

Supplementary Information

for

Effects of schema on the relationship between post-encoding brain connectivity and subsequent durable memory

Dingrong Guo¹, Gang Chen² and Jiongjiong Yang^{1*}

¹ School of Psychological and Cognitive Sciences and Beijing Key Laboratory of Behaviour and Mental Health, Peking University, Beijing, PR China

² Scientific and Statistical Computing Core, National Institute of Mental Health, USA, Bethesda, MD, USA

***Corresponding author:** Jiongjiong Yang, Ph.D., School of psychological and cognitive sciences, Peking University, Beijing 100871, P.R. China.

E-mail: yangjj@pku.edu.cn.

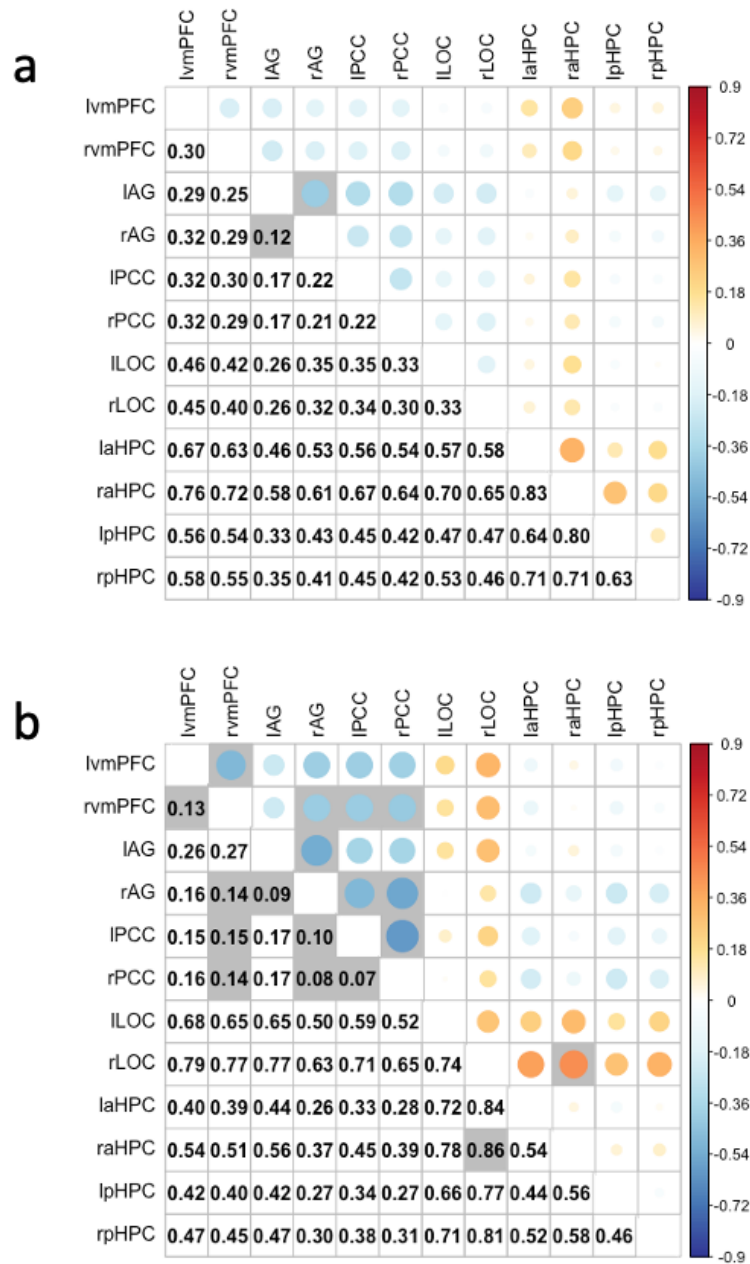


Figure S1. Association between brain connectivity and delayed memory performance in the schema-C condition (a) and schema-IC condition (b) for the 23 participants. On each of the two panels, the matrix shows region pair effects: the upper triangle illustrates the magnitude of the Fisher-transformed z-value, indicated by circle size and colour, and the lower triangle contains the P+ value, $P+ \geq 0.85$ or ≤ 0.15 are marked with grey colour.

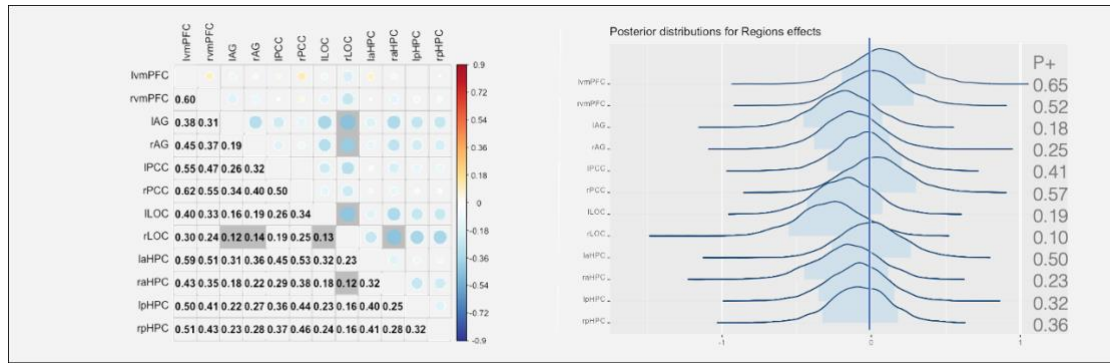


Figure S3. Association between brain connectivity and delayed memory performance for the 17 participants who demonstrated a schema effect. On the left panel, the matrix shows region pair effects: the upper triangle illustrates the magnitude of the Fisher-transformed z-value, indicated by circle size and colour, and the lower triangle contains the P+ value, $P+ \geq 0.85$ or ≤ 0.15 are marked with grey colour. On the right panel are the posterior distributions for the region effects.

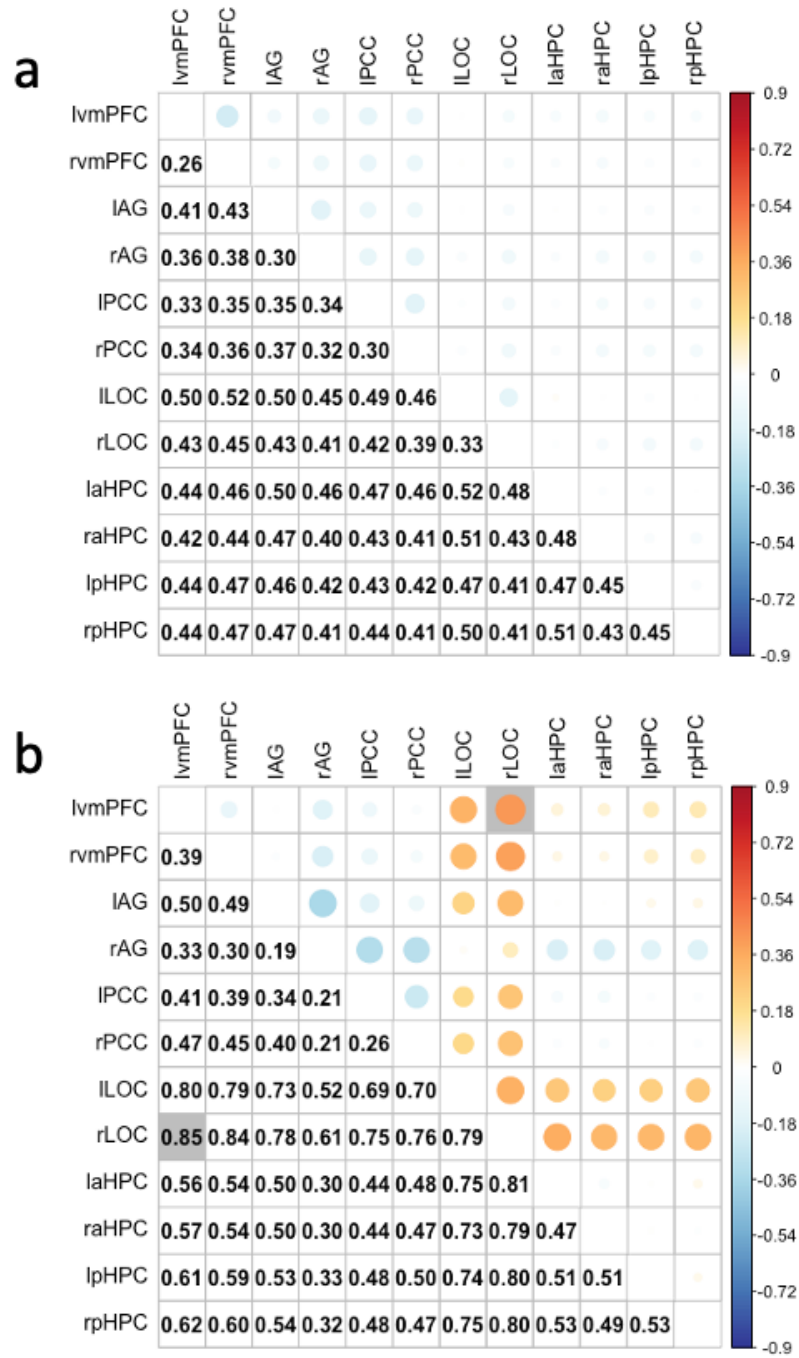


Figure S3. Association between post-encoding brain connectivity and immediate memory performance in all 23 participants. (a) Schema-C condition and (b) schema-IC condition. On each of the two panels, the matrix shows region pair effects: the upper triangle illustrates the magnitude of the Fisher-transformed z-value, indicated by circle size and colour, and the lower triangle contains the P+ value, $P+ \geq 0.85$ or ≤ 0.15 are marked with grey colour.

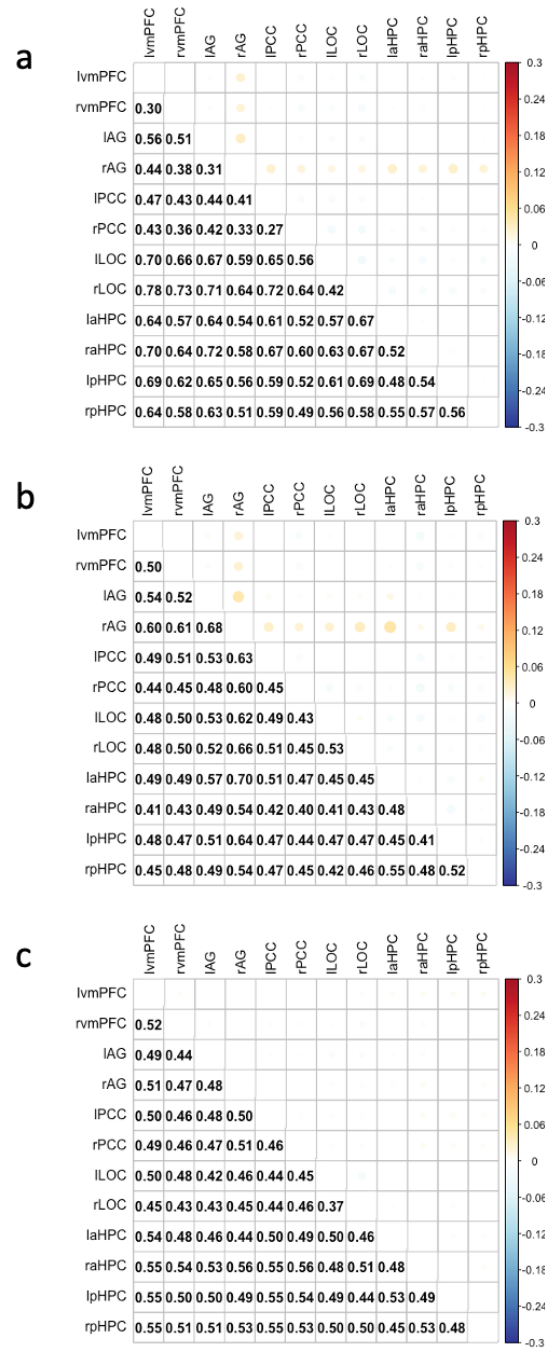


Figure S4. Effects of schema condition on post-encoding brain connectivity in all 23 participants. (A)

Schema-C vs. Baseline, (B) Schema-IC vs. Baseline and (B) Schema-C vs. Schema-IC. The matrix

shows region pair effects: the upper triangle illustrates the magnitude of the Fisher-transformed z -value,

indicated by circle size and colour, and the lower triangle contains the P + value.

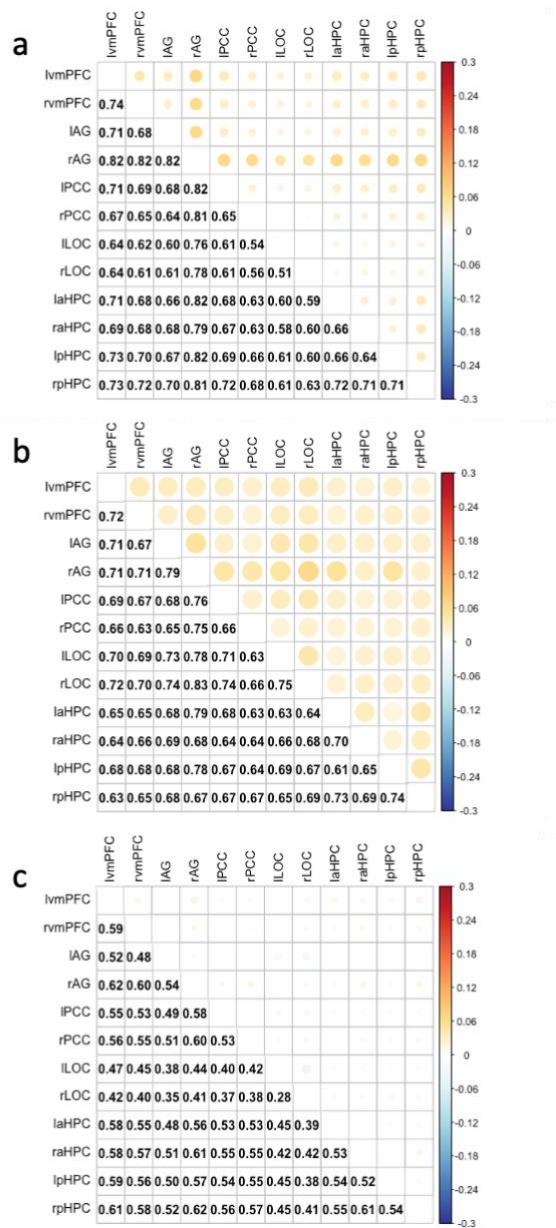


Figure S5. Effects of schema condition on post-encoding brain connectivity in 17 participants who demonstrated a schema effect. (A) Schema-C vs. Baseline, (B) Schema-IC vs. Baseline and (B) Schema-C vs. Schema-IC. The matrix shows region pair effects: the upper triangle illustrates the magnitude of the Fisher-transformed z -value, indicated by circle size and colour, and the lower triangle contains the P + value.