



Working with Older People

Cognitive Impairment and Compulsory Treatment

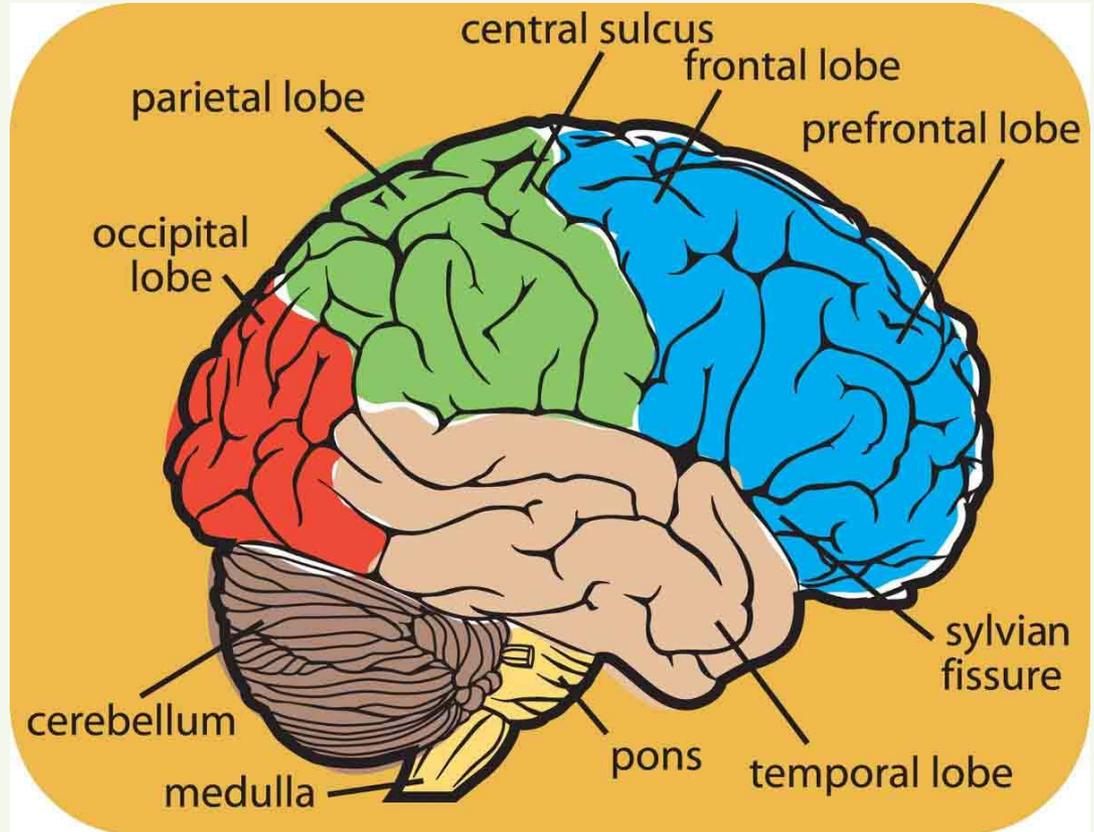
With acknowledgement
for the work of Dr David
Manchester

Frontal Lobe

- Behaviour
- Intelligence
- Memory
- Movement
- Planning/reasoning
- Recognising and regulating emotions
- Social skills

Problems after injury

- Emotions
- Impulse control
- Language
- Memory
- Social and sexual behaviour
- Lack of insight
- Reduced ability to plan and problem solve

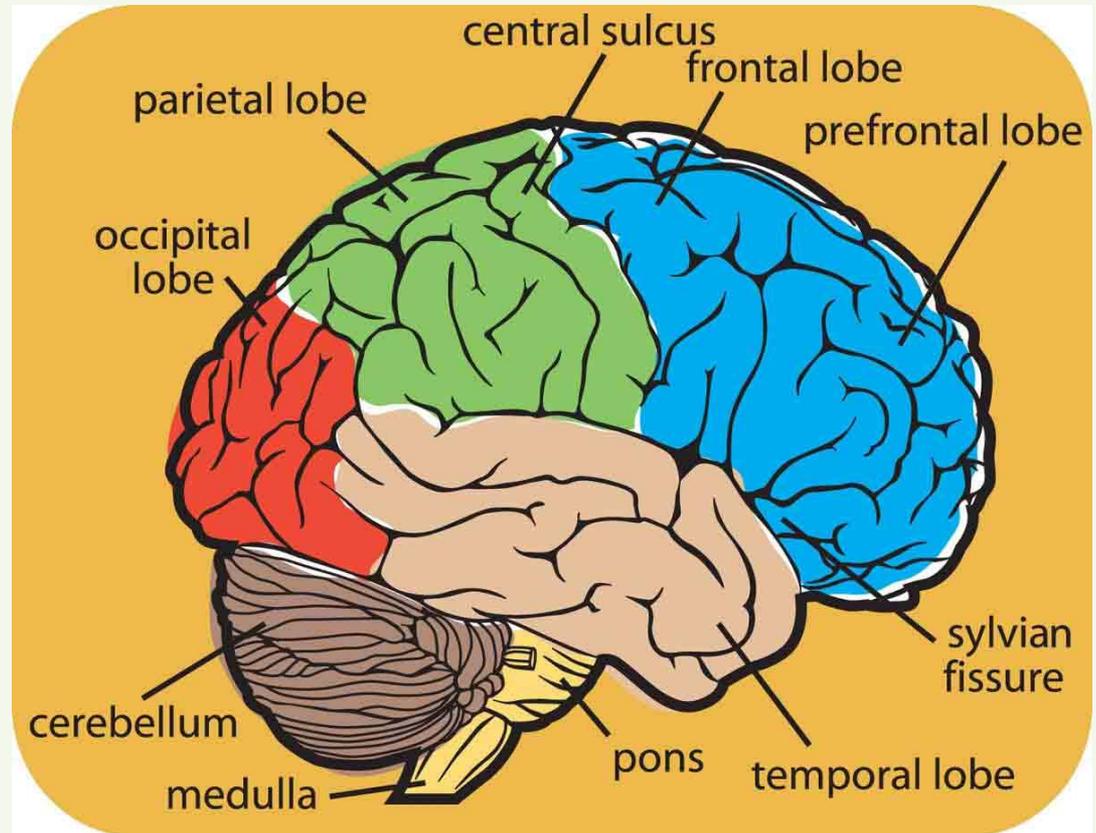


Temporal Lobe

- Behaviour
- Speech
- Understanding language
- Processing auditory information
- Organising information
- Memory
- Learning

Problems after injury

- Hearing loss
- Language problems
- Sensory problems, eg being unable to recognise a person's face

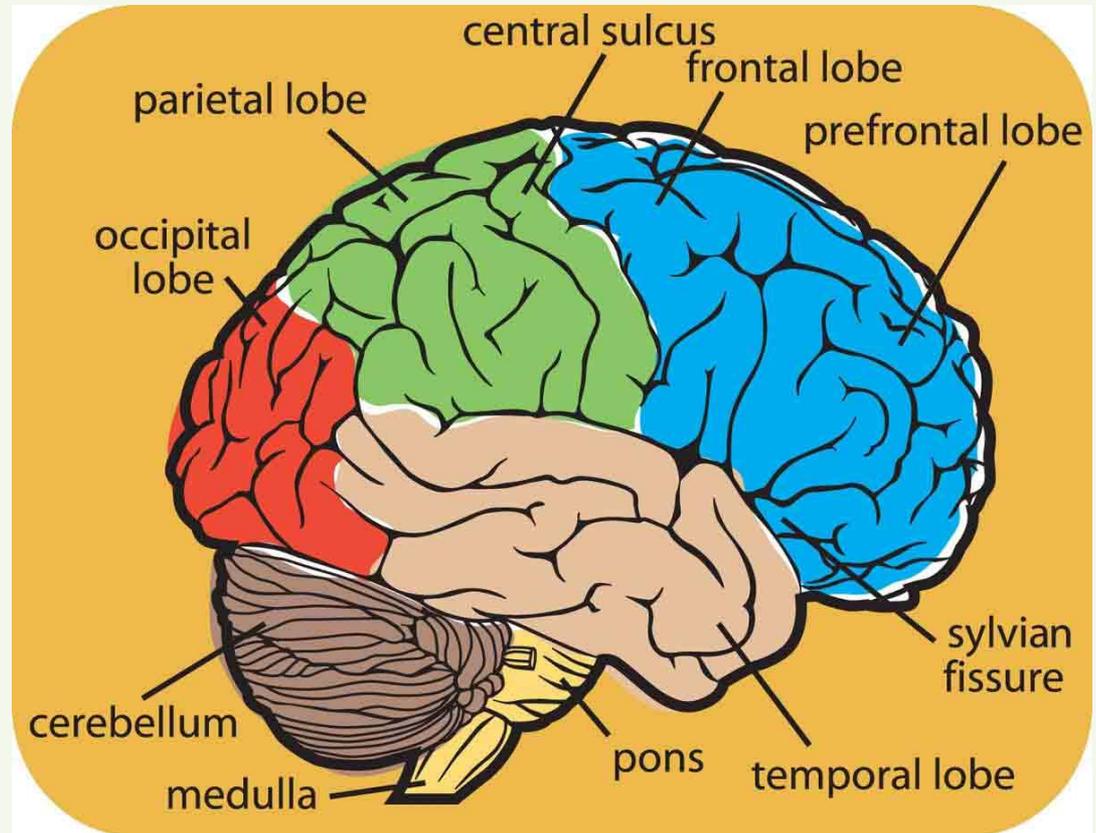


Brain Stem

- Blood pressure
- Breathing
- Consciousness
- Heart beat
- Swallowing

Problems after injury

- Heart rate
- Breathing
- Swallowing

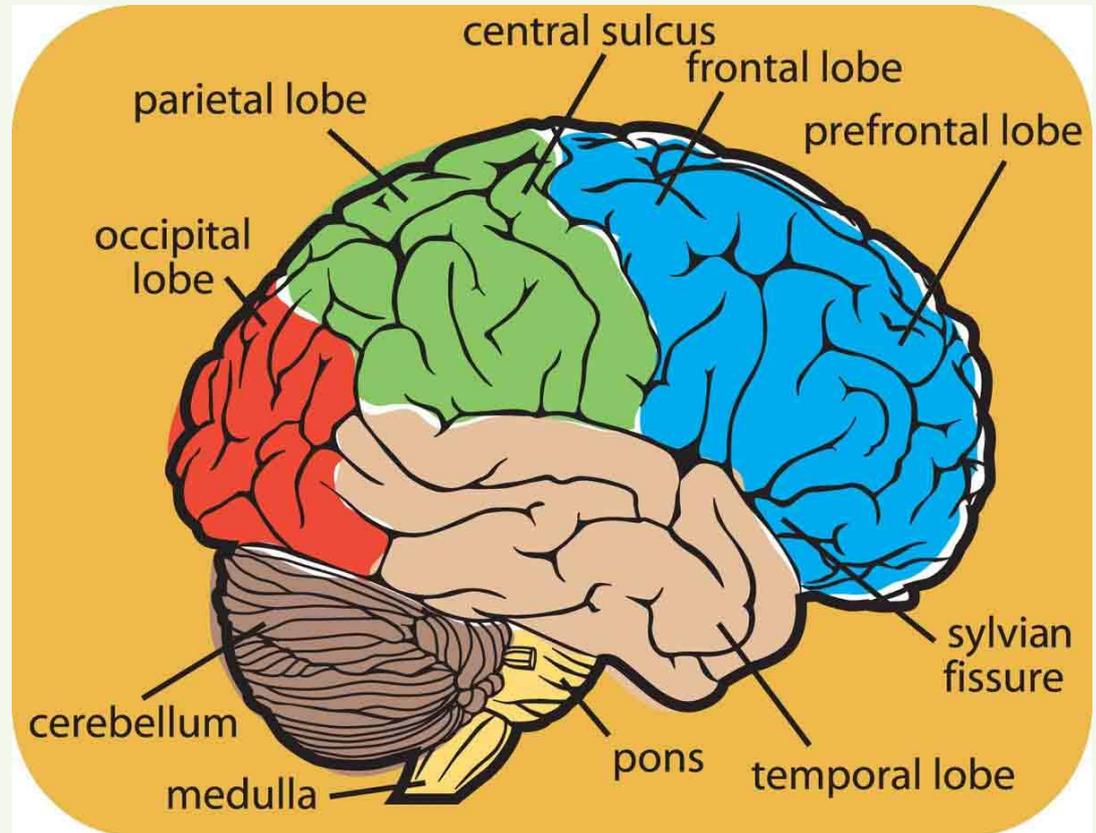


Cerebellum

- Balance
- Muscle coordination
- Movement

Problems after injury

- Uncoordinated movement
- Loss of muscle tone
- Unsteady gait



Occipital Lobe

Integrating and processing visual information

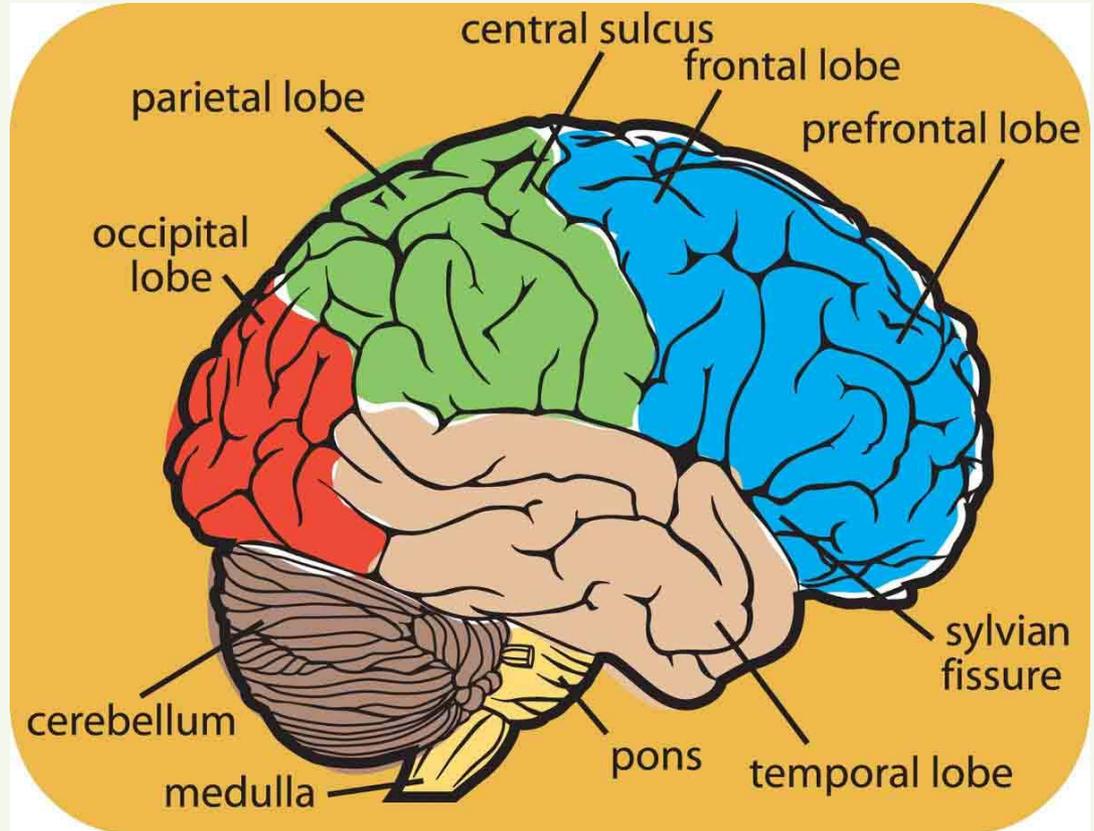
- Colour
- Shape
- Distance

Problems after injury

Visual field defects

Distorted perception of:

- Size
- Colour
- Shape

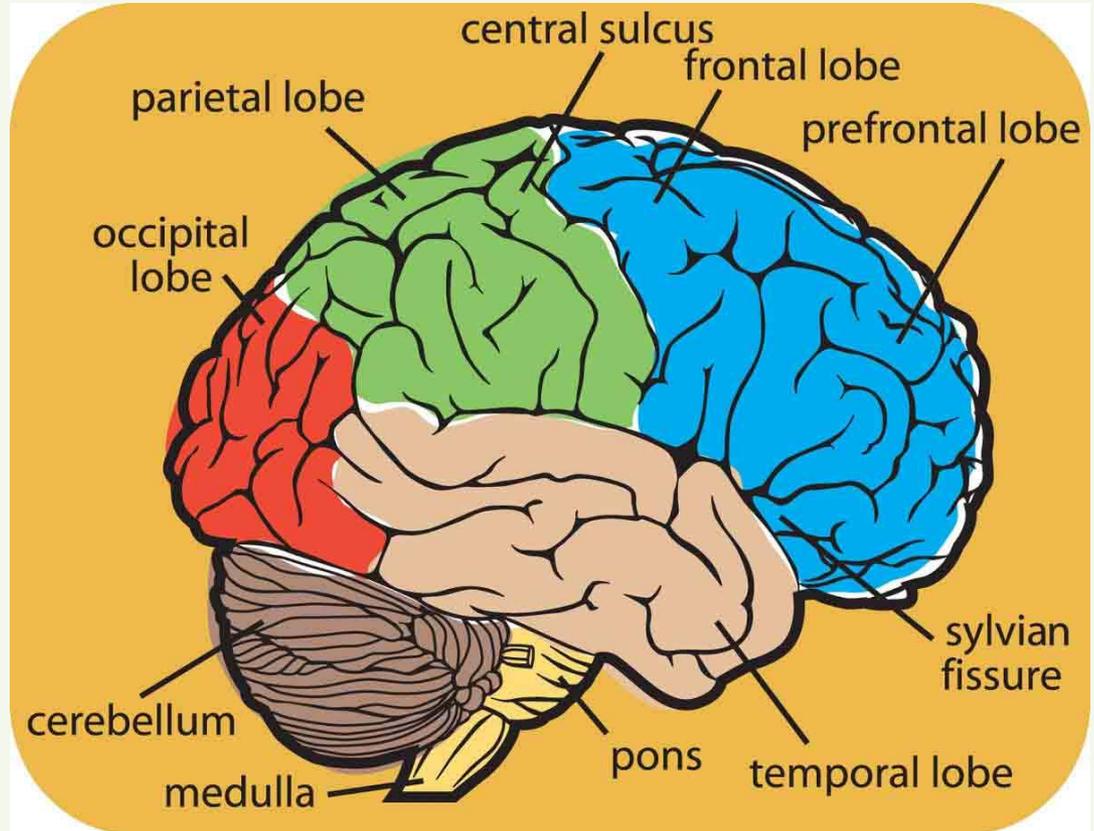


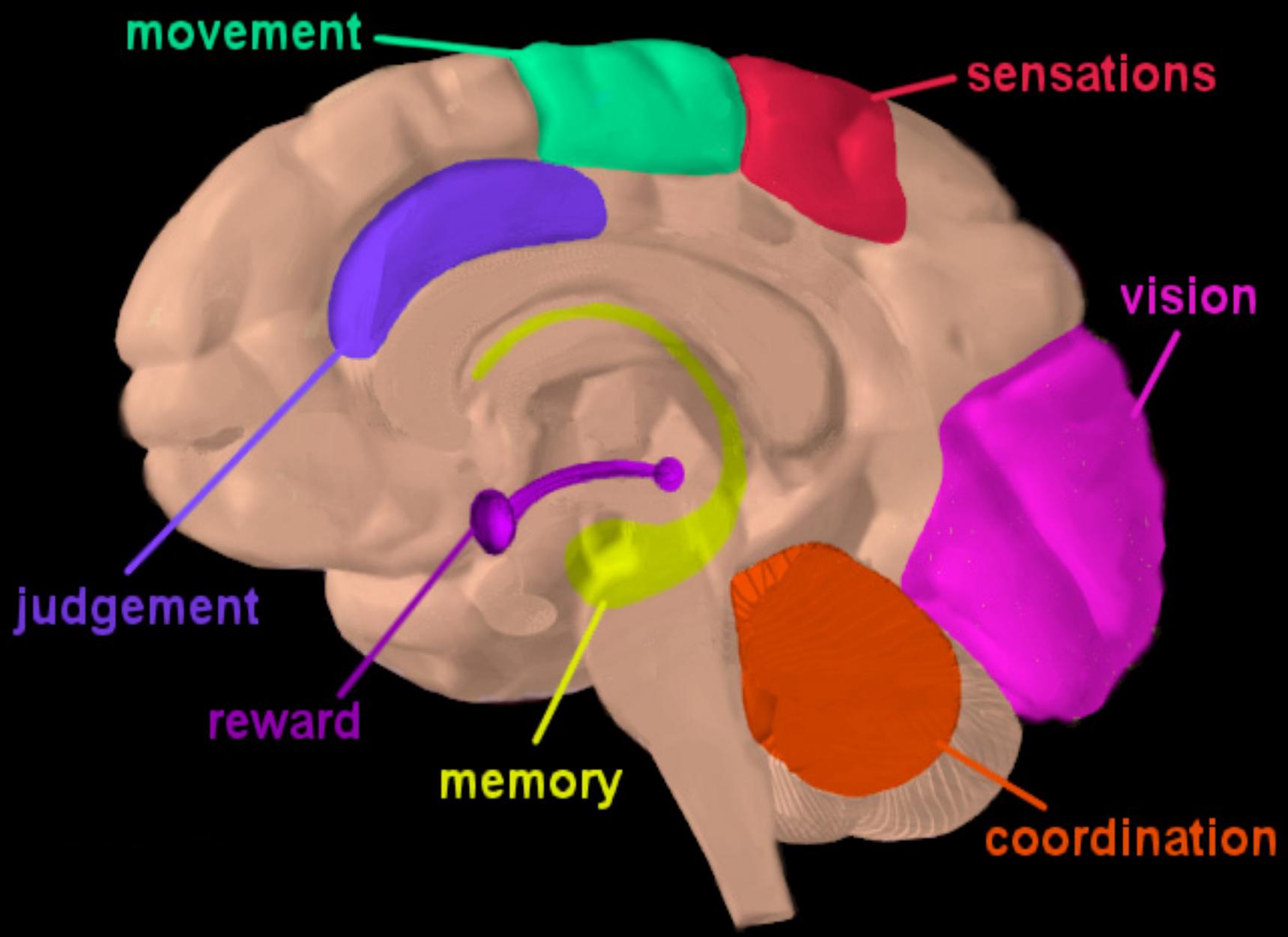
Parietal Lobe

- Intelligence
- Language
- Reading
- Recognising sensations and body positions
- Recognising objects
- Spatial judgements
- Understanding time

Problems after injury

- An inability to locate parts of your body
- An inability to recognise parts of your body





The Impact of Alcohol Use on Brain Function

- The areas of the brain most vulnerable to alcohol use are:
 - Frontal lobes
 - associated with behaviour, intelligence, memory, movement, planning, reasoning, problem solving, recognising and regulating emotion, and social skills
 - Limbic system
 - important in memory, attention, affect and drive
 - components of the limbic system are located throughout the brain including the temporal lobes, forebrain and midbrain
 - Cerebellum
 - associated with movement



Reasons that alcohol impacts brain function

- It is toxic to the central nervous system
- Causes changes to blood flow and metabolism
- Interferes with thiamine (vitamin B) use in the body = 'brain food'
- Associated with poor diet
- Can cause dehydration
- Leads to falls and impulsive behaviour



Disorders associated with Acquired Brain Injury

- **Cerebellar atrophy**
 - Poor balance and wide, unsteady gait
- **Peripheral neuropathy**
 - Numbness or tingling in hands and feet resulting in poor mobility and dexterity
- **Hepatic encephalopathy**
 - Chronic liver disease toxins leading to progressive memory loss, disorientation, hallucination, tremors and dementia
- **Frontal lobe impairments**
 - Difficulties monitoring and controlling behaviour; planning, organising and thinking in a flexible manner evident in behavioural changes; disinhibition, aggression, irritability or impulsivity



Disorders associated with Acquired Brain Injury cont...

- **Wernicke's encephalopathy**

Acute neurological disorder due to thiamine (vit. B) deficiency characterised by confusion, memory impairment and disturbances in vision (difficulty tracking) and gait (ataxia)

- **Korsakoff's dementia/amnesic syndrome**

Impairment of short term memory that can result in an almost complete inability to acquire new information. This includes the tendency to confabulate or make up missing memories. Executive functioning difficulties can include apathy and lack of volition



Preservation of Functions

- Skills often preserved in the face of cognitive impairment are:
 - Immediate memory and basic concentration
 - Vocabulary and language skills, reading, writing
 - Long term memory
 - Well learned skills eg driving, making tea, brushing teeth, work skills
 - Knowing facts and understanding of the world
 - Well-learned social skills (manners - although often forgotten if intoxicated)
 - Every day procedures for daily living



Cognitive Testing and Compulsory Treatment

- The Alcoholism and Drug Addiction Act 1966 is in the process of being reviewed
- It will be replaced by Compulsory Assessment and Treatment legislation
- It is likely that compulsory treatment for alcohol and drug dependence will only be justified in the following circumstances:



Justification for Compulsory Treatment

- A person's dependence has seriously impaired his or her capacity to make choices about ongoing substance use and personal welfare
- Care and treatment is necessary to protect the person from significant harm
- No other less restrictive means are reasonably available for dealing with the person
- The person is likely to benefit from treatment and,
- The person has refused treatment



The link between compulsory treatment and cognitive damage

- Consultation identified a group of people who will initially come under the regime but have cognitive damage as a result of alcohol or drug use
- They will take longer to respond to treatment and it is proposed the family court have the power to extend the period of compulsion for a further three months
- Where cognitive damage is permanent arrangements for ongoing care and protection may be made under the PPP&R Act



Protection of Personal and Property Rights Act 1988

Presumption of competence

- For the purposes of this part, every person shall be presumed, until the contrary is proved, to have the capacity:
 - (a) to understand the nature, and to foresee the consequences, of decisions in respect of matters relating to his or her personal care and welfare; and
 - (b) to communicate decisions in respect of those matters



Limits of Cognitive Testing

- Only provides a 'snap shot' of functioning at a point in time
- Might need to re-test at intervals
- Tests focus on cognitive skills only and don't give a full picture of functioning
- Deficits are rarely universal - Psychologists are working to develop tests that include relational aspects to functioning



Timing

- Testing may be warranted when:
 - There is a long history of alcohol or other drug use
 - History of serious and/or multiple TBI
 - Short term memory difficulties
 - Consistent challenging behaviour
 - Confusion and disorientation
 - Confabulation (building new memory)
 - Mood changes in a short space of time
 - Communication - repeating stories or difficulty following a conversation
 - Inability to change behaviour even when wanting to



The MoCA

Montreal Cognitive Assessment

- Designed as a rapid screening assessment for mild cognitive dysfunction
- It assesses different cognitive domains:
 - Attention and concentration
 - Executive functions
 - Memory
 - Language
 - Visuoconstructional skills involves the ability to organise and manually manipulate spatial information to make a design.
 - Conceptual thinking
 - Calculations
 - Orientation



Exercise

- With a partner (one the tester and the other acting as subject) work your way through the MoCA
- The aim of the exercise is to give you experience with administering this test
- For the person acting as the subject answer as yourself. You do not need to take on a 'role'
- Swap roles so each of you has the experience of administering the test



General Considerations

- It is important to note and record how a person carries out the MoCA as well as the scoring
- Poor coordination and motor control may be evidence of damage to the cerebellum
- Problems starting and finishing tasks may indicate damage to the frontal lobe
- Not recognising errors may also indicate damage to the frontal lobe
- Education (or lack of) should be taken into account when interpreting responses and overall scoring

