

How Trauma Impacts Four Different Types of Memory

EXPLICIT MEMORY

SEMANTIC MEMORY

What It Is

The memory of general knowledge and facts.

Example

You remember what a bicycle is.

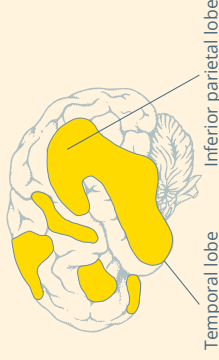


How Trauma Can Affect It

Trauma can prevent information (like words, images, sounds, etc.) from different parts of the brain from combining to make a semantic memory.

Related Brain Area

The temporal lobe and inferior parietal cortex collect information from different brain areas to create semantic memory.



Temporal lobe

Inferior parietal lobe

EPISODIC MEMORY

What It Is

The autobiographical memory of an event or experience – including the who, what, and where.

Example

You remember who was there and what street you were on when you fell off your bicycle in front of a crowd.



How Trauma Can Affect It

Trauma can shut down episodic memory and fragment the sequence of events.

Related Brain Area

The hippocampus is responsible for creating and recalling episodic memory.



Hippocampus

IMPLICIT MEMORY

EMOTIONAL MEMORY

What It Is

The memory of the emotions you felt during an experience.

Example

When a wave of shame or anxiety grabs you the next time you see your bicycle after the big fall.

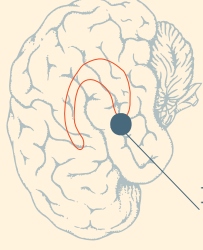


How Trauma Can Affect It

After trauma, a person may get triggered and experience painful emotions, often without context.

Related Brain Area

The amygdala plays a key role in supporting memory for emotionally charged experiences.



Amygdala

PROCEDURAL MEMORY

What It Is

The memory of how to perform a common task without actively thinking done.

Example

You can ride a bicycle automatically, without having to stop and recall how it's done.

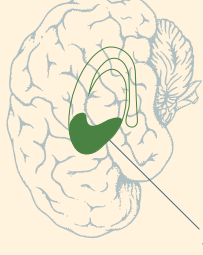


How Trauma Can Affect It

Trauma can change patterns of procedural memory. For example, a person might tense up and unconsciously alter their posture, which could lead to pain or even numbness.

Related Brain Area

The striatum is associated with producing procedural memory and creating new habits.



Striatum