

# Consciousness

Martin Červeň

What is consciousness?

# Mind-body problem

Is consciousness and thoughts separate from body ( is some sense not physical)  
or is it “product” of the brain and body?

# Dualism vs. Monism

Dualism: two separate realms of mind and matter

Monism: only matter exists

Example in religion: Afterlife in Christianity



# Qualia

Indescribable experiences private to us

Denett: “The ways things seem to us”.

For example: What is it like to eat a banana?



# Cartesian dualism

Mind is non-physical, and separate from brain and body.

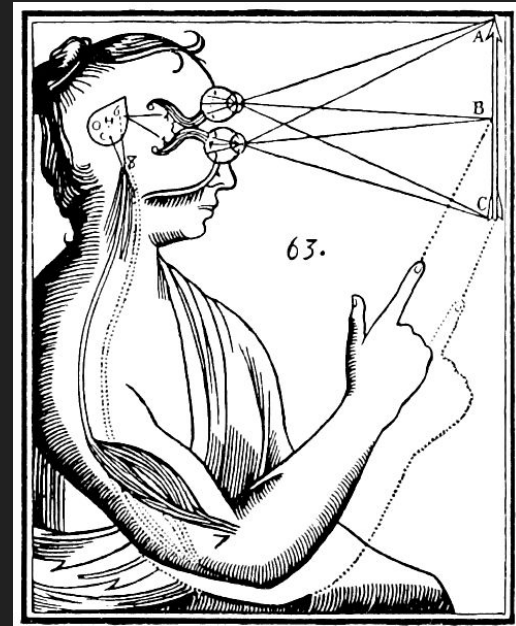
But how these two interact?

# Cartesian dualism

Mind is non-physical, and separate from brain and body.

But how these two interact?

Descartes answers: by pineal gland



# Monism

Materialistic view: there is only matter.

But, how can physical brain give rise to conscious experience and qualia?



# Monism

Materialistic view: there is only matter.

But, how can physical brain give rise to conscious experience and qualia?

This is called 'Hard problem' of consciousness. (David Chalmers)

# Monism

Materialistic view: there is only matter.

But, how can physical brain give rise to conscious experience and qualia?

This is called 'Hard problem' of consciousness. (David Chalmers)

As opposed to 'Easy problems' as perception, learning, memory, attention,...

# Defining consciousness

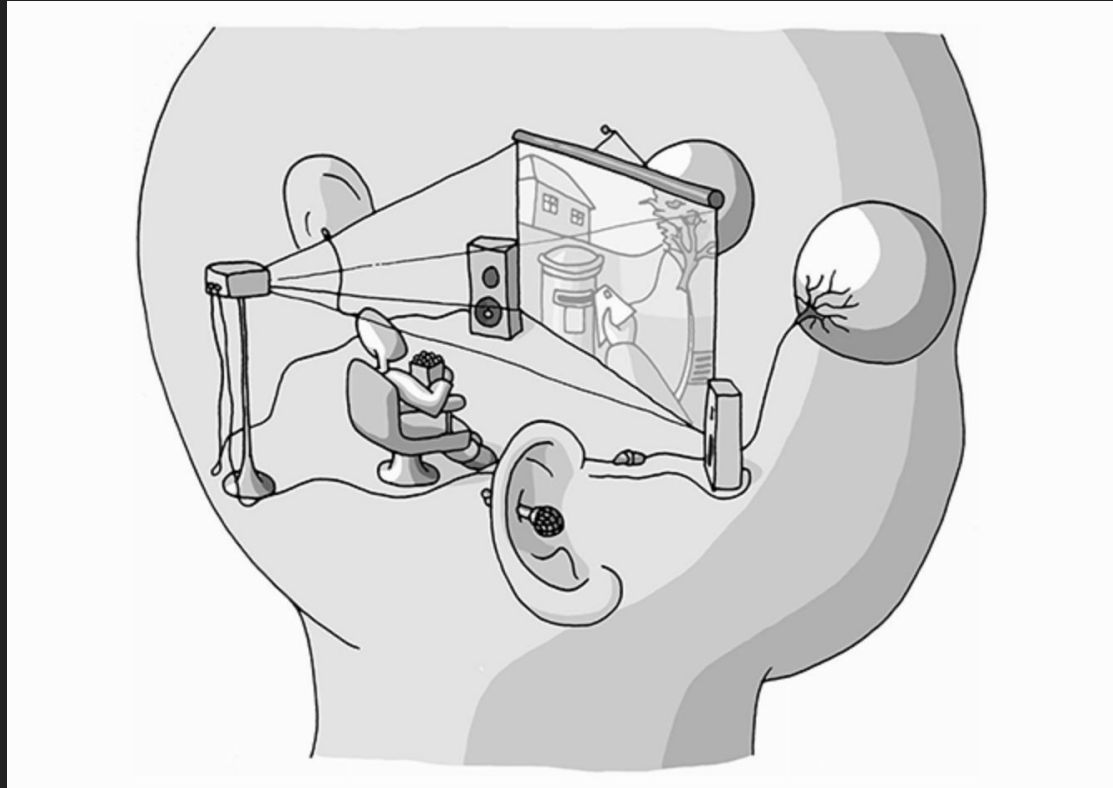
What is it to be like bat? (Thomas Nagel)

Organism is conscious, if there is something it is like to be that organism.

We cannot know how it is to be like bat => subjectivity



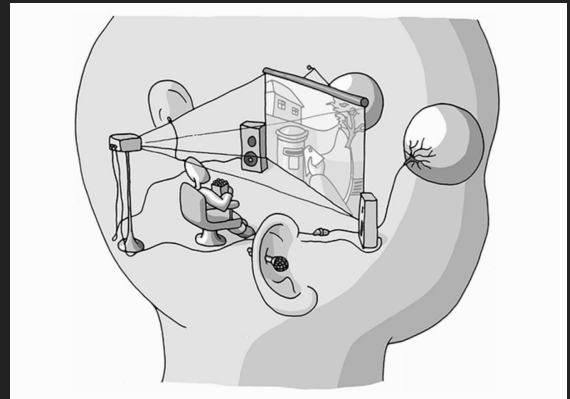
# Cartesian theatre



# Cartesian theatre

We feel like we are watching movie in theatre somewhere in our head.

Way to think about consciousness.



# Brain

86,000,000,000 neurons in brain.

10 times that of glial cells (that support neurons)



# Where does consciousness fit in?

Brain is parallel

Consciousness seems unified ( sense of I )

# Unity of consciousness

There are things I am experiencing now - things on stage in theatre

Continuity of experiences in time

One experiencer - me



# Some things in brain are subconscious

We are not conscious of every thing that goes inside our brain, e.g while reading sentence we are not conscious of every letter, word, only their meaning.

# Blindsight

Patients are cortically blind, due to damage to occipital lobe - visual center

They do not consciously see anything.

But they can “guess” what they see to a very high probability.



# Inattention blindness

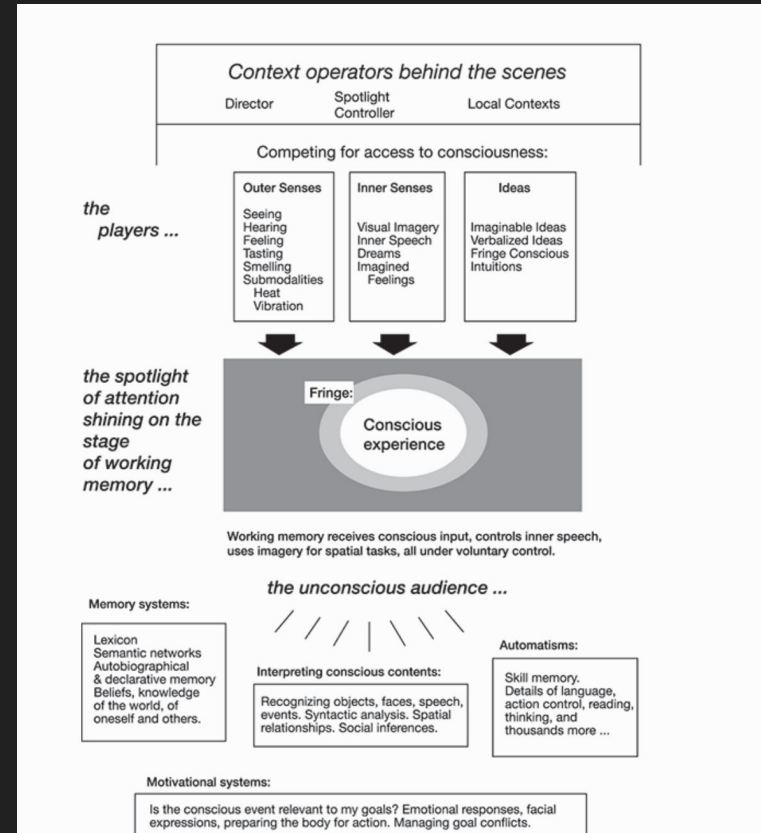
<https://www.youtube.com/watch?v=vJG698U2Mvo>

# Global workspace theory

Akin to theatre model.

Items are conscious while in workspace.

How unconscious items turn into conscious?



# Consciousness as an illusion

Illusion - something is not what it seems to be

Illusion of visual perception

# The self

Who am I, self me?

# The self

Who am I, self me?

Ego - one self

# The self

Who am I, self me?

Ego - one self who is experiencing everything

Bundle - Self is not one, but bundle of experiences that only SEEM as one.



Corpus callosum cut.

<https://youtu.be/ZMLzP1VCANo?t=80>

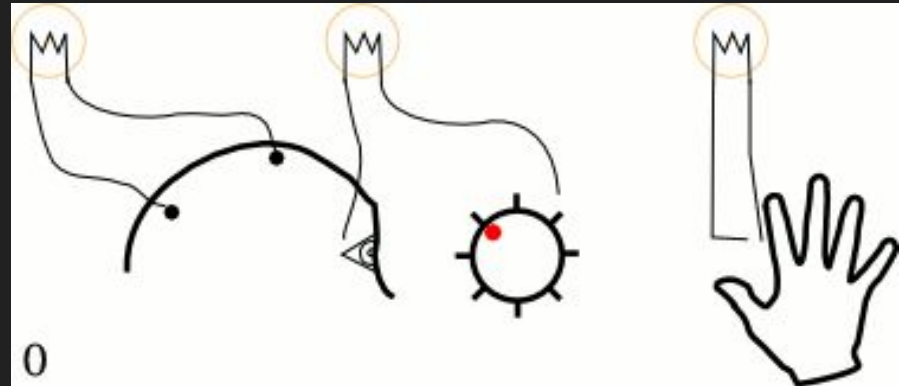
Timing of experience - free will

## Libet's experiments

Patient would press button or touch finger

EEG to measure activity

Patient has to note when he did decision by watching red dot



## Libet's experiments

500ms before action there was buildup in potential.

At 200ms before action patient reported time of decision.

# Other theories

# Bicameral mind - Julian Jaynes

Brain is split into two parts, one speaking and one listening and acting.

Argues that it is relatively recent trait.

Iliad is written without concept of self - gods are speaking and humans are acting their will.



# Resources

[Consciousness Explained](#)

[Consciousness: A Very Short Introduction](#)