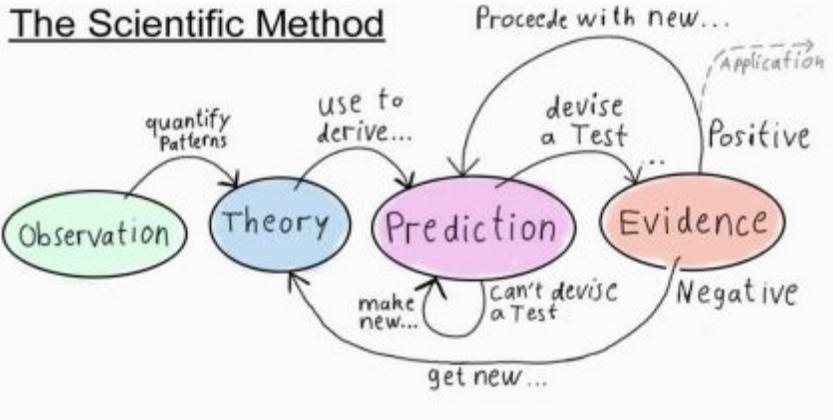


LECTURE ONE

What is psychology?

Definitions	<ul style="list-style-type: none">● Definition - science<ul style="list-style-type: none">○ Using scientific methods to get information about something○ Framework to uncover new information○ Evaluate and test hypothesis● Psychology is the scientific study of human behaviour<ul style="list-style-type: none">○ Think, feel and behave● Involving research methods and statistics● The focus of psychology is human beings● Principles of scientific research method provide effective strategy to design and evaluate● Principle of science:<ul style="list-style-type: none">○ rigorous , methodical approach to gather quality information and test hypothesis○ Objectivity (subjective challenges and how bias can impact opinion)○ Commitment to public knowledge (discoverys must be shared)○ Self-correction (improvement over time)
Types of psychology	<ul style="list-style-type: none">● Comparative psychology<ul style="list-style-type: none">○ Comparing to other animals● Social psychology<ul style="list-style-type: none">○ Looking at people in groups and their behaviour● Clinical psychology<ul style="list-style-type: none">○ Helping mental health issues● Personality psychology<ul style="list-style-type: none">○ Looking at individuals● Cross cultural psychology<ul style="list-style-type: none">○ Backgrounds and that influence● Perception psychology<ul style="list-style-type: none">○ The senses● Health psychology● organisational<ul style="list-style-type: none">○ Behave in the work setting● Forensic psychology<ul style="list-style-type: none">○ Psychology and the law● Cognitive psychology<ul style="list-style-type: none">○ The thought process● Developmental psychology<ul style="list-style-type: none">○ How we change across our life span● Indigenous psychology<ul style="list-style-type: none">○ First persons experiences are represented correctly
Foundational areas of	<ul style="list-style-type: none">● Personality● Social psychology

<p>psychology</p>	<ul style="list-style-type: none"> • Cognitive psychology • Perception • Development psychology • Biopsychology and neuropsychology • learning
<p>Applied psychology</p>	<ul style="list-style-type: none"> • Clinical psychology (psychopathology) <ul style="list-style-type: none"> ◦ Therapy and diagnosis oh health conditions • Organisational psychology <ul style="list-style-type: none"> ◦ How we work in the workplace • Health psychology <ul style="list-style-type: none"> ◦ Relationships between physical health and mental health, behaviours and how to increase positive • Clinical neuropsychology <ul style="list-style-type: none"> ◦ Brain injuries and understanding the functioning, intelligence • Educational psychology <ul style="list-style-type: none"> ◦ How you learn in educational systems, increase engagement and how you process information.
<p>Scientific method</p>	<p><u>The Scientific Method</u></p>  <pre> graph LR Observation([Observation]) -- "quantify Patterns" --> Theory([Theory]) Theory -- "use to derive..." --> Prediction([Prediction]) Prediction -- "devise a Test" --> Evidence([Evidence]) Evidence -- "can't devise a Test" --> Prediction Evidence -- "get new..." --> Theory Evidence -- "Application" --> Observation Evidence --- Positive Evidence --- Negative </pre> <ul style="list-style-type: none"> • Observation • Questioning • Hypothesis • Prediction • Experiment • result
<p>Naive realism</p>	<ul style="list-style-type: none"> • Error in perceptions, thinking and judgment • Confirmation bias <ul style="list-style-type: none"> ◦ Recall • Only focused on the personal beliefs • Belief perseverance <ul style="list-style-type: none"> ◦ People's beliefs tend to be hard to change as they are comforting and familiar • Interpreting information to make what we see not what is actually happening

<p>Pseudoscience (fake science)</p>	<ul style="list-style-type: none"> ● Claims, methods that appear scientific but are not ● Pop-psychology <ul style="list-style-type: none"> ○ Taking a little of a psychological fact and changing a fraction to appeal to an audience. Therefore losing evidence. ● Ad hoc immunising hypothesis <ul style="list-style-type: none"> ○ After the factors or reasons ○ External factors that can explain lack of evidence or success (not correct) ● Lack of self correction ● Reliance on anecdotes <ul style="list-style-type: none"> ○ One person said... ○ Not evidence ○ Don't update practices or ideas ● Can be dangerous to the progression of discovery
<p>Evidence</p>	<p>Example</p> <ul style="list-style-type: none"> ● Cognitive therapy treatment work for anxiety <ul style="list-style-type: none"> ○ How do I gather evidence? <ul style="list-style-type: none"> ■ Reliability ■ Validity ● Randomised control trials (an experiment) <ul style="list-style-type: none"> ○ 2 groups :CBT group and control group ○ Measure anxiety before and after the intervention <ul style="list-style-type: none"> ■ To see comparison of improvement ■ Compare the anxiety between two groups and natural circumstances ○ Compare the change in anxiety between the two groups ● If this is concluded effective, what does this mean <ul style="list-style-type: none"> ○ Not everyone improved their anxiety in both groups ○ This does not mean it will work for every type of anxiety ● A person is more likely to experience an improvement in anxiety if treated with CBT

LECTURE TWO

History and methods of psychology	
Scientific scepticism	<ul style="list-style-type: none"> • Questioning and making sure there is evidence for a certain claim or fact etc • Balanced with objectivity (not bias) and self-correction (when receiving new information which is different to what you believe you need to then update your knowledge etc)
Acquire knowledge	<ul style="list-style-type: none"> • Intuition <ul style="list-style-type: none"> ◦ Knowledge about behaviour based on opinion, faith, belief, or feeling (common sense). Not seeking evidence etc • Authority <ul style="list-style-type: none"> ◦ Knowledge about behaviour that comes from an expert or trustworthy source (especially supported by prior accuracy). Experience or qualification in that certain field, who should be knowledgeable ◦ Problems with this is that people can claim many different things without objective empirical evidence • Rational induction <ul style="list-style-type: none"> ◦ Knowledge about behaviour based on the combination of known information or 'facts' • Empirical science <ul style="list-style-type: none"> ◦ Knowledge about behaviour tested and confirmed via the scientific method ◦ measuring , testing, developing hypotheses • All valid bases for generating hypotheses, only empirical science is a valid method for testing hypotheses and confirming and therefore producing scientific psychological knowledge
Principles of scientific thinking	<ul style="list-style-type: none"> • Extraordinary claims need extraordinary evidence • Predictions need to be testable and falsifiable (disproved) <ul style="list-style-type: none"> ◦ Find evidence that does not find the hypothesis true, needs to be possible • Simpler explanations are better explanations (Occam's razor) • If it's true, it should be replicable <ul style="list-style-type: none"> ◦ Demonstrate phenomena over and over again with different people at different times • Rival hypotheses should be excluded • Correlation does not equal causation <ul style="list-style-type: none"> ◦ An association or relationship does not mean that one of those things causes a change
History of psychology	<ul style="list-style-type: none"> • Theory, mathematics/stats, 'data' all contribute to modern empirical psychology which have been formed from years and years of previous discoveries from famous scientists etc • Psychological theories

- Structuralism
 - Historically predominant in Europe
 - Wilhelm Wundt, Edward Titchener
 - Focused on (what is the structure of the mind?)
 - Similarities with philosophies of rationalists (Descartes)
 - Introspection (thinking about mind in a structured method) is its main method of investigation
- Functionalism
 - What is the practical use of the mind? How does the mind help us better adapt to our environment
 - Combination of evolution and pragmatism
 - William James (wrote on early psychology)
 - Uses all methods to aid in this understanding (combine theoretical and empirical)
 - Interested in commonalities and individual differences (variation)
- Evolutionary psychology
 - Many theorists (Cosmides and Tooby)
 - Psychological processes (traits) as evolutionary adaptations
 - Suiting our history and ancestral environment
 - Understanding in detail how certain behaviours etc and how they have arisen due to pressures etc, the difference between the mind in the past, present and future environment
- Psychodynamic perspective
 - Sigmund Freud (fundamental development of psychology)
 - Based on three assumptions:
 - Actions are determined by thoughts, feelings and wishes
 - Much of mental activity occurs outside of conscious awareness
 - Mental processes might conflict with another
 - behaviours, health symptoms, etc could be the product of unconscious motives of behaviour etc
 - While it was deemed by many to be too extreme, subsequent research has confirmed that the vast majority of mental activity occurs out of our conscious awareness
- Behaviourism
 - John Watson and B.F. Skinner
 - Pavlov before that
 - Reinforce behaviour, punish behaviour etc
 - Reject the concept of the mind, instead focuses on the physical and external behaviour
 - Argued psychology should focus solely on observable actions and conditions from which actions result

	<ul style="list-style-type: none"> <ul style="list-style-type: none"> ■ Control the conditions and one can control the behaviour <ul style="list-style-type: none"> ● Watson claimed that, given a baby, he could shape its personality to suit any profession ■ Conditioning (stimulus and response) ○ Humanism <ul style="list-style-type: none"> ■ Carl Rogers ■ Emphasis on the actualisation of the self <ul style="list-style-type: none"> ● Reaching one's potential is the goal approached in therapy and other activities ■ This approach assumes the uniqueness of the individual ■ Utilise empathy and attempts to focus on the individual 'personal-centred' ○ Cognitive perspective <ul style="list-style-type: none"> ■ Many theorists, Piaget, Neisser ■ Focused on how people see the world, perceive, process, retrieve and utilise information ■ Gilbert under behaviourism, psychology produced 'a generation of disaffected cognitive revolutionaries and an extraordinary number of well trained pigeons' ■ Experimental methods used to infer unobservable mental processes ● Conclusion <ul style="list-style-type: none"> ○ Ancient and modern historical figures laid the groundwork for the discipline of psychology ○ Scientific thinking and scientific practices are fundamental to psychology ○ Critical evaluation is key ○ Different psychological perspectives developed dominated over time ○ While these different theories of psychology have been more or less dominant today, most psychology work is informed by multiple theories and these theories are compatible, not competitive
--	--

Motivation

What is motivation?	<ul style="list-style-type: none"> ● Driver of directed behaviours; particularly our wants and needs ● Motivation involves both biological and social drivers ● Biological motives (primary) <ul style="list-style-type: none"> ○ physiological requirements for survival and physical well being ○ Examples: <ul style="list-style-type: none"> ■ Thirst ■ Hunger ■ Oxygen ■ Sleep ■ Temperature regulation ■ Waste elimination
---------------------	---

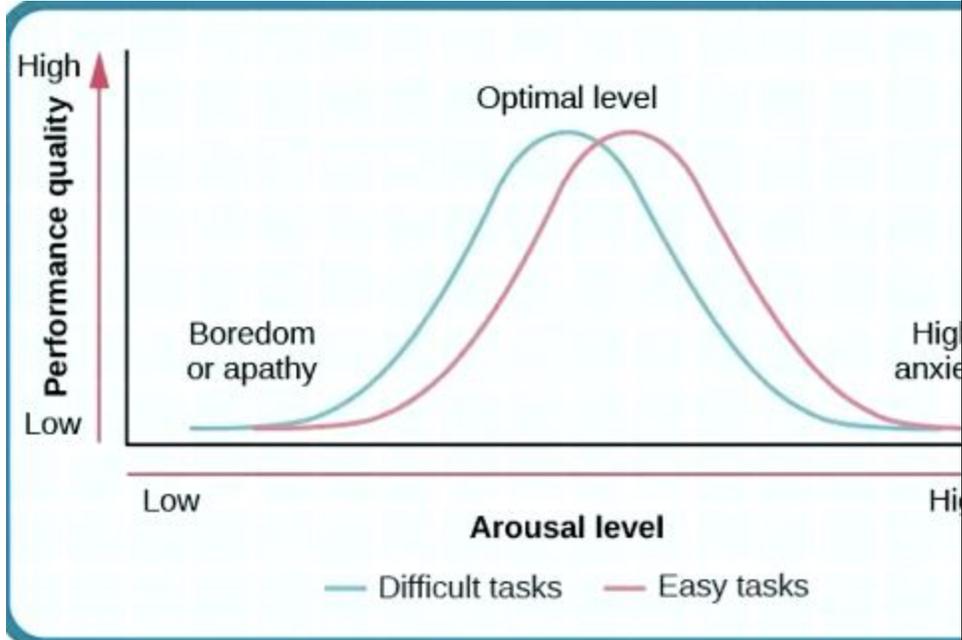
	<ul style="list-style-type: none"> <ul style="list-style-type: none"> ■ sex ● Social motives (secondary) <ul style="list-style-type: none"> ○ Needs that have been required through learning and experiences ○ Examples: <ul style="list-style-type: none"> ■ Achievement ■ Aggression ■ Power ■ Curiosity ■ Play ■ Affiliation ■ Autonomy ● Drives <ul style="list-style-type: none"> ○ propel engagement in some behaviours (find rewarding such as eating and sleeping) ○ Repel engagement in other behaviours (not rewarding such as chores, studying etc) ○ Apparent obsession with boosting motivation (eg personal trainers and motivational speakers etc) <ul style="list-style-type: none"> ■ However while motivation speakers invigorate biological drivers (eg adrenaline), no long term benefits of these talks ● Early perspective <ul style="list-style-type: none"> ○ Psychodynamic perspective (Freud) - theorised behaviours motivated by unconscious and conscious desires, which are not in unison ○ Three theoretical constructs of psyche <ul style="list-style-type: none"> ■ Id : unconscious, instinctual, irrational drives, Eros (sex drive) and Thanatos (aggressive drive) ■ Superego : morally responsible drives, operates at preconscious awareness ■ Ego : conscious, rational mind, ensures Id and superego drives manifest appropriately
<p>Historical approaches to measuring motivation</p>	<ul style="list-style-type: none"> ● How can we measure unconscious desires ? <ul style="list-style-type: none"> ○ Thematic apperception test (TATs) claim to measure ○ Longitudinal study 1950-1962 ○ TAT responses assessed four social motives: achievement, power, affiliation and intimacy motivation ○ Self report survey of motives ○ Psychosocial adjustment: income, job promotion and enjoyment, marriage satisfaction, drug use etc. ○ Results: achievement (assessed by TAT) more predictive or long term entrepreneurial success than self report (better to talk and ask then do a survey)
<p>Drive reduction</p>	<ul style="list-style-type: none"> ● Formulated in 1940s

theory of motivation

- Thirst, hunger and sexual frustration drive us to reduce the averseness of these states (unpleasant but when resolved it's pleasurable)
- Some drives are hierarchical - thirst satisfaction > hunger satisfaction
- Motivated to maintain a psychological homeostasis (looking to reduce)
- Drive
 - Drive is an internal state of intention that motivates to engage in activities or behaviors that reduce this tension.
 - Homeostasis → biological need → drive → goal-directed behaviour → need satisfied

Yerks-dodson law

- Arousal
 - affects strength of drives 1908
 - Inverted U-shaped curve represents relationship between arousal level and performance quality



- The optimal level of arousal may change on the complexity of the task
- Demonstrating that easier tasks require more arousal and difficult tasks need a higher level of arousal
- Under arousal
 - causes 'stimulus hunger' - a drive for stimulation
 - 'Stimulus hunger' may be satisfied in numerous ways (chatting with friends, watching tv etc)
 - Under arousal can increase curiosity 1960, motivate in more challenging tasks
 - Sensory deprivation experiments - induced under arousal, isolated and sensory experiences were removed. Resulted in increased heart rate and almost half experienced a visual

	<p>hallucinations in the study</p> <ul style="list-style-type: none"> ● Clashing drives <ul style="list-style-type: none"> ○ Approach -approach conflict <ul style="list-style-type: none"> ■ Example: dinner with close friends versus concert with fav artist ○ Avoidance -avoidance conflict <ul style="list-style-type: none"> ■ Example: failing exam versus studying for exam ○ Approach-avoidance conflict <ul style="list-style-type: none"> ■ Example: approaching attractive person versus fear of rejection ■ Negative aspects are only noticeable once being closer to the goal ■ Maximum conflict - strength of the approach and avoidance are equal, not being able to decide ○ Don't account for all drive behaviours ● Incentive theories <ul style="list-style-type: none"> ○ Drive reduction theories inadequate; we repeatedly engage in behaviours despite satisfaction of drives ○ Incentive theories build DRT - driven by positive goals incentive theories further differentiate between intrinsic and extrinsic motivations
<p>Maslow's hierarchy of needs</p>	<ul style="list-style-type: none"> ● Relative importance of needs <ul style="list-style-type: none"> ○ Some physical and psychological needs more important than others ○ Psychological primary needs, more important than psychological secondary needs ○ Need for achievement predicts academic performance ● Maslow 1954;1971 formalized thinking in hierarchy of needs theory ● Most important → least important <ul style="list-style-type: none"> ○ Physiological needs → safety and security → love and belonging → self-esteem → self actualization
<p>Sexual motivation</p>	<ul style="list-style-type: none"> ● Libido - human sexual desire, drive for sexual activity and pleasure ● Physiological drivers of libido include testosterone... ● ...a Protein related to neurotransmitter dopamine (reward value of behaviours engaged in) <ul style="list-style-type: none"> ○ Link between genes and self reported sexual desire: 19% had DRD4 variation linked with increased sexual desire (2006) ● Evidence suggest men have stronger libido than women because men: <ul style="list-style-type: none"> ○ Desire sex more frequency and experience more arousal ○ Have more variety and number of sexual fantasies ○ Masturbate more frequently ○ Want more sexual partners ○ Want to have sex earlier than women when in relationships ○ <i>But</i> variability exists within and between sexes, Women are less

assertive

- Response cycle
 - Pioneering research by master and johnson (mid 1950s) into human sexual response
 - Human sexual response has four phases:
 - Desire phase
 - Excitement/plateau phase
 - Orgasm phase
 - Resolution phase
 - Missed crucial point of feelings of love for ones partner and connection
- Sex and ageing
 - Sex more frequent early in relationships, 2x per week
 - While sex frequency decreases with age however satisfaction does not
 - Healthy people in 70s and 80s stay sexual active
 - 75% of married men and 56% of married women over 60 years are sexually active
 - 63% of married men and 30% of married women over 80 years are sexually active

Goal-setting - what really works?

- Research findings indicate setting goals to motivate are SMART goals
- SMART
 - Specific (not general)
 - Measurable
 - Action-oriented (not outcome) (behavioural) (what you need to do to achieve goal)
 - Realistic
 - Time-based
 - Self-efficacy
 - The belief that you are capable of carrying out the behaviours needed to achieve your goals
 - Feedback
 - Bandura and Cervone's study on goals and effect of feedback
 - Participants engaged in strenuous exercise cross trainer task for 5 minutes, three different times during study:
 - **Baseline:** no instruction given
 - **Second round:** received one of 4 types of instruction
 - **Third round:** no instruction
 - Results: (third round compared to first round)
 - Control group increased performance just over 23%
 - Feedback only group increased performance by 26%