AQA Psychology A-level

Issues and Debates in Psychology

Summary Notes

This work by PMT Education is licensed under CC BY-NC-ND 4.0

Part 1 — Gender Bias

Gender bias is the tendency to **treat or represent men and women differently** based on assumptions about gender rather than genuine differences between them. Gender bias can occur when psychologists **exaggerate differences, minimise differences or treat male behaviour as the standard**.

1. Alpha bias

Alpha bias is the tendency to **exaggerate differences between males and females**. This can lead to one gender being presented as superior or inferior to the other, and has historically often resulted in **women being devalued**.

Example of alpha bias	How does it demonstrate alpha bias?	Potential consequence
Psychodynamic explanations of morality	**Freud** argued that females do not experience **castration anxiety**, meaning they have less pressure to identify with the moral standards of their same-sex parent. This could result in a **less developed superego**, suggesting females are less moral than males.	The theory **exaggerates a difference** between males and females and can portray women as **less morally developed**, potentially reinforcing negative stereotypes about women.
Bowlby (1951) – maternal deprivation	Bowlby's theory placed particular importance on the **mother's role** in early attachment and suggested that separation from the mother could have serious consequences.	Can exaggerate the difference between **mothers and fathers** and reinforce the idea that women are naturally more responsible for children's emotional development.
Gender differences in schizophrenia	**Cotton et al. (2003)** suggested that schizophrenia was historically diagnosed more frequently in men because women's symptoms may be **less severe or less noticeable**. Women may also be better able to maintain employment and relationships, meaning their symptoms could be overlooked.	This could lead to an **exaggeration of differences in schizophrenia between males and females** and potentially result in women being **underdiagnosed or receiving less appropriate support**.

CC BY NC ND

2. Beta Bias

Beta bias is the tendency to **ignore or minimise differences between males and females**. This can occur when research is conducted using only one sex but the findings are **generalised to both males and females**, creating the assumption that the same explanation applies equally to everyone.

Example	How it demonstrates beta bias	Potential Consequence
Fight-or-flight – Taylor et al. (2000)	Early research into the **fight-or-flight response** was mainly based on male animals because females were thought to introduce hormonal variation. Findings were then **generalised to females**, assuming males and females respond to stress in the same way. Taylor et al. proposed a **tend-and-befriend response**, suggesting females may respond to stress differently.	This may have **overlooked genuine gender differences** in responses to stress and produced an incomplete explanation of stress behaviour.
Asch (1956) – Conformity	Asch's original conformity research used a **largely male sample**, yet the findings were generalised to both males and females. This assumes that men and women **conform in the same way**, potentially minimising genuine gender differences.	The findings may not fully represent **female conformity**, meaning conclusions about conformity could be less universal than originally assumed.

CC BY NC ND

3. Androcentrism

Androcentrism can be a consequence of beta bias. If psychologists **minimise gender differences** and generalise findings from one sex to the other, **male behaviours are more likely to be used as the norm for understanding human behaviour**. This means that behaviours or experiences that are more common in females may be **overlooked or interpreted as unusual** because they do not fit the male norm.

This can have important consequences:

- **Diagnosis** – females may be less likely to be diagnosed when their symptoms differ from the **male-typical presentation**. For example, girls with ADHD may be overlooked when their symptoms are less overtly hyperactive or disruptive than those typically seen in boys.
- **Treatment** – treatments may not fully account for **female-specific experiences**. For example, emerging research suggests that ADHD stimulant medication may be **less effective during parts of the menstrual cycle**, but this has been poorly researched. This could mean that treatment developed without considering female hormonal changes does not always reflect women's experiences.
- **Research** – research may focus on male behaviour and then **generalise findings to females**. For example, **Milgram's** original obedience study used an all-male sample, yet the findings were generalised to explain obedience more generally.
- **Stereotypes** – female behaviour may be interpreted differently when it does not fit the male norm. For example, **Brescoll and Uhlman (2008)** found that men's anger was more likely to be viewed as rational and justified, whereas women's anger was more likely to be attributed to emotional or hormonal factors.

These examples show that androcentrism can affect **how behaviour is researched, understood, diagnosed and treated**, because male behaviour becomes the benchmark against which female behaviour is judged.

Universality refers to whether psychological theories and research can be **applied to people generally**, regardless of gender. Gender bias can reduce universality when research is based mainly on one sex and findings are then **generalised to the other sex**. This means theories may not accurately explain the behaviour or experiences of everyone they claim to apply to.

CC BY NC ND

AO3 - EVALUATION

The recognition of gender bias has contributed to the development of **feminist psychology**. This approach challenges **androcentric assumptions** within traditional psychology. Feminist psychologists have questioned whether theories and research have treated **male behaviour as the norm** and female behaviour as a deviation from it. **Eagly (1978)**, for example, acknowledged that women may be less effective leaders in some circumstances but argued that this knowledge should be used to develop **appropriate training** and increase the **representation of women in leadership**. This demonstrates that recognising gender bias can allow psychology to **challenge stereotypes rather than simply reproduce them**.

Additionally, gender bias has led psychologists to recognise the importance of **reflexivity** in research. Researchers should consider how their own **gender-related assumptions and expectations** may influence the questions they ask, the way they conduct research and how they interpret their findings. This can help researchers identify **potential sources of bias** rather than assuming that psychological research is completely objective. A reflexive approach can therefore help to **reduce gender bias within the research process**.

Gender bias can also have consequences for the **validity of psychological research**. **Rosenthal (1966)** found that male experimenters were more pleasant and encouraging towards female participants, suggesting that **researcher behaviour** itself can influence participants. **Eagly and Johnson (1990)** also found greater similarities between male and female leadership styles in **real-world research** than in laboratory studies, suggesting that laboratory research may **exaggerate gender differences**. This means that apparent differences between males and females may sometimes reflect **the way research is conducted rather than genuine differences in behaviour**.

Another consequence is that psychologists need to be careful not to **overcorrect for gender bias**. **Alpha bias** can exaggerate differences between males and females, whereas **beta bias** can minimise or ignore genuine differences. **Hare-Mustin and Marecek (1988)** argued that beta bias can obscure women's **specific needs**, such as those associated with pregnancy, childbirth and parenting. Therefore, reducing gender bias does not necessarily mean treating males and females as identical; psychologists need to distinguish between **socially constructed differences and meaningful differences**.

Gender bias can have **wider social consequences** because psychological research can influence expectations about the roles of men and women. For example, **Bowlby's theory of maternal deprivation** placed particular importance on the mother's presence during a child's early development and linked prolonged separation from the mother with later **emotional and behavioural difficulties**. This could reinforce the expectation that **mothers should remain at home to care for their children**, while placing greater responsibility on mothers if children later develop difficulties. Therefore, gender-biased psychological research can **reinforce traditional gender roles** and contribute to **social pressure on women**, showing that the consequences of gender bias can extend beyond psychology itself.

CC BY NC ND

Part 2 — Culture Bias

Culture refers to the **rules, customs, values and ways of behaving** shared by a group of people.

Cultural bias occurs when psychologists interpret behaviour using the **assumptions and standards of their own culture**. This can lead to behaviour from other cultures being misunderstood or judged inaccurately.

1. Alpha Bias

Alpha bias occurs when psychologists **exaggerate or assume differences between cultures**, treating them as **real and enduring**. This can lead to similarities between cultures being overlooked.

Example	How it demonstrates alpha bias	Potential consequence
Individualistic vs collectivist cultures – Takano and Osaka (1999)	Psychologists have often assumed that **individualistic cultures, such as the USA, are less conformist than collectivist cultures, such as Japan**. However, Takano and Osaka (1999) reviewed 15 studies comparing the USA and Japan and found that **14 did not support the expected difference in conformity**. This suggests that **cultural differences in conformity had been exaggerated**.	Psychologists may develop **inaccurate conclusions about cultural differences** and reinforce **stereotypes** about how people from different cultures behave.
Attachment – Van Ijzendoorn and Kroonenberg (1988)	Their meta-analysis found **differences in insecure attachment styles between cultures**. However, **secure attachment was the majority attachment type in every culture studied**. Focusing on the differences between cultures could therefore **make cultures appear more different than they really are**, while overlooking the important similarity that secure attachment was the most common pattern across cultures.	Psychologists may **overestimate the role of culture in attachment** and overlook evidence that **some aspects of attachment may be universal**.

Alpha bias can lead to ethnocentrism, where psychologists **use the standards and values of their own culture as the norm for judging behaviour in other cultures**. This is an issue because behaviour that is **normal or appropriate in another culture may be wrongly viewed as unusual or inferior** simply because it differs from the psychologist's own cultural expectations.

CC BY NC ND

For example:

- **Ainsworth's Strange Situation (1970)** was developed using mainly **American infants and mothers**, with secure attachment being the most common pattern.
- When the procedure was used with **German infants**, they were more likely to be classified as **insecure-avoidant**.
- This may have reflected **cultural differences in parenting**, as German culture placed greater emphasis on **independence and less physical closeness**.
- Therefore, applying American expectations of attachment could result in **culturally normal behaviour being misinterpreted as insecure attachment**.

2. Beta Bias

Beta bias occurs when psychologists **minimise or ignore cultural differences**, assuming that the same theories and explanations can be applied to people from different cultures. This can result in **Western theories being treated as universal**, even when behaviour may have a different meaning in other cultures.

Example	How it demonstrates beta bias	Potential consequence
IQ tests	IQ tests have often been developed using **Western ideas about intelligence** and then applied to people from other cultures. Western cultures may place greater emphasis on **individual intellectual ability**, whereas some collectivist cultures may place greater value on using knowledge within **social relationships and the wider community**. This can mean that important cultural differences in how intelligence is understood are **overlooked**.	People from other cultures may be **unfairly judged as less intelligent** because the test does not reflect their cultural understanding of intelligence. This could affect **educational opportunities and psychological assessment**.
Schizophrenia diagnosis	Western diagnostic approaches may **overlook cultural differences in the meaning of unusual experiences**. For example, hearing voices may be interpreted as a symptom of schizophrenia in Western psychiatry, whereas in some cultures hearing the voice of a **deceased relative or spiritual figure** may be considered a normal or meaningful experience. **Ukuthwasa** in some African cultures can also involve experiences that overlap with symptoms of schizophrenia but may be understood as **spiritual empowerment**.	People may be **incorrectly diagnosed with schizophrenia** when their experiences are culturally normal, potentially resulting in **inappropriate treatment, stigma and unnecessary distress**.

CC BY NC ND

3. Cultural Relativism

Cultural relativism is the view that behaviour should be understood **within the cultural context in which it occurs**, rather than judged using the standards of another culture. This recognises that behaviour considered normal in one culture may not be considered normal in another.

Psychologists should therefore consider the **norms, values and expectations of the culture being studied**, rather than assuming that their own culture provides the standard.

For example:

- When investigating attachment, researchers should consider **local parenting practices and cultural expectations** before interpreting behaviours as secure or insecure.
- This could involve working with **researchers who understand the culture**, adapting procedures where necessary and avoiding assumptions that behaviours have the same meaning in every culture.
- This helps ensure that findings reflect **genuine psychological differences rather than cultural differences in behaviour being misinterpreted**.

Emic and etic approaches provide different ways of studying behaviour across cultures.

Approach	Meaning	Link to culture bias
Emic	Studies behaviour **from within a particular culture**, focusing on the unique beliefs, values and experiences of that cultural group.	Can reduce cultural bias by ensuring that behaviour is **understood within its cultural context**, rather than judged using the standards of another culture
Etic	Looks for **similarities and universal aspects of behaviour across cultures**.	Can help identify behaviours that are genuinely **universal**, but can create an **imposed etic** if a theory or measure developed in one culture is applied to another without considering cultural differences

Indigenous psychologies can further reduce cultural bias by developing **psychological theories and research methods within individual cultures**, rather than simply applying Western theories to everyone. This can produce explanations that are **more culturally appropriate** and avoid imposing Western assumptions on other cultures.

AO3 - EVALUATION

Not all psychological behaviour is necessarily **culture-bound**. Although research has identified cultural differences in behaviours such as **conformity and obedience**, some aspects of behaviour appear to show cross-cultural similarities. **Ekman et al. (1969)** found evidence that people from different cultures could recognise basic facial expressions of emotion, supporting the idea that some emotional expressions have **universal features**. Similarly, features of infant-caregiver interaction such as **interactional synchrony and**

CC BY NC ND

reciprocity have been observed across cultures. This suggests that psychologists need to consider both **universal behaviours and cultural differences** rather than assuming that all behaviour is either completely universal or completely culture-specific.

Greater awareness of cultural bias has led psychologists to consider **cultural context more carefully when understanding mental health**. In the **most recent version of the DSM, the DSM-5-TR (2022)**, attempts have been made to improve consideration of **culture and social context**, including through the **Cultural Formulation Interview (CFI)**. This is important because mental health problems may be **experienced and expressed differently across cultures**, which can affect how a person's behaviour is interpreted. For example, **Black men in the UK have experienced disproportionately high rates of psychosis diagnoses**, so clinicians need to consider whether differences in diagnosis may be influenced by **social and cultural factors**, rather than assuming they are biological. The CFI encourages clinicians to explore how a person **understands and experiences their difficulties**, including whether experiences such as **hearing voices have a spiritual or culturally accepted meaning**. This can help clinicians decide whether an experience actually represents a **symptom of mental disorder** and reduce the risk of **culturally biased diagnosis**.

Psychological research may be **culturally biased** because it relies heavily on **WEIRD populations**, **Western, Educated, Industrialised, Rich and Democratic** participants. **Henrich et al. (2010)** highlighted that countries representing only around **12% of the world's population provided 96% of psychological research participants** in an analysis of major psychology journals. **68% of participants came from the US alone.** This shows how heavily psychology has relied on a relatively narrow range of cultures, meaning findings may be **generalised to people from other cultures** even when their values, experiences and behaviour differ. As a result, psychology may develop explanations that appear **universal but are actually culturally specific**.

Cultural bias can have **serious social consequences** when research is used to make judgements about different cultural or ethnic groups. The **US Army intelligence tests** included questions that were more familiar to people from American culture. **European immigrants scored slightly lower than white Americans**, while African-American recruits had the lowest average scores. **Gould (1981)** argued that these results were interpreted as evidence that some ethnic groups were less intelligent, rather than considering the **cultural bias of the tests**. This could reinforce **stereotypes and discrimination**, showing that culturally biased psychological research can influence how groups are treated in wider society.

Cultural bias can also affect how **children's behaviour is interpreted**, particularly when psychological theories are applied across different cultural contexts. **Ainsworth (1970)** developed the Strange Situation using mainly **white, middle-class American mothers and infants**, meaning that her findings may not fully represent children from different cultural backgrounds. For example, behaviours that are considered normal within one culture may be interpreted as **insecure attachment** when judged against expectations developed from another culture. This could have consequences in **education and safeguarding**, as professionals may incorrectly view culturally different behaviour as evidence of poor parenting or developmental problems. Therefore, applying psychological theories without considering **cultural context** could lead to children and families being **mislabelled or unfairly judged**.

CC BY NC ND

Part 3 — Free Will and Determinism

1. Free will

This is the belief that people have the **conscious ability to choose their behaviour** rather than being completely controlled by internal or external forces. People are therefore seen as having **personal control over their actions** and responsibility for the choices they make.

The Humanistic Approach

The **Humanistic approach** strongly supports free will, arguing that people have the ability to make choices and **take responsibility for their own behaviour**. **Rogers (1959)** argued that when people are controlled by others or external forces, they cannot take full responsibility for their behaviour or make meaningful changes. Taking **personal responsibility** is therefore important for personal growth and **self-actualisation**. This reflects the humanistic view that people are capable of making positive choices and developing their potential.

Moral Responsibility

Free will is also linked to **moral responsibility**, as people are generally held accountable for their own actions if they are considered capable of making conscious choices. This means that individuals can be praised or blamed for their behaviour because they are assumed to have **control over their actions**. This contrasts with determinism, which suggests that behaviour may be caused by factors outside an individual's conscious control.

2. Determinism

Determinism is the belief that behaviour is **caused by internal or external factors that are beyond our conscious control**.

There are two forms of determinism: **hard determinism** and **soft determinism**.

Type	Explanation
Hard determinism	All behaviour is **determined by internal or external causes**, so individuals have no genuine control over their behaviour. • E.g. The **Behaviourist approach** argues that behaviour is shaped by **conditioning and reinforcement**, while the **Biological approach** emphasises **genes, hormones and neurotransmitters** as causes of behaviour.
Soft determinism	Behaviour is **caused by internal or external factors**, but individuals can still have **some freedom to make choices** within these limits. • E.g. The **Cognitive approach** suggests that behaviour is influenced by **how people process information**, but individuals can still make choices based on their **thoughts, interpretations and reasoning**.

CC BY NC ND

The **causes of behaviour** can also be divided into three main types: **biological, environmental and psychic determinism**.

Type	Explanation	Example
Biological determinism	Behaviour is caused by **biological factors** such as genes, hormones, neurotransmitters and brain structures.	**Chorney et al. (1998) / Hill et al. (1999)** identified the **IGF2R gene** as a candidate gene associated with intelligence. Genes such as **MAOA and CDH13** have also been investigated as possible influences on criminal behaviour.
Environmental determinism	Behaviour is caused by **previous experiences and learning from the environment**, particularly through classical and operant conditioning.	**Watson and Rayner (1920)** demonstrated that a fear response could be conditioned in **Little Albert**. **Skinner** also demonstrated how behaviour can be shaped through **reinforcement**.
Psychic determinism	Behaviour is caused by **unconscious psychological forces**, including innate drives and experiences during childhood.	**Freud's** psychosexual theory suggests that unresolved conflicts during childhood can lead to **fixation**, which may influence adult personality. For example, fixation at the **anal stage** was proposed to produce an anal personality.

The Scientific Emphasis on Causal Explanations

Science aims to identify **causes of behaviour** so that psychologists can **understand, predict and potentially change behaviour**. For example, if research shows that **learning experiences contribute to the development of a phobia**, psychologists can use this knowledge to understand how the phobia developed and develop treatments to reduce it.

This fits with **determinism**, which argues that behaviour is **caused by internal or external factors**. Psychologists can use **controlled experiments** to manipulate one factor and measure its effect on behaviour, allowing them to investigate **cause-and-effect relationships**. If the same findings can be **replicated**, there is greater confidence that the relationship is genuine rather than the result of chance or other factors.

CC BY NC ND

AO3 - EVALUATION - Free Will

The concept of free will can have useful practical applications. If people believe they have **control over their own behaviour**, they are more likely to see themselves as responsible for their actions and believe they can change their behaviour. For example, this can encourage people to take responsibility for unhealthy behaviours and make changes to improve their lives. This suggests that even if behaviour is partly influenced by deterministic factors, the **belief in personal choice and control can have positive consequences**, supporting the value of free will as a psychological concept.

Belief in free will may have positive effects on mental health. Research has found that people with a more **internal locus of control**, who believe they have control over events in their lives, are less likely to develop depression. This suggests that having a sense of **personal control** may help people feel more capable of influencing their lives and coping with difficulties. Therefore, even if behaviour is influenced by other factors, believing that we have some control over our choices may have **psychological benefits**.

Neurological research challenges the idea that conscious decisions cause behaviour. **Libet et al. (1983)** found **brain activity before participants were consciously aware of their intention to move**, while **Soon et al. (2008)** found brain activity that could predict a simple decision up to **7–10 seconds before conscious awareness**. This suggests that some decisions may begin **unconsciously before we are aware of making them**. If the brain has already begun preparing for an action before conscious awareness, this challenges the idea that **conscious thought is responsible for our decisions**, providing evidence against free will.

Free will is difficult to test scientifically. Free will assumes that people can make **independent choices that are not determined by previous causes**. However, if a decision is genuinely free, it is difficult to identify or measure what caused the decision and therefore difficult to **objectively test or predict** it. This is a limitation because psychological explanations are expected to be **testable and supported by empirical evidence**. Therefore, free will may be difficult to investigate scientifically compared with deterministic explanations, which can identify and test possible causes of behaviour.

CC BY NC ND

AO3 - EVALUATION - Determinism

Determinism allows psychologists to identify causes of behaviour. If behaviour is caused by identifiable factors, psychologists can investigate these systematically and develop explanations based on **cause and effect**. For example, research into the biological causes of depression has identified the role of **genes, neurotransmitters and hormones**. This can allow psychologists to develop **effective interventions** by targeting factors that contribute to psychological problems. Therefore, the deterministic approach has practical value because identifying causes can help psychologists **predict and manage behaviour**.

Determinism may oversimplify complex human behaviour. MZ twin studies rarely show **100% concordance**, suggesting that genes do not completely determine behaviour. For example, studies have found around **80% similarity for intelligence** and **40% concordance for depression** in MZ twins. If genes were the only determining factor, MZ twins would be expected to show almost identical outcomes. Instead, differences between twins suggest that behaviour is influenced by **many interacting factors**, including biological, cognitive, emotional and environmental influences. Therefore, reducing behaviour to a single determining cause may provide an **incomplete explanation of human behaviour**.

Hard determinism creates difficulties for the idea of free will and moral responsibility. If behaviour is completely determined by biological or environmental causes, individuals could argue that they **could not have acted differently**. This creates difficulties for systems such as the **justice system**, which generally holds people responsible for their actions. If people are viewed as having no control over their behaviour, it becomes difficult to justify **moral responsibility and punishment**. This raises an important question about whether people should be held responsible for actions that were determined by factors outside their control.

CC BY NC ND

Part 4 — The Nature-Nurture Debate

The **nature–nurture debate** considers whether behaviour is mainly influenced by **nature (heredity and biological factors)** or by **nurture (environmental experiences)**. The debate focuses on the **relative importance of nature and nurture**, although most psychologists now recognise that the two **interact to influence behaviour**.

Nature refers to the **biological influences on behaviour that we inherit**, including genes, hormones, neurotransmitters and brain structures. **Heredity** refers specifically to the **passing of genetic characteristics from parents to their offspring**.

➔ For example, research into **schizophrenia** has found higher concordance rates in **MZ twins than DZ twins**, suggesting that **genetic factors contribute to the development of the disorder**.

Nurture refers to influences on behaviour that come from the **environment and experiences**, such as learning, relationships and the social or physical environment.

➔ For example, a child may **learn aggressive behaviour by observing and imitating aggressive role models**.

Evidence for Nature and Nurture

There is evidence that **both nature and nurture influence behaviour**. Research into genetics and evolution provides evidence for the influence of nature, while approaches such as behaviourism and social learning theory emphasise the importance of environmental experience.

Nature	Nurture
Genetic influences: Joseph (2004) used twin studies and found higher concordance rates for schizophrenia in **MZ twins (40%) than DZ twins (7%)**. This suggests that **genetic factors contribute to the development of schizophrenia**. However, MZ twins do not show 100% concordance, suggesting that environmental factors also play a role.	**Behaviourism:** Behaviourists argue that behaviour is **learned through experience**. Classical and operant conditioning show how environmental experiences and consequences can shape behaviour.
Evolutionary influences: Bowlby argued that attachment is **innate and adaptive**. Behaviours such as social releasers encourage caregivers to provide protection, increasing the infant's chances of survival.	**Social Learning Theory: Bandura** argued that behaviour can be learned by **observing and imitating role models**. Vicarious reinforcement also influences whether observed behaviour is repeated.

CC BY NC ND

The Interactionist Approach

The **interactionist approach** argues that **nature and nurture work together** to influence behaviour. Neither biological nor environmental factors alone are necessarily sufficient to explain behaviour.

The **diathesis–stress model** provides an example of this approach. A **diathesis** is a biological or genetic vulnerability to a disorder, while **stress** refers to environmental experiences that may contribute to its development. Therefore, a person may have a biological vulnerability without developing a disorder unless environmental factors also contribute.

For example:

- A person may inherit **gene variants associated with an increased vulnerability to OCD**, such as variants of the **SERT or COMT genes**, from a parent who carries them.
- However, this genetic vulnerability **does not mean** that the person will definitely develop OCD.
- An environmental experience, such as **serious illness, an accident or loss within the family**, may create intense anxiety and a fear that something bad will happen again.
- In response to this anxiety, the person may develop **repetitive behaviours, such as checking, washing or seeking reassurance**, to try to reduce their anxiety.
- If they already have a **genetic vulnerability to OCD**, these environmental experiences may contribute to the development of the disorder.
- This demonstrates how **inherited biological factors and environmental experiences can interact** to influence behaviour.

CC BY NC ND

AO3 - EVALUATION

The nature-nurture debate should be viewed as an interaction rather than a choice between two separate explanations. MZ twins have very similar genes, yet concordance rates for behaviour and psychological disorders are **rarely 100%**. This suggests that **nature alone cannot explain behaviour**, while differences between individuals' experiences also show that **nurture cannot be considered in isolation**. The **diathesis-stress model** supports this view by suggesting that a biological vulnerability may only lead to a disorder when combined with an **environmental stressor**. Therefore, behaviour is best understood as the result of **nature and nurture working together**.

Nurture can influence nature, showing that the two cannot be separated. Experiences and learning can cause **physical changes in the brain**, meaning that environmental influences can affect biological characteristics. **Maguire et al. (2000)**, for example, found that London taxi drivers had a larger volume of grey matter in the **hippocampus**, with greater changes associated with longer experience as a taxi driver. This suggests that **environmental experience can influence biological development**, supporting the interactionist view.

Nature can also influence nurture, making the relationship between the two bidirectional. Plomin (1994) suggested that individuals may **select or create environments** that fit their natural characteristics through **niche-picking and niche-building**. For example, a naturally aggressive child may be more likely to choose aggressive peers, which could then reinforce their aggressive behaviour. This shows that **nature can influence the type of nurture a person experiences**, while nurture can subsequently influence behaviour. Therefore, the relationship between nature and nurture is **complex and interactive**, rather than one simply causing the other.

Epigenetics provides further evidence that nature and nurture interact. Epigenetics refers to changes that affect **how genes are expressed** without changing the DNA itself. Environmental experiences, such as **stress, diet or childhood experiences**, can influence whether certain genes are switched **on or off**. This means that having a particular gene does not automatically mean that a particular behaviour or characteristic will develop. For example, two people may have very similar genes but develop differently because their **experiences affect how those genes are expressed**. Therefore, epigenetics shows that **nature provides biological potential, while nurture can influence how that potential is expressed**, supporting the view that nature and nurture cannot be considered separately.

CC BY NC ND

Part 5 — Holism and Reductionism

1. Holism

Holism means explaining behaviour by looking at the **whole person and how different factors work together**. Holistic psychologists argue that breaking behaviour down into separate parts may cause important information to be lost because the parts **interact with each other**.

This idea is associated with **Gestalt psychology**, which argues that people naturally perceive experiences as **organised wholes rather than as separate individual parts**. The Gestalt principle that **"the whole is greater than the sum of its parts"** therefore supports the holistic view that behaviour cannot always be fully understood by studying individual components separately.

The **Humanistic approach** is also holistic because it considers the **whole person**, including their experiences, relationships, self-concept and personal growth. For example, **Rogers' person-centred approach** considers how a person's experiences and self-concept influence their psychological development, rather than reducing behaviour to biological or environmental causes.

For example, a holistic explanation of **depression** might consider how **biological, psychological and social factors interact**, rather than focusing on just one cause.

2. Reductionism

Reductionism means explaining complex behaviour by **breaking it down into simpler components**. Reductionists argue that complex behaviour can be understood by studying these smaller components rather than the behaviour as a whole.

i. Levels of Explanation

Levels of explanation are the different ways in which the **same behaviour can be explained**. These range from **higher-level social and cultural explanations**, through psychological explanations, to **lower-level biological and neurochemical explanations**.

For example, depression could be explained at different levels:

Level	Explanation of depression
Social	Depression may be linked to **social isolation or relationship problems**.
Psychological	Depression may be explained by **negative thoughts and beliefs**, such as those described by **Beck's Cognitive Theory**.
Biological	Depression may be explained by **genes, neurotransmitters or brain structures**.

CC BY NC ND

The **reductionist hierarchy** suggests that explanations can be progressively reduced from **higher levels to lower levels**. Lower-level explanations are considered more fundamental because they explain the underlying processes that produce behaviour. Therefore, a reductionist view suggests that a **higher-level explanation could eventually be explained in terms of a lower-level explanation**.

For example, a psychological explanation of depression could eventually be reduced to the **biological processes underlying thoughts, emotions and behaviour**.

ii. Types of Reductionism

Type	Explanation	Example
Biological reductionism	Reduces behaviour to **biological factors**, such as genes, hormones, neurotransmitters and brain structures.	Depression could be explained in terms of **abnormal neurotransmitter activity**, such as serotonin.
Environmental reductionism	Reduces behaviour to **simple stimulus–response links** that are learned through environmental experience.	A phobia could be explained through **classical conditioning**, as demonstrated by **Watson and Rayner's Little Albert study**.

AO3 - EVALUATION - Holism

Holistic explanations can provide a more complete picture of mental health. Rather than reducing mental health to a single symptom or cause, a holistic approach considers **different aspects of a person's psychological functioning**. For example, **Jahoda (1958)** proposed six criteria for ideal mental health, including **positive attitudes towards the self, personal growth, autonomy and accurate perception of reality**. Similarly, the **humanistic approach** takes a holistic view by considering the whole person and their subjective experience. Therefore, holistic explanations can provide a **more complete understanding of complex psychological functioning**.

Holistic explanations can be difficult to investigate and apply. Considering many different factors at the same time makes it difficult to determine **which factors are most important**. This can also make it harder to identify which factor should be targeted when developing treatments for psychological disorders. Therefore, although holistic explanations may provide a more complete picture, they may be **less useful for identifying specific causes and effective treatments**.

Holistic explanations may be difficult to test scientifically. They often focus on **abstract concepts** that are difficult to measure objectively. For example, **Maslow (1943)** proposed a hierarchy of needs, with **self-actualisation** at the highest level. However, what satisfies a particular need may **differ between individuals**; one person's esteem needs might be satisfied by academic achievement, while others might be satisfied by social recognition. This makes concepts within humanistic psychology difficult to **operationalise and measure consistently**, making the approach less empirically testable.

CC BY NC ND

AO3 - EVALUATION - Reductionism

Reductionism is consistent with the scientific approach. Scientific psychology aims to **predict and control behaviour**, which is easier when behaviour is broken down into smaller, measurable components. These components can be **measured and manipulated under controlled conditions**, allowing psychologists to identify cause-and-effect relationships between variables. Therefore, reductionism can increase the **scientific credibility of psychology** by making behaviour easier to investigate objectively.

Reductionist explanations can have practical applications. Biological reductionism has contributed to the development of **drug therapies** for mental disorders. For example, **SSRIs** are used to help manage depression, OCD and anxiety by increasing the availability of serotonin in the brain. This provides a practical application of reducing a complex disorder to **biological processes**, allowing people to manage symptoms without requiring long-term hospitalisation in some cases. Therefore, reductionist approaches can have a **positive impact on people's lives**.

Reductionism may oversimplify complex behaviour. Reducing behaviour to smaller components can ignore the **social context** in which behaviour occurs, which can affect its meaning. For example, speaking involves biological processes, but the meaning of speech depends on the **social situation and the individual's purpose**, such as expressing an opinion or alerting someone to danger. Therefore, reductionist explanations may **lose validity** by failing to consider the wider context in which behaviour occurs.

Part 6 — Idiographic and Nomothetic Approaches

1. Idiographic Approach

The **idiographic approach** focuses on the **individual and their unique experiences**. It aims to develop a detailed understanding of a person's behaviour rather than producing general laws that apply to everyone.

Idiographic research is often associated with **qualitative data**, which provides rich and detailed information about an individual's experiences. Methods include **case studies and unstructured interviews**.

For example, **HM** was studied using a detailed case study following his brain surgery. His memory difficulties provided important information about the different types of long-term memory and helped inform further research.

Examples of Idiographic Approach:

Approach	How it demonstrates the idiographic approach	Example
Humanistic	Focuses on the individual's **subjective experience, self-concept and personal growth** rather than trying to establish general laws.	**Rogers (1951)** developed person-centred therapy, which focuses on understanding the individual's unique experience.
Psychodynamic	Uses **case studies and in-depth interviews** to develop detailed explanations of individual behaviour. However, **Freud** then used findings from individual cases to develop **general theories**, such as the psychosexual stages, meaning the approach also has **nomothetic elements**.	**Little Hans** in detail to investigate his fears and behaviour, but used this and other case studies to develop theories intended to apply to children more generally.

2. Nomothetic Approach

The **nomothetic approach** aims to establish **general laws and principles of behaviour** that can be applied to groups of people. It studies **large groups** and uses **quantitative data and statistical analysis** to identify patterns and differences between people.

The nomothetic approach is often associated with **scientific methods**, such as laboratory experiments and controlled observations. These methods allow researchers to control extraneous variables and establish **cause-and-effect relationships**. Findings can then be **replicated and generalised** to other people.

Radford and Kirby (1972) identified three ways that psychology can establish general laws:

1. **Classifying people into groups**, such as diagnosing people with particular disorders.
2. **Establishing general principles of behaviour** that can be applied to people in general.
3. **Establishing dimensions** along which people can be compared and measured, such as intelligence or personality.

Examples of Nomothetic Approach:

Approach	How it demonstrates the nomothetic approach	Example
Behaviourist	Uses **controlled laboratory experiments** to establish general laws of learning that can be applied to behaviour more widely.	**Pavlov (1927)** and **Skinner (1948)** demonstrated general principles of conditioning and learning.
Cognitive	Uses **objective and scientific methods** to investigate general principles of cognitive functioning.	Brain-scanning techniques such as **PET scans** can be used to investigate cognitive processes.
Biological	Uses scientific methods to identify **general biological explanations** of behaviour.	**Tulving et al. (1994)** used PET scans to investigate the localisation of different types of long-term memory.

CC BY NC ND

AO3 - EVALUATION - Idiographic

The idiographic approach can provide a detailed and in-depth understanding of individuals. Methods such as **case studies and unstructured interviews** allow psychologists to collect rich **qualitative data** that may reveal details that would be missed by large-scale research. For example, case studies of **HM and Clive Wearing** provided detailed evidence about their memory impairments and contributed to research into **different types of long-term memory and their relationship with brain regions**. This shows how studying individuals in depth can **generate new ideas and improve psychological theories**.

The idiographic approach may provide a narrow perspective. Findings from one individual may be difficult to **generalise to other people**, as individuals have unique experiences and characteristics. For example, the case study of **HM** provided detailed information about his severe memory impairment, but his unusual brain damage means the findings may not apply to people without similar damage. Similarly, **Clive Wearing's** unusual combination of severe amnesia and preserved musical ability makes it difficult to assume that his memory functioning is representative of the wider population. Therefore, idiographic research may have limited **generalisability** unless supported by research involving other individuals.

Idiographic research may lack scientific rigour. Methods such as **case studies and unstructured interviews** rely heavily on subjective interpretations from both the participant and researcher. This increases the risk of **researcher bias**, as researchers may interpret an individual's experiences differently. This can reduce the **reliability and validity** of conclusions drawn from the research, making it more difficult to establish scientific explanations that can be generalised.

CC BY NC ND

AO3 - EVALUATION - Nomothetic

The nomothetic approach uses highly scientific methods. It often uses **standardised procedures, controlled conditions and operationalised measures**, allowing behaviour to be measured objectively. This reduces the influence of **researcher bias** and makes findings more **reliable and replicable** as other researchers can repeat the same procedure and check whether similar results are obtained. The use of controlled methods also allows psychologists to establish **cause-and-effect relationships** between variables. Therefore, the nomothetic approach can increase the **scientific credibility of psychology**.

The nomothetic approach allows general laws and principles to be established. By studying **large samples** of people, psychologists can identify patterns of behaviour and establish **norms** that can be applied to the wider population. For example, the average IQ score is **100**, providing a standard against which an individual's intellectual ability can be compared. These norms can help psychologists identify behaviour that is unusual compared with the wider population and can therefore be useful in **diagnosis and assessment**. Therefore, the nomothetic approach is useful for developing **generalisable knowledge** about human behaviour.

The idiographic and nomothetic approaches can complement each other. Milton and Davis (1996) suggested that research could begin by identifying **general laws using a nomothetic approach**, before using an idiographic approach to explore how these laws apply to individuals. For example, a nomothetic study could establish that a particular factor is generally associated with depression, while an idiographic approach could then explore **how and why that factor affects a particular individual**. This provides both a general understanding of behaviour and a more detailed understanding of individual experiences. Therefore, the two approaches do not necessarily have to be viewed as opposing methods, as **general patterns and individual experiences can be studied together**.

The nomothetic approach may overlook individual experiences. Its focus on identifying general laws and patterns can mean that the **individual is lost within the data**. For example, knowing the frequency of depression within a population tells us little about how a particular person experiences depression, the factors contributing to it or which treatment may be most effective for them. This means that general laws may provide a broad understanding of behaviour but fail to capture the **complexity and uniqueness of individual experiences**. Therefore, nomothetic research may provide **generalisable findings but lack an in-depth understanding of individuals**.

CC BY NC ND

Part 7 — Ethical Implications

Ethical implications are the potential **consequences of psychological research and theories**. Researchers need to consider not only whether research is ethical, but also **what might happen as a result of its findings**. This is particularly important when research involves sensitive topics such as **intelligence, mental health, gender or parenting**.

The **British Psychological Society (BPS)** provides four main ethical guidelines that psychologists should follow when conducting research. These principles help researchers identify and manage **ethical issues** and protect participants throughout the research process.

Ethical guideline	What researchers need to consider
Respect	**Informed consent**, privacy, confidentiality and **equitable treatment** of participants.
Competence	Researchers should have the appropriate **knowledge, skills and training** to conduct research safely and effectively.
Responsibility	Researchers must consider the **risk–benefit ratio**, protect participants from harm and ensure their research is methodologically sound.
Integrity	Researchers should be **honest and transparent**, including accurate reporting of findings, appropriate handling of data and avoiding **deception or research misconduct**.

These principles are particularly important because psychological research can raise several **ethical issues** that researchers must consider:

- **P — Privacy:** Participants have a right to control access to information about themselves.
- **C — Confidentiality:** Personal information should be kept private and participants should not be identifiable without permission.
- **D — Deception:** Participants should not be deliberately misled unless there is a strong scientific justification and the deception is ethically acceptable.
- **R — Right to withdraw:** Participants should be free to leave the study at any point without penalty.
- **I — Informed consent:** Participants should understand what participation involves before agreeing to take part.
- **P — Protection from harm:** Researchers should protect participants from physical or psychological harm and minimise risks.

CC BY NC ND

Socially Sensitive Research

This is research that could have **social consequences for participants or the wider group they represent**. **Sieber and Stanley (1988)** argued that researchers should consider the possible consequences of research **before, during and after** it is carried out. For example, findings could affect **how a group is viewed**, influence **government policy** or contribute to **stereotyping and discrimination**.

Examples of socially sensitive research:

Example	Why is it socially sensitive?	Potential social implications
Bowlby (1951) – Maternal deprivation	Bowlby was commissioned by the **World Health Organization (WHO)** to investigate the effects of separation from parents on children. His report argued that prolonged separation from the mother during a **critical period** could have serious and long-lasting effects on children's emotional development. Because the research concerned **parenting, childcare and children's development**, the findings had implications for society beyond the children studied.	Bowlby's ideas became highly influential in attitudes towards **childcare and motherhood**. They contributed to the view that young children needed continuous care from their mothers and were used to argue against mothers leaving young children in **day care**. His ideas therefore helped reinforce the expectation that **mothers should be the primary caregivers**, placing greater responsibility on women for children's development. His WHO position also helped give these ideas a wider international influence.
Ainsworth (1970) – Strange Situation	Ainsworth's research identified different **attachment types**, but the original research was largely based on **American, middle-class mothers and infants**. This means behaviours that were considered typical or atypical may reflect the cultural context of the sample.	Applying the findings universally could lead to **children from different cultural backgrounds being incorrectly judged as insecurely attached**. This could influence how parents are viewed by professionals and potentially contribute to **negative judgements about different parenting practices**.

CC BY NC ND

Milgram (1963) – Obedience	Milgram found that ordinary people could obey an authority figure even when instructed to harm another person. This is socially sensitive because it raises questions about **how people behave in situations involving authority**, including workplaces and the military.	Findings could affect how **groups or individuals who obey authority** are viewed. They may also influence how organisations think about **authority, responsibility and training**, particularly where obedience could have serious consequences.

AO3 - EVALUATION

One strength is that socially sensitive research can have important benefits for society. Scarr (1993) argued that research into socially sensitive issues can increase understanding of **underrepresented groups** and may help to challenge **stereotypes and discrimination**. This suggests that psychologists should not automatically avoid socially sensitive research because of its potentially controversial nature. Research may challenge existing assumptions and provide a more accurate understanding of particular groups. Therefore, the potential **social benefits** of socially sensitive research can sometimes justify investigating controversial topics.

A further strength is that cost-benefit analysis allows the potential benefits of socially sensitive research to be considered alongside its ethical risks. Ethics committees can consider benefits such as increasing psychological knowledge or improving understanding of a particular group against possible costs to participants and wider society. This provides a systematic way of deciding whether research is ethically acceptable rather than simply rejecting research because the topic is sensitive. However, some consequences are difficult to predict, such as effects on **public attitudes, legislation or the treatment of particular groups**. Therefore, cost-benefit analysis can help researchers make informed ethical decisions, although it cannot account for every possible consequence.

One weakness is that socially sensitive research can be used as a form of social control. Research findings may be presented as **scientific justification for discrimination** against particular groups. For example, ideas about intelligence and genetic differences between groups have historically been used to support **eugenic policies**, including sterilisation programmes in the USA. **William Shockley (1960s)** also advocated controversial proposals involving sterilisation based on his views about the genetic basis of intelligence. This demonstrates that psychological research can have consequences beyond the individuals who participate in it and may affect entire social groups. Therefore, psychologists need to consider whether their findings could be misinterpreted or used to justify **discrimination or restrictions on people's rights**.

CC BY NC ND

A further weakness is that psychologists cannot always control how socially sensitive research is interpreted or used once it has been published. Sieber and Stanley (1988) argued that researchers should consider the **wider social consequences** of socially sensitive research, including how findings might be interpreted by the media and general public. Findings that are exaggerated, taken out of context or presented without appropriate limitations could reinforce **stereotypes and prejudice**. This means that even carefully conducted research could have negative consequences if its findings are subsequently misused. Therefore, researchers have an ethical responsibility to consider the possible consequences of their findings and how they are communicated.

CC BY NC ND