in their interactions with others.

Research on 134 children aged 3-10 from six different cultures found that children were more altruistic in the less industrialised cultures (Whiting and Whiting, 1975) therefore providing support for the theory that collectivist cultures are more pro-social. However, there are large individual differences within collectivist cultures. Nobles (1976) reports that American-Indian cultures offer hospitality to every stranger, but the African mountain tribe people called the Ik, have a complete absence of pro-social behaviour for evolutionary reasons. They have been reported to show extreme levels of anti-social behaviour such as stealing, deceiving and even killing one another to make sure that they as individuals survive.

**Authority figures on obedience:** When we are given orders, whether we obey is dependent on a number of reasons; the authority figure may be wearing a uniform which gives the idea that they are a **legitimate authority figure** and should be obeyed. This was shown in Milgram's (1963) famous obedience study where 65% of participants obeyed orders to fatally electrocute another person (luckily it was all a set up and the shocks were not real). Milgram stated the reasons for obedience were due to **situational factors**; the study took place at an important University and the 'experimenter' giving the orders was wearing a white coat, this gave of the impression that the authority figure was legitimate and should be obeyed. Furthermore, the 'experimenter' took responsibility for what was happening and as a result the participants were no longer autonomous, independent individuals with free choice they became agents for the experimenter and entered the **agentic state**. It was therefore the situation that made them obey.

Support for the situational factors as an explanation of obedience comes from **Bickman (1974)** who found the more legitimate the social power shown by an individual through the wearing of a uniform, the more likely their orders will be obeyed.

The situational explanation can be **criticised** in relation to the free will/determinism debate. It is suggested that if individuals are placed in a particular situation then they will have no choice but to obey/conform/follow the crowd, however research shows that individuals do have free will and there are many examples of independent behaviour regardless of the situational factors.

#### The effect of dispositional factors (personality) on behaviours:

**Self-esteem on conformity:** Our self-esteem relates to how much we value ourselves. Humanistic psychologist Carl Rogers theorises that we have **self-concept** and an **ideal self**; these are what we think we are like and what wish to be like. The gap between self-concept and our ideal self will determine our self-esteem; if we have a large gap we have low self-esteem and if the gap is small we have high levels of self-esteem. Because individuals with low self-esteem lack confidence they are unlikely to stand firm on their beliefs in the face of opposition. They will conform either because they want to fit in with the majority and be liked (compliance), or they will think the majority are right in their thinking and they are wrong and as a result will conform due to internalisation. Conversely people with high self-esteem are not as easily influenced by others and are less likely to conform.

Locus of control (LOC) in crowds: People with high internal locus control believe that their behaviour is caused by their own efforts and decisions, while people with high external locus of control believe that their behaviour is due to luck and fate and external factors outside of their control. For example if somebody failed an exam someone with high internal LOC will blame it on themselves for maybe not revising enough. Alternatively, someone with high external LOC will blame their failure on the exam paper being unfairly hard or it being marked incorrectly. Much as external LOCs are more likely to obey and conform, they are also more likely to be influenced by, and go along with crowd, and collective behaviour, as they are more reliant on other people and are more easily persuaded and influenced because of their preference for external factors.

Morality on pro-social and anti-social behaviour: Morality relates to understanding what is right and wrong. You would expect that those with high levels of morality will display higher levels of pro-social behaviour, while those with lower levels of morality to display anti-social behaviour. Hornsey et al. (2003) found that people are much less likely to conform to the majority if this involved an immoral act. Low levels of conformity were found when the task involved cheating, thus showing the importance of dispositional factors such as obedience. Furthermore, Kohlberg (1969) found that participants in Milgram's research who had higher levels of moral reasoning were more able to resist the orders of the experimenter and showed lower levels of administering an electrical shock; which is clearly an immoral act.

**The authoritarian personality on obedience:** The authoritarian personality (Adorno *et al.*,1950) refers to a person who has high levels of respect for authority and therefore is more likely to be obedient to those who hold power over them. They also are likely to be intolerant and fixed in their beliefs. Milgram (1974) found in a variation of his electric shock experiment that those who were highly authoritarian were more likely to obey and gave higher levels of shocks than non-authoritarian participants.

The influence of the brain in dispositional factors, including; hippocampal volume in self-esteem; and regions of the pre-frontal cortex in morality: Self-esteem and internal locus of control were significantly correlated with hippocampal volume in both young people. (Pruessner *et al.*, 2005)

Young and Dungan (2012) reported that the (ventromedial) prefrontal cortex is activated when we are evaluating the emotional aspects of a moral decision. Damage to this part of the brain is associated with a lack of empathy, with anti-social behaviour and the inability to make suitable moral decisions, despite be aware of and understanding the rules of society.

Support for the dispositional explanation comes from **NatCen (2011)** who concluded that anti-social criminal behaviour (e.g. the Tottenham riots) is influenced by dispositional/individual factors such as an individual's beliefs about what is right and what is wrong and their assessment of the costs and benefits of involvement.

Dispositional factors can be **criticised** as explanation for social influence in so much as although individual traits may make somebody more likely to obey, conform, or follow a crowd. This can be generalised to all situations as there can be other factors that may prevent the person from being influenced.

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#### **Memory**

#### The Multi-store Model of memory:

The **Multi-store Model** of memory states that memory has three separate memory stores; the **sensory store, short-term memory (STM) and long-term memory (LTM)**. Atkinson and Shiffrin (1968) (the psychologists who developed the theory) argue that information must pass through each stage in order for information to become an LTM.

Information from our environment is detected by our senses; i.e. smells, sounds, images, tastes and touch, these will briefly enter our sensory memory for our a few seconds, this store also has **limited capacity**. If we pay attention to this information it will enter our STM; here information can be retained through **maintenance rehearsal**, such as repetition in order to recall the information. Encoding in our STM is therefore **acoustic** (by sound) for example through verbal rehearsal. If the memory is not rehearsed then it will decay after about **30 seconds** and be forgotten, or it will be displaced by new information. The **capacity** of our STM is approximately **7 items**.

In order for information to transfer into LTM **elaborative rehearsal** must take place, this is a way of remembering information which goes beyond repeating information – *meaning* may be attached to the information. Therefore encoding in our LTM is **semantic** which means that we encode by making information meaningful. Once information transfers to our LTM it may remain there permanently because the duration of LTM is **potentially forever** (although we may have difficulties accessing long term memories), furthermore there is no limit to the **capacity** of our LTM so this part of our memory will never get full!

The Multi-Store Model is supported by research evidence such as Wilson, Kopelman and Kapur (2008) who found that Clive Wearing had the inability to transfer information from STM to LTM, because of the damage he had to his STM he couldn't form new LTMs.

However, the model can be **criticised** for **over emphasising the importance of rehearsal**. It is claimed that information must be rehearsed to enter our LTM. This is clearly not always the case, **meaningful information** such as your GCSE results or news of bereavement does not need rehearsal, the significant nature of the memory ensures it is processed without the need to rehearse it.

#### The Theory of Reconstructive Memory:

The Theory of Reconstructive Memory was first discussed by Frederick Bartlett in the 1930s. Bartlett suggested that we can forget things quite easily, we do not have complete memories and there are often gaps in what we recall. In order to make sense of events that have happened we fill in these gaps and reconstruct our memories. According to Bartlett, we do this using **schemas** which are **expectations** based on previous knowledge and **experience** of events. As a result our memories of events are a combination of what actually happened, as well as our knowledge, expectations, beliefs and experiences of such an event.

During the reconstruction process memories can be distorted. **Leading questions** can be particularly effective in manipulating people's memories through suggestion. For example Loftus and Palmer (1974) found that by asking the question 'did you see the broken glass?' compared to 'did you see any broken glass?' can make witnesses of an accident believe that there was broken glass when in fact their wasn't. Leading question can distort memories.

As a result of reconstructing memories **confabulation** may occur, this is a memory disturbance where individuals will confidently, but inaccurately describe their memories. Confabulation may be a result of a brain disorder, or as a result of being exposed to inaccurate post-event information, leading questions, or through forgetting whereby schemas help fill in the gaps. This is after known as 'honest lying'.

Support for the theory comes from **Braun**, **Ellis and Loftus (2002)** who found that including impossible events in **autobiographical advertising** can cause people to believe they have experienced the events. Autobiographical advertising can lead to the creation of false or distorted memory.

There are many complex factors that may affect memory recall, by reducing it to problems with reconstruction is **reductionist**. Many other factors such as anxiety and age can contribute to recall, as can the factors in the acronym ADVOKATE used by police. (A - **Amount** of time the event was witnessed for, D - The **distance** between the witness and the crime, V - **visibility**, O - **Obstructions** to the witness' view, K - Was the criminal **Known** to the Witness, A - **Any** other reason to remember, T - **Time** since the incident, E - Any **errors** in the testimony.

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### Sleeping and dreaming

## The Freudian Theory of Dreaming:

Famous Austrian psychologist Sigmund Freud argued that the mind is like an iceberg; it consists of our conscious, preconscious and unconscious. The **conscious** mind (the tip of the iceberg) is made up of thoughts and wishes that we are aware of. The **preconscious mind** contains thoughts and desires that we are not aware of, but can easily be brought to consciousness. While the unconscious mind is below the surface and we are normally unable to access it. Within our **unconscious mind** we all have unacceptable thoughts, feelings and desires that our conscious mind cannot deal with. These desires come from part of our personality known as the **ID** which has primitive urges; these unacceptable feelings include the **Oedipus complex** where a young boy will have a sexual desire for his mother. This is during the **phallic stage of psychosexual development**; in each of these stages (**Oral, anal, phallic, latent and genital**) the child has a **fixation** with a particular sexual drive on a different area of the body.

Such socially unacceptable thoughts are repressed by another part of our personality called the **ego**. The ego is our reality principle and through **repression** these disturbing thoughts are prevented from being conscious to us. While the third part of our personality is the **superego** which is our moralistic side that tries to control the ID's urges.

According to Freud, when we sleep the ego is weakened and the unconscious mind tries to break through into our consciousness. In order to satisfy these unconscious desires we dream, this is known as **wish fulfilment**. However, if our desires came through in our dreams we would continually wake up and never be able to sleep due to their disturbing nature. As a result the ego carries out dream work, this is when the true content of our dreams are hidden through the use of symbols which do not disturb us. Therefore dreams will have two types of content; the **latent content** which is the true meaning of our dreams and the **manifest content** which is what we actually see in our dreams – it disguises the latent content through symbolism.

Support for Freud's theory comes from research by Freud himself on the **Wolfman (1918)**. Freud concluded that in this case traumatic events were repressed into the unconscious and projected to the conscious mind. The Wolfman's dreams had a latent and manifest content and the disturbing content related to the unconscious mind.

Freud's theory has been widely **criticised** for being highly subjective. Dream interpretation is dependent on person's opinion, which may differ from another person's. Therefore we cannot be sure whether this interpretation is correct. Freud may have interpreted dreams in a certain way to support his own theory. Furthermore, a dream may not have a hidden meaning; 'sometimes a cigar is just a cigar'.

## The Activation Synthesis Theory of Dreaming:

Hobson & McCarley's (1977) Activation Synthesis Theory of Dreaming suggests that dreams are a result of our mind trying to make sense of brain **activation** during sleep. During **REM sleep** brain restoration takes place and the body is paralysed and we cannot move. Furthermore, information from the senses doesn't reach brain areas that usually make sense of it.

Neuronal activity increases in area of the brainstem called the **pons** and random brain waves are generated. These waves travel up through the brain to higher brain areas in the **cerebral cortex** that would normally interpret sensory information. The information is treated as if it was real sensory information. Through interpreting the stimulation **synthesis** occurs; using stored memories to make sense of the information. However, because the brain waves activate many different brain areas such as the **limbic system** (which controls emotions) the resulting dreams are bizarre and even emotional.

Support for the theory comes from **Williams** *et al.* (1992) who found a difference between REM dreams and waking fantasies because of the difference in the neural activity of the brain between the two states. Dreams contained more bizarreness as well as other 'dreamy' features, suggesting they are random.

The theory can be **criticised** from being reductionist. It suggests that dreams are a random result of happens when the mind tries to make sense of brain activity that occurs during sleep. This is quite a simplistic view and ignores the view that dreams can be meaningful, it is further reductionist as it does not explain the purpose of dreams, just where they come from.

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#### References

Adorno, T. W., Frenkel-Brunswik, E., Levinson, D. J., & Sanford, R. N. (1950). The authoritarian personality. New York: Harper and Row (pp. 228).

Asch, S. E. (1951). Effects of group pressure upon the modification and distortion of judgment. In H. Guetzkow (ed.) Groups, leadership and men. Pittsburgh, PA: Carnegie Press

Cooper (2005) Retrieved from <a href="http://bjp.rcpsych.org/content/186/5/361">http://bjp.rcpsych.org/content/186/5/361</a>

Gray (1970) Retrieved from http://www.sciencedirect.com/science/article/pii/0005796770900690

Heckers (2001) Retrieved from http://onlinelibrary.wiley.com/doi/10.1002/hipo.1068/abstract

Hobson, J.A. & McCarley, R.W. (1977) The brain as a dream-state generator: An activation-synthesis hypothesis of the dream process. AMERICAN JOURNAL OF PSYCHIATRY, 134, 1335-1348

HORNSEY et al.() Retrieved from http://www.academia.edu/16379830/Deviance and Dissent in Groups

Kohlberg (1969) Retrieved from http://www.ulmus.net/ace/library/obedienceaspersonal.html

Lebon (1895) - http://historymuse.net/readings/LeBonMASSPSYCHOLOGY.htm

Loftus, E. F. & Palmer, J. C. (1974) Reconstruction of automobile destruction: An example of the interaction between language and memory. Journal of Verbal Learning and Verbal Behavior, 13(5), 585–589.

Mandal (2002) Retrieved from http://www.schizophrenia.com/New/Dec2002/hallucinateDec02.htm

Milgram, S. (1963) Behavioral study of obedience. Journal of Abnormal and Social Psychology, 67, (4), 371–378.

Milgram, S. (1974). Obedience to Authority: An Experimental View. New York: Harper and Row

Nobels (1976) Individualism & Collectivism. In Charalambos Triandis. H (1995) Individualism & Collectivism. Boulder, CO, US: Westview Press Individualism & collectivism.(1995).

Pruessner, J. C., Baldwin, M. W., Dedovic, K., Renwick, R., Mahani, N. K., Lord, C., Meaney, M., & Lupien, S. (2005). Self-esteem, locus of control, hippocampal volume, and cortisol regulation in young and old adulthood. Neuroimage, 28, 815-826.

Whiting, B., and Whiting, J. W. M. (1975). Children of Six Cultures: A Psychosocial Analysis

Young and Dungan (2012) Retrieved from <a href="http://moralitylab.bc.edu/wp-content/uploads/2012/03/YoungDunganSocNeuro2012.pdf">http://moralitylab.bc.edu/wp-content/uploads/2012/03/YoungDunganSocNeuro2012.pdf</a>

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