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Introduction

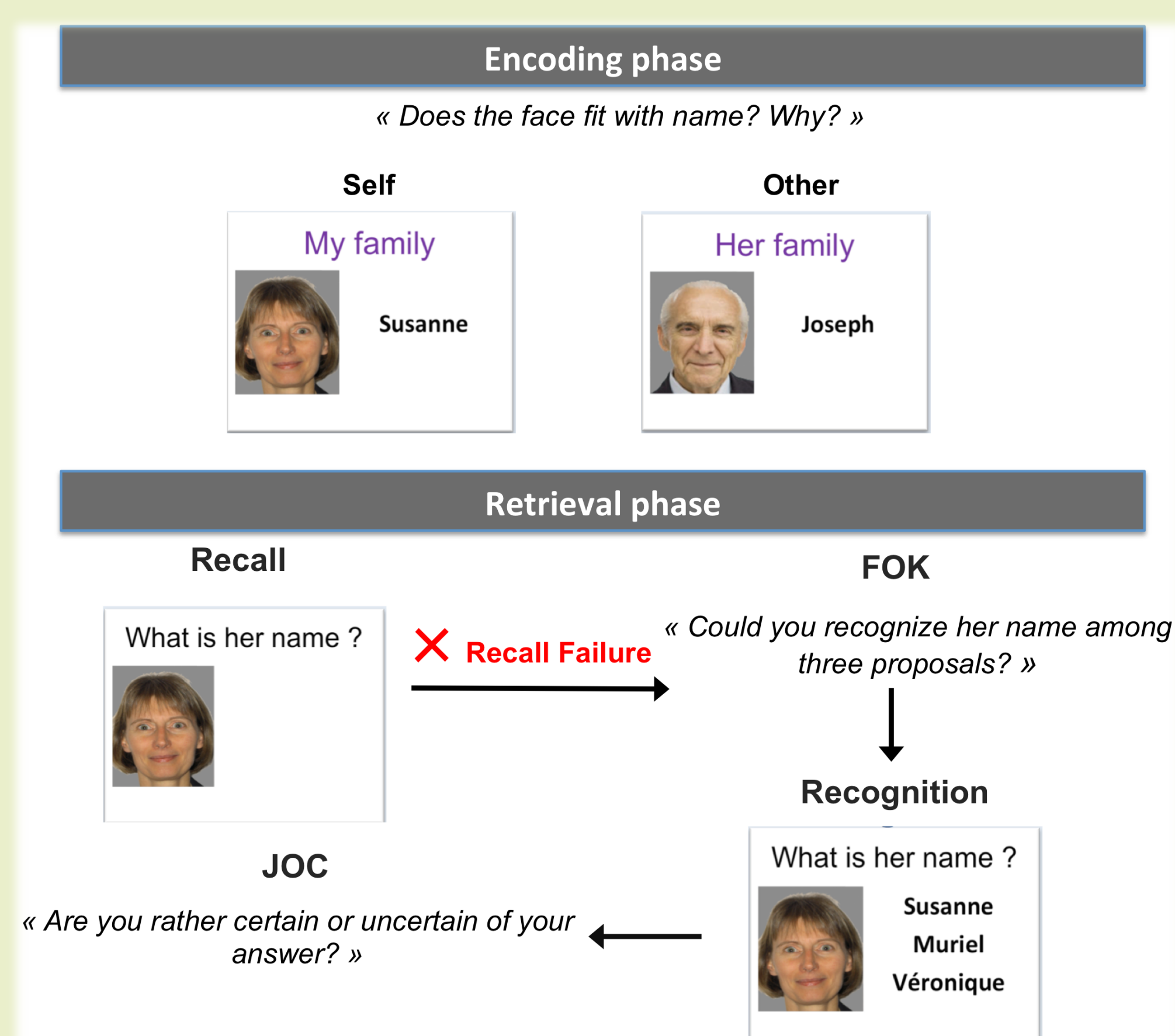
- Patients with Alzheimer's disease (AD) show impaired self-awareness (i.e. anosognosia) and altered metamemory processes.
- Anosognosia could be considered as a metacognitive disorder according to cognitive theories.
- Interaction between self and memory (i.e. self reference effect, SRE) is disrupted in AD.
- ➔ Relationship between anosognosia and metamemory processes for self-related memories in AD ?

Methods

Participants

	Healthy controls (HC)	Alzheimer patients (AD)
n (M/F)	20 (10/10)	20 (10/10)
Age (years)	75.6 (7.1)	78.1 (6.1)
Education	11.3 (3.3)	11.2 (3.8)
Mattis scores	137.8 (4.2)	126.8 (4.9)**
MMSE scores	/	25.2 (2.0)

Cognitive paradigm



Measures of online metacognitive monitoring:

FOK:
Feeling-of-knowing

JOC:
Judgment-of-confidence

(Nelson & Narens, Metamory theoretical framework, 1990)

Anosognosia assessment:

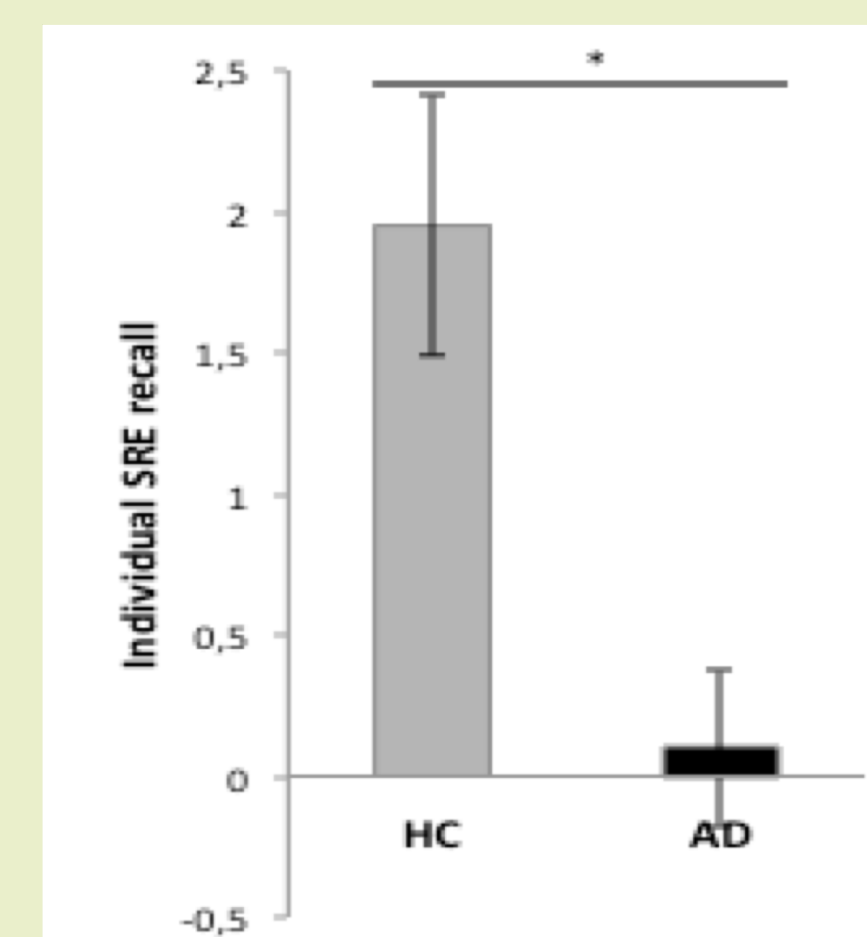
- Anosognosia Questionnaire-Dementia (AQ-D)
- Memory Functioning Scale (MFS-MARS)
- ➔ **Participant-informant discrepancy scores**

Results

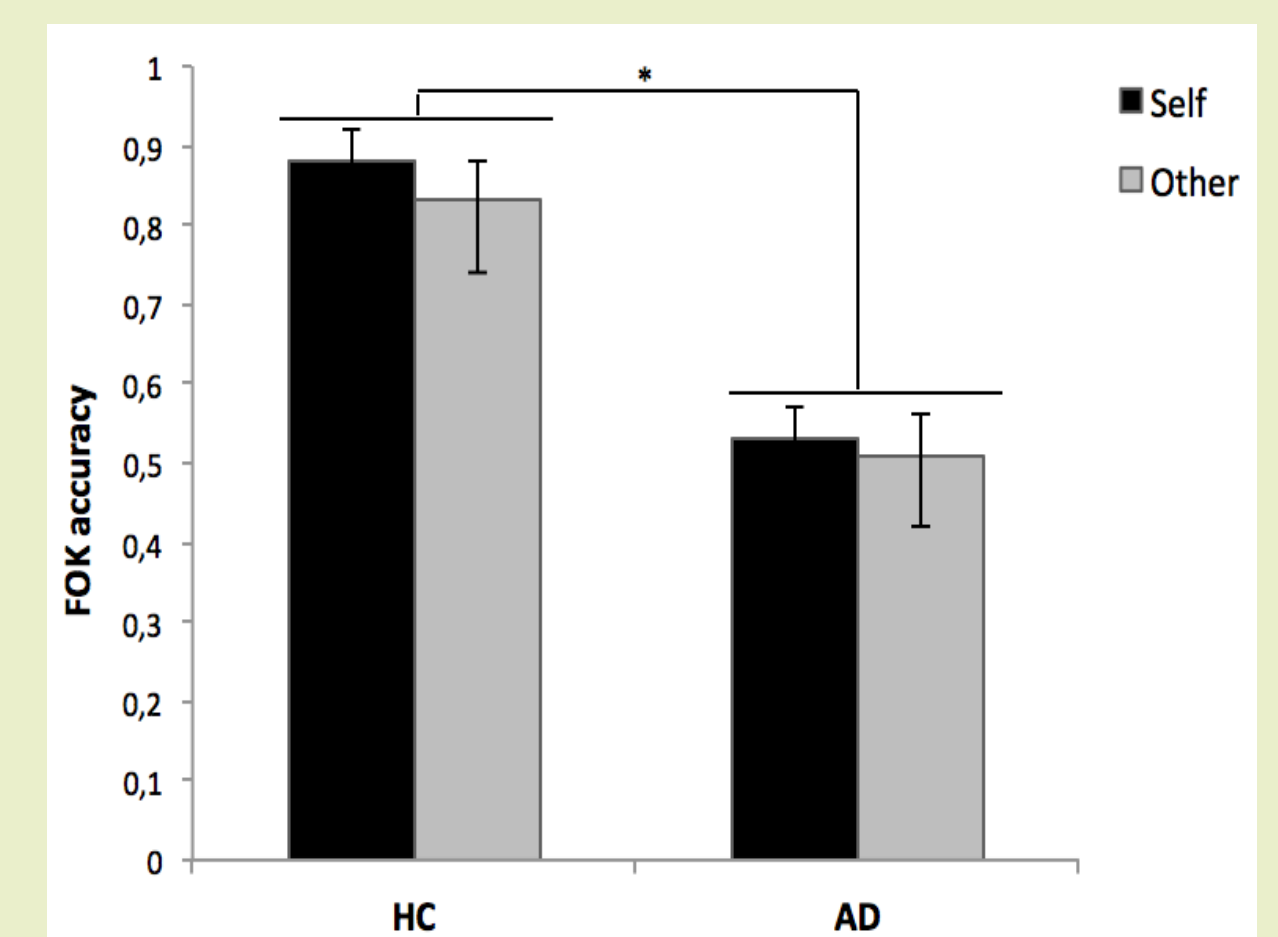
Anosognosia

	Healthy controls (HC)	Alzheimer patients (AD)
MFS-MARS Corrected	-.07 (.17)	.32 (.37)*
AQ-D Total	-3.20 (10.96)	11.10 (13.41)*
AQ-D Intellectual	-3.35 (9.89)	8.10 (10.84)*
AQ-D Behavior	.15 (2.50)	3.00 (3.77)*

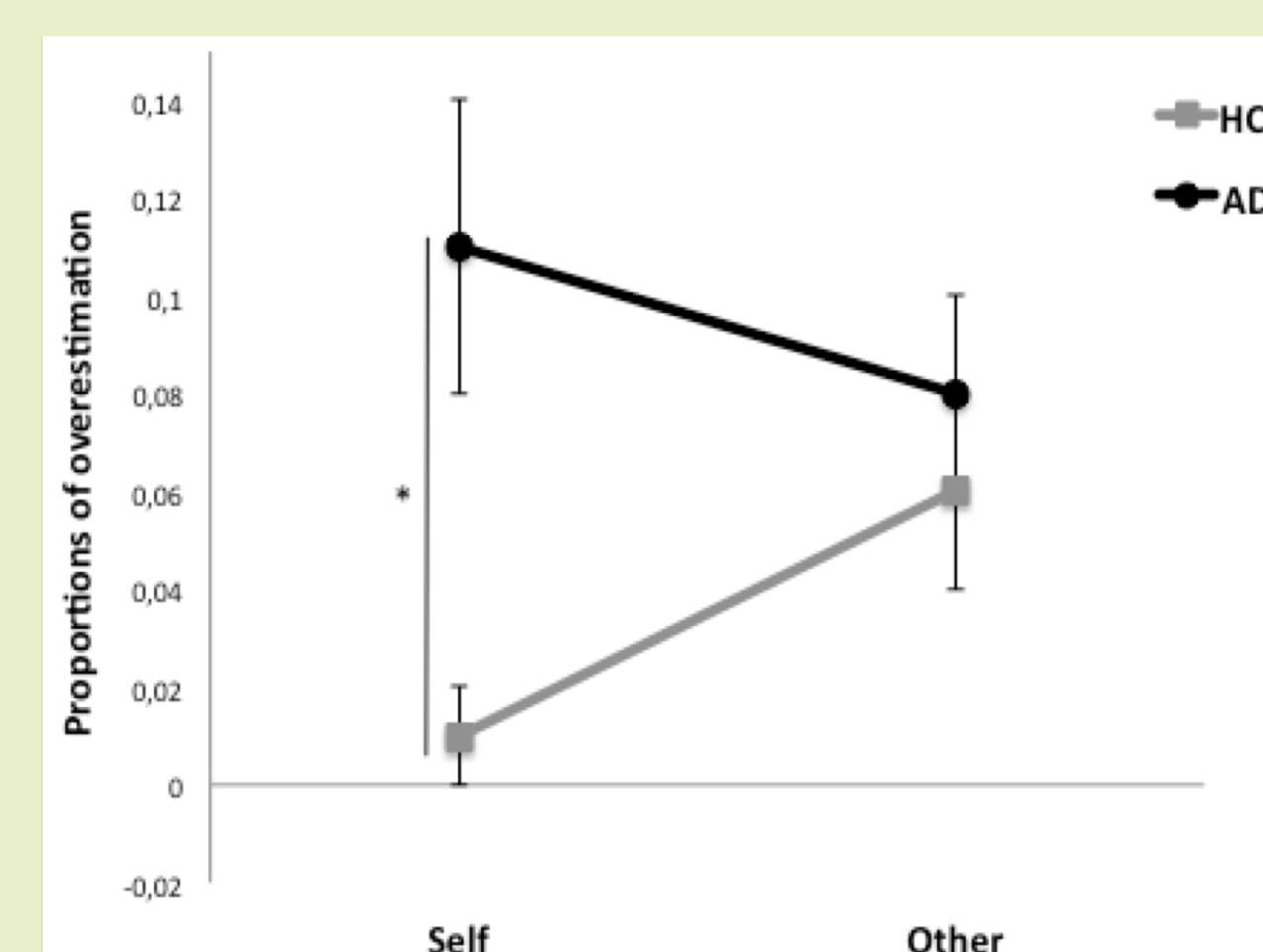
SRE on retrieval performance



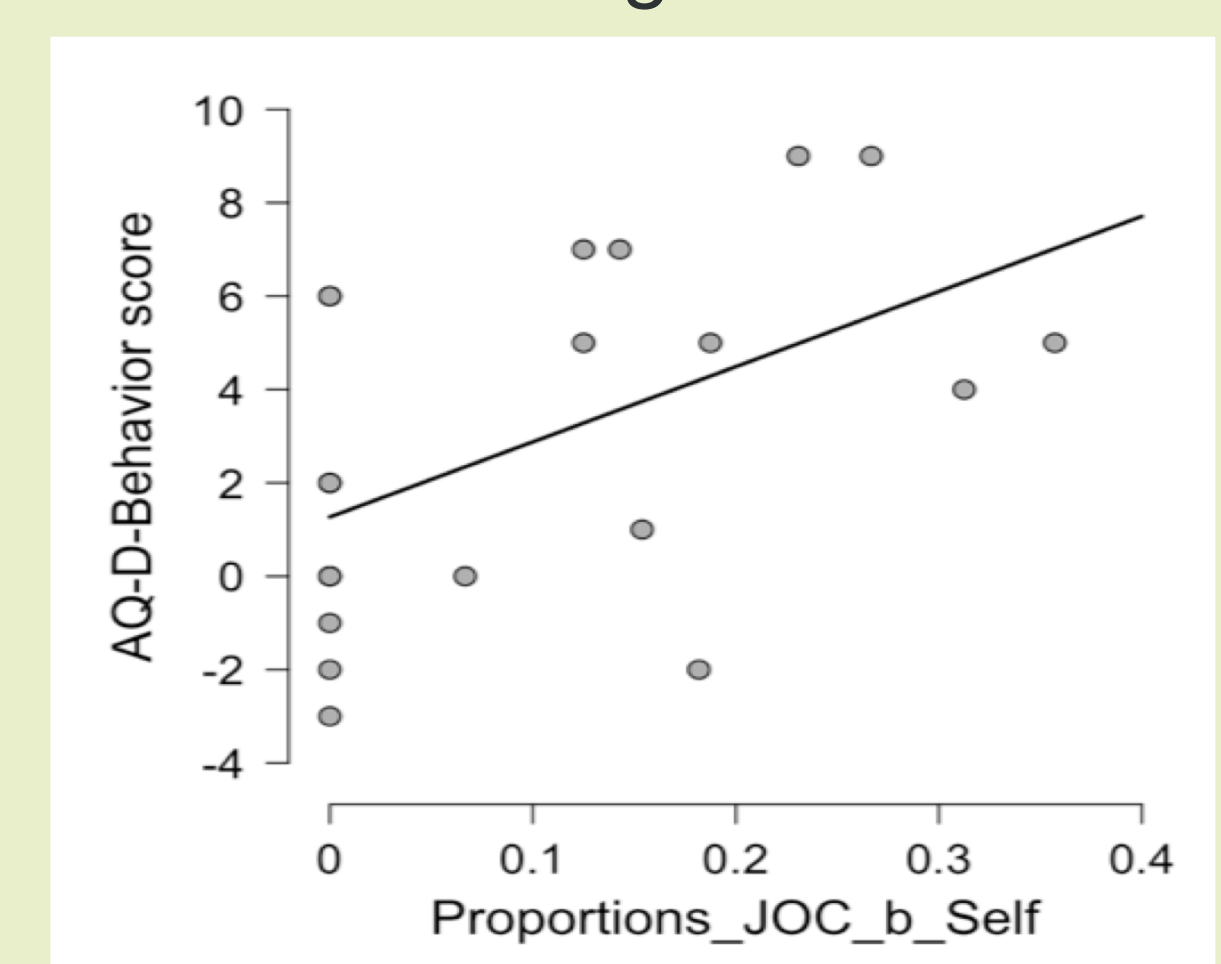
FOK for self and other items



Overconfidence (JOC-b) for self and other items



Overconfidence for self-related items and anosognosia in AD



Conclusion

- AD patients showed decreased SRE on retrieval of episodic memories.
- However, in metacognitive measures, a (mild) influence of SRE can only be observed on overconfidence judgments.
- ➔ No global alteration of self-related metacognition processes in AD patients
- Anosognosia for behavioral dysfunctions was only associated with overconfidence for false self-related memories in AD patients
- ➔ Anosognosia in AD is not related to a global alteration of metamemory processes for self-related memories

Perspectives

The relationship between anosognosia, self, memory and monitoring processes in Alzheimer's disease should be considered beyond cognitive theoretical frameworks.

