

Table S1: Brain activity associated with recognition memory and emotional memory

A) Main effect of recognition memory (all SH > all CR) across Sleep and Wake groups

# voxels	T	Z	p(unc)	x,y,z {mm}	region
1349	10.0	5.9	0.00	10 -76 -38	cerebellum
4668	9.3	5.7	0.00	-42 22 2	inferior and middle frontal gyrus
237	7.7	5.2	0.00	8 4 -4	caudate, putamen, and globus pallidus
1740	7.7	5.2	0.00	-32 -58 44	Inferior and superior parietal and precuneus
88	5.5	4.2	0.02	20 -58 22	posterior cingulate
358	5.4	4.2	0.00	-8 24 42	cingulate and medial frontal gyrus
355	5.2	4.1	0.00	-2 -74 48	superior parietal and precuneus
91	4.7	3.8	0.02	-12 12 -6	caudate, putament, and globus pallidus
111	4.4	3.7	0.01	-14 -56 2	posterior cingulate
97	4.4	3.6	0.01	14 -50 -2	posterior cingulate
23	4.3	3.6	0.19	34 -50 40	superior and inferior parietal
13	4.3	3.6	0.32	2 -44 -20	inferior parietal
90	4.3	3.6	0.02	-56 -42 -16	inferior temporal gyrus
21	4.1	3.4	0.21	-4 -12 8	thalamus
42	4.0	3.4	0.08	-22 -62 18	posterior cingulate

B) Emotion in source memory (Negative SH > Neutral SH) across Sleep and Wake groups

# voxels	T	Z	p(unc)	x,y,z {mm}	region
621	5.9	4.5	0.00	-40 -68 40	inferior parietal
532	5.7	4.3	0.00	0 -46 24	posterior cingulate
104	5.1	4.1	0.02	-54 6 -30	middle temporal gyrus

80	4.7	3.8	0.03	-12 44 10	medial frontal gyrus
43	4.6	3.8	0.11	2 -18 38	cingulate gyrus
263	4.6	3.7	0.00	-48 -30 -16	middle temporal gyrus
10	4.2	3.5	0.43	-12 56 10	medial frontal gyrus
11	4.2	3.5	0.41	22 -6 -20	amygdala
10	3.8	3.3	0.43	-62 -40 -14	middle temporal gyrus

Table S1: Peak responses for (A) recognition memory (all SH > all CR) and (B) emotional memory (negative SH > neutral SH) thresholded at $p=0.001$ uncorrected, with an extent threshold of $k=10$ voxels.

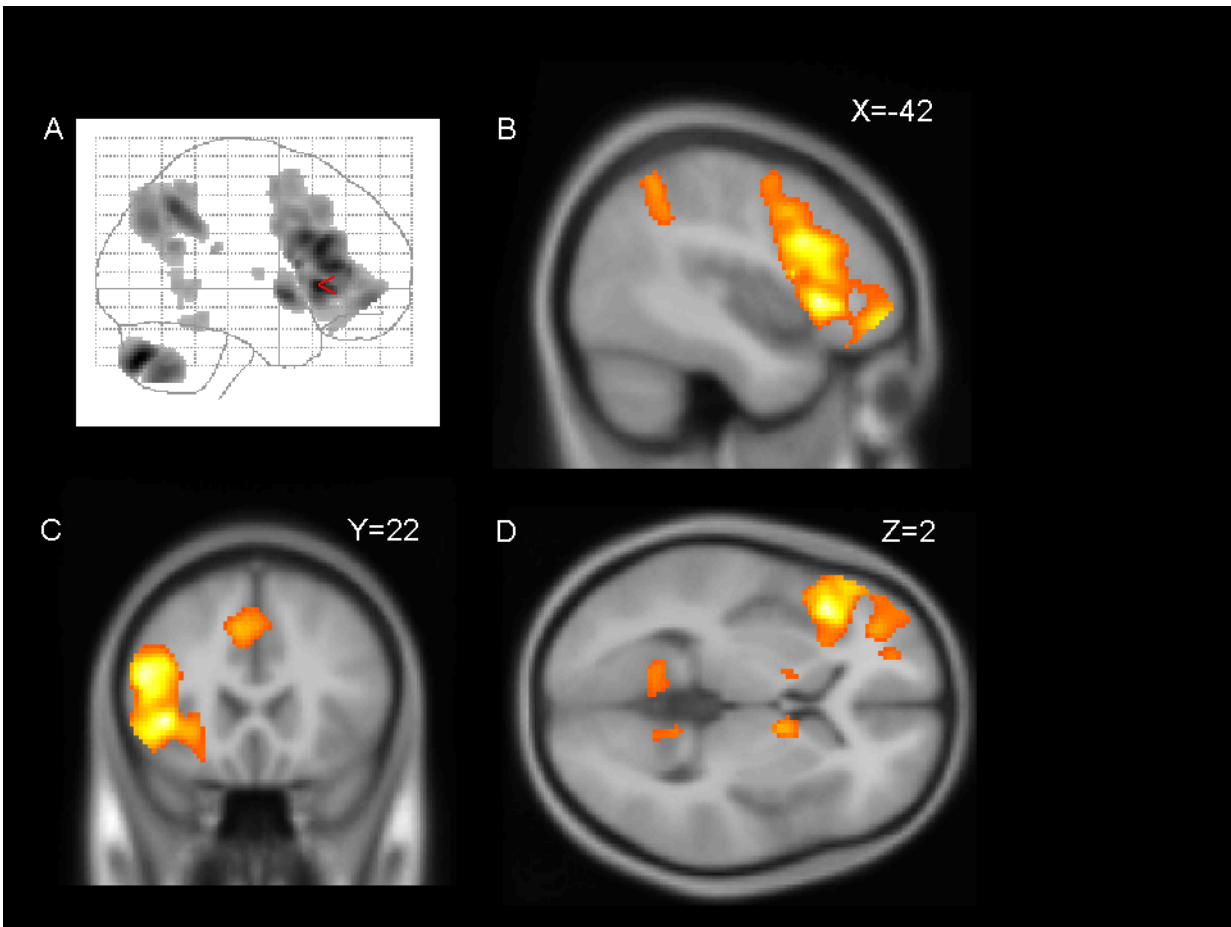


Figure S1: Main effect of recognition memory. Shown are (A) a glass brain view of responses to the contrast (all SH > all CR) across both tasks and all participants, (B) the a sagittal view of a large cluster which spreads across inferior, middle, and superior frontal gyri, as well as a separate response spreading across both superior and inferior parietal lobes, (C) a coronal view of the same prefrontal cluster, also showing a response in the anterior cingulate cortex, and (D) an axial view revealing additional activities in the striatum and posterior cingulate bilaterally. Data are rendered onto the 152 MNI brain at a probability threshold of $P=0.001$ and an extent threshold of $K=10$ voxels. These results are also shown in **Table S1A**.

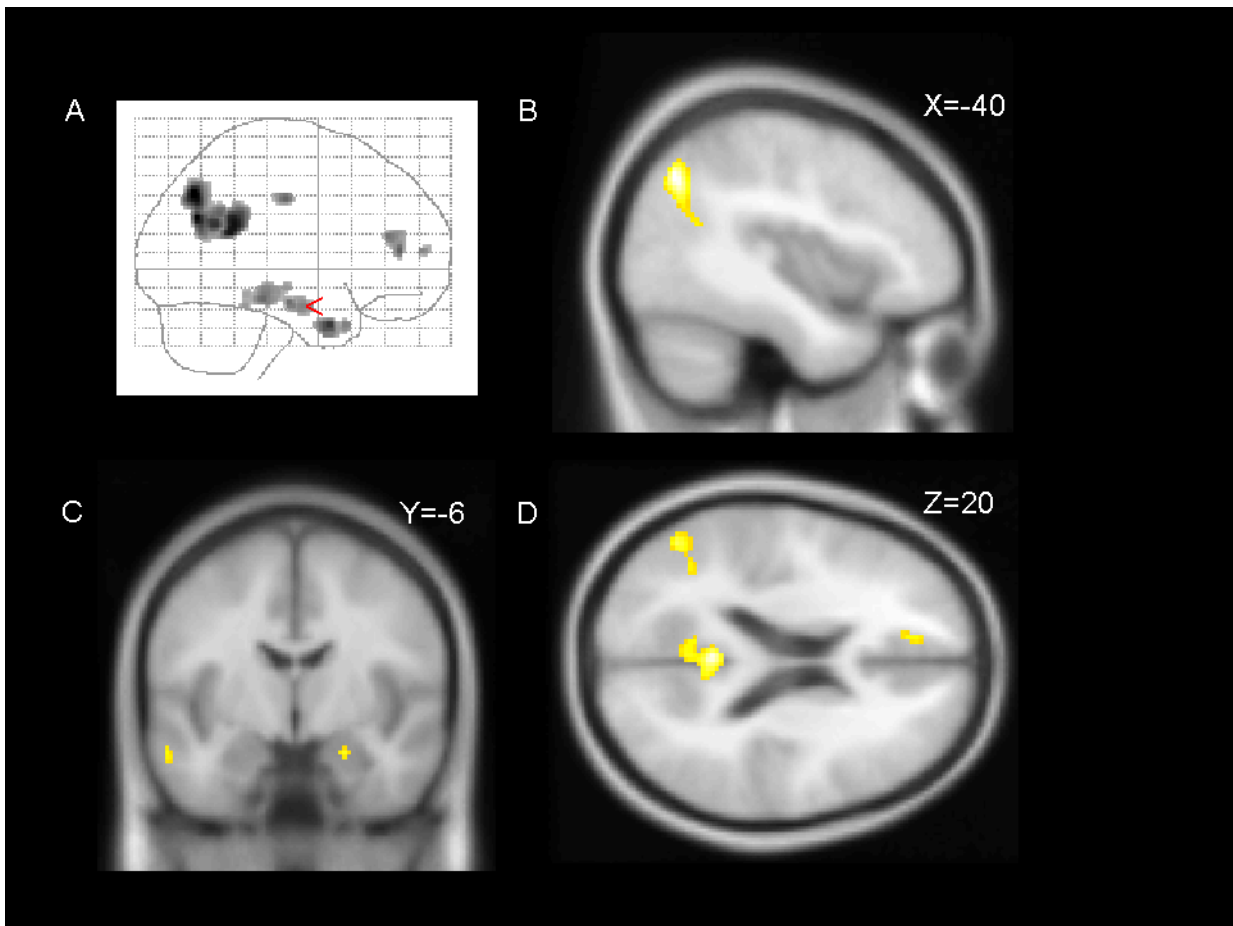


Figure S2: Main effect of valence upon correct source memory. The figure shows (A) a glass brain view of responses to the contrast (negative SH > neutral SH) calculated across both tasks and all participants, (B) the sagittal view of responses in the inferior parietal cortex, (C) a coronal view of responses in amygdala and middle temporal gyrus, and (D) an axial view of additional responses in both anterior and posterior cingulate. Data are rendered onto the 152 MNI brain at a probability threshold of $P=0.001$ and an extent threshold of $K=10$ voxels. These results are also shown in **Table S1B**.