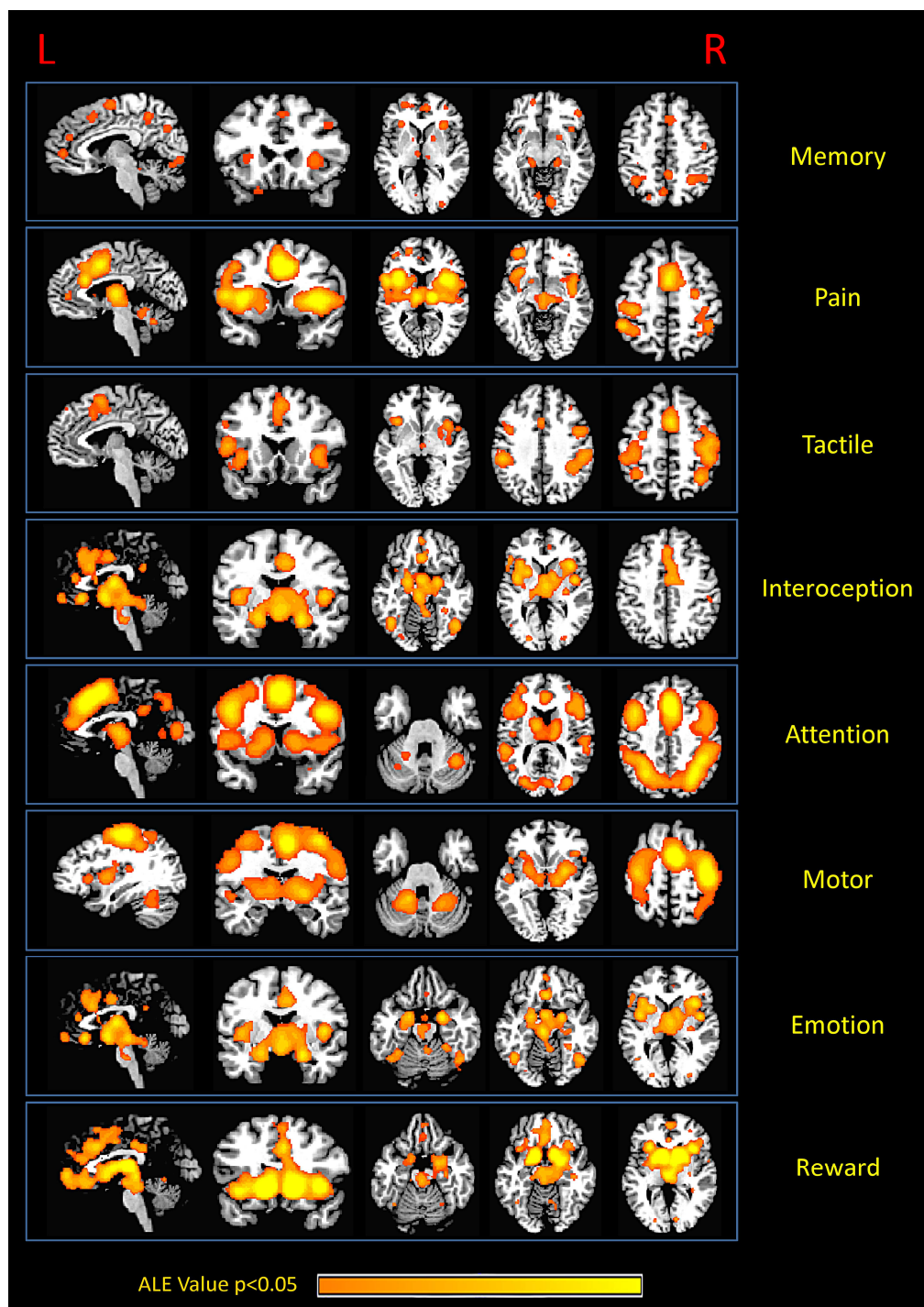


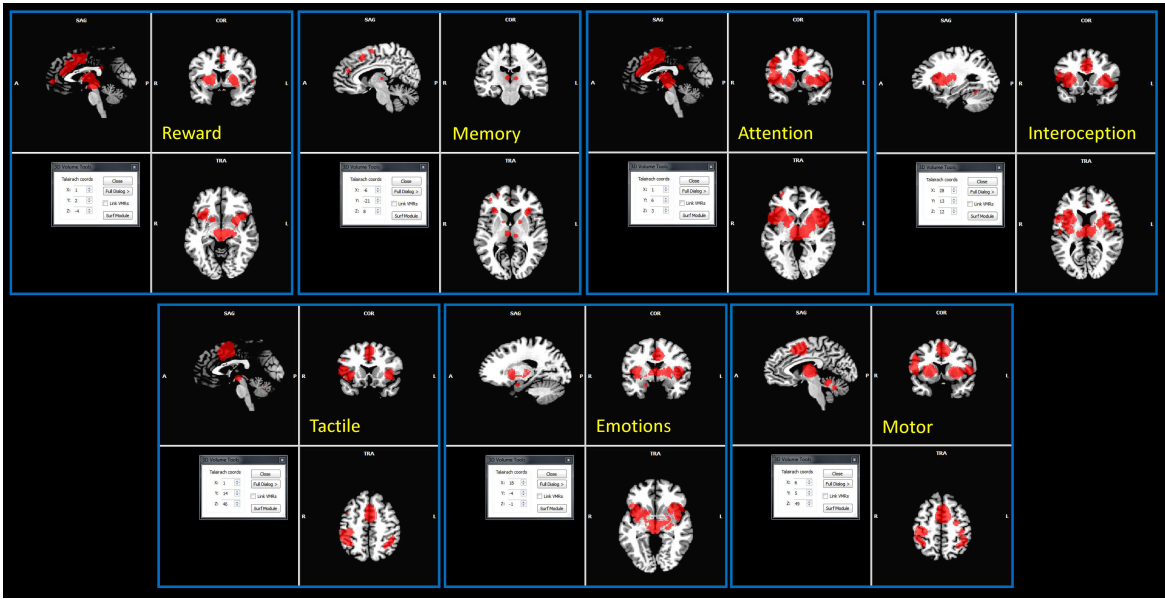
SUPPLEMENTARY FIGURES

FIG S1 TASK-RELATED NETWORKS



ACTIVATION LIKELIHOOD ESTIMATION STATISTICAL MAPS RELATIVE TO THE ACTIVATION NETWORKS IN QUESTION: PAIN, MEMORY, TACTILE STIMULATION, INTEROCEPTION, ATTENTION, MOTOR EXECUTION, EMOTIONS AND REWARD. ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$ AND VISUALIZED USING BRAINVYAGER QX 2.1.

FIG S2 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND MEMORY, TACTILE STIMULATION, INTEROCEPTION, ATTENTION, MOTOR EXECUTION, EMOTIONS AND REWARD NETWORKS.



ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$

FIG S3 CONJUNCTION ANALYSIS OF PAIN, MEMORY, TACTILE STIMULATION, INTEROCEPTION, ATTENTION, MOTOR EXECUTION, EMOTIONS AND REWARD NETWORKS.

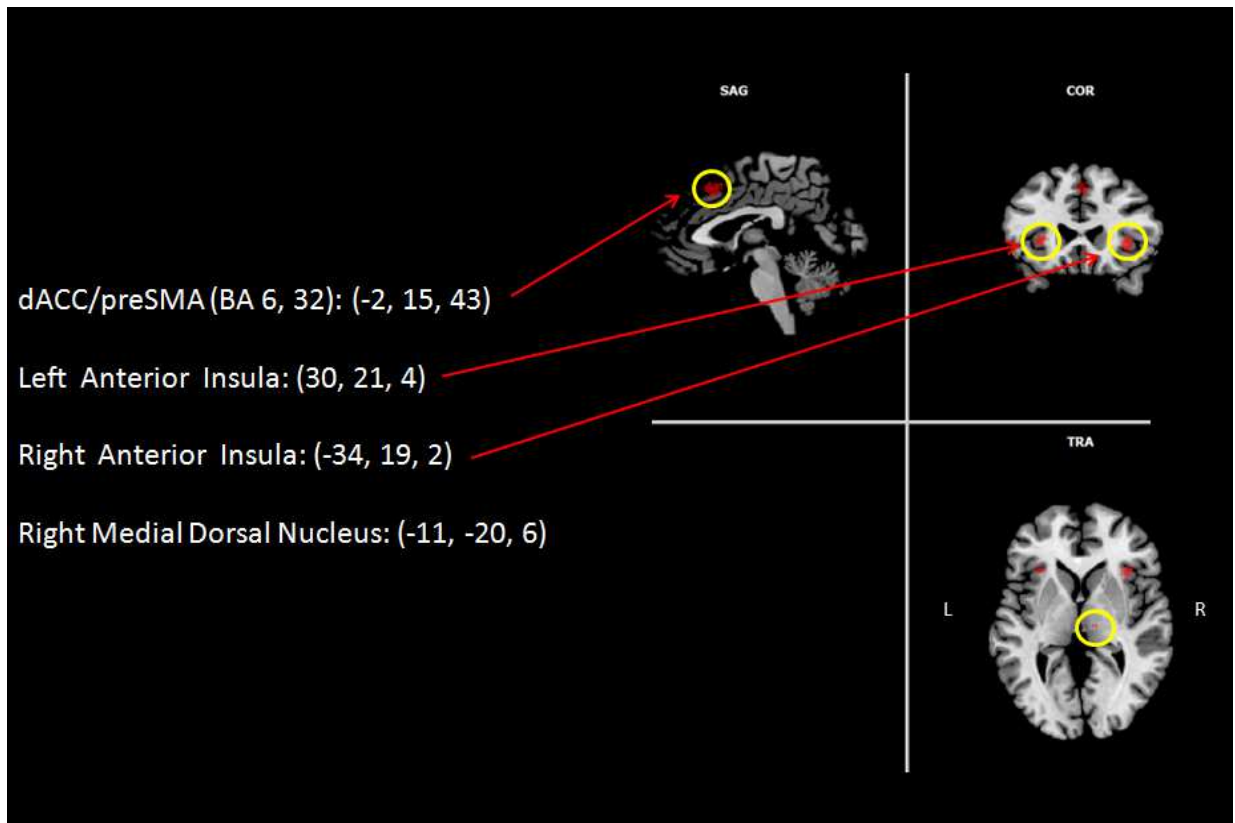
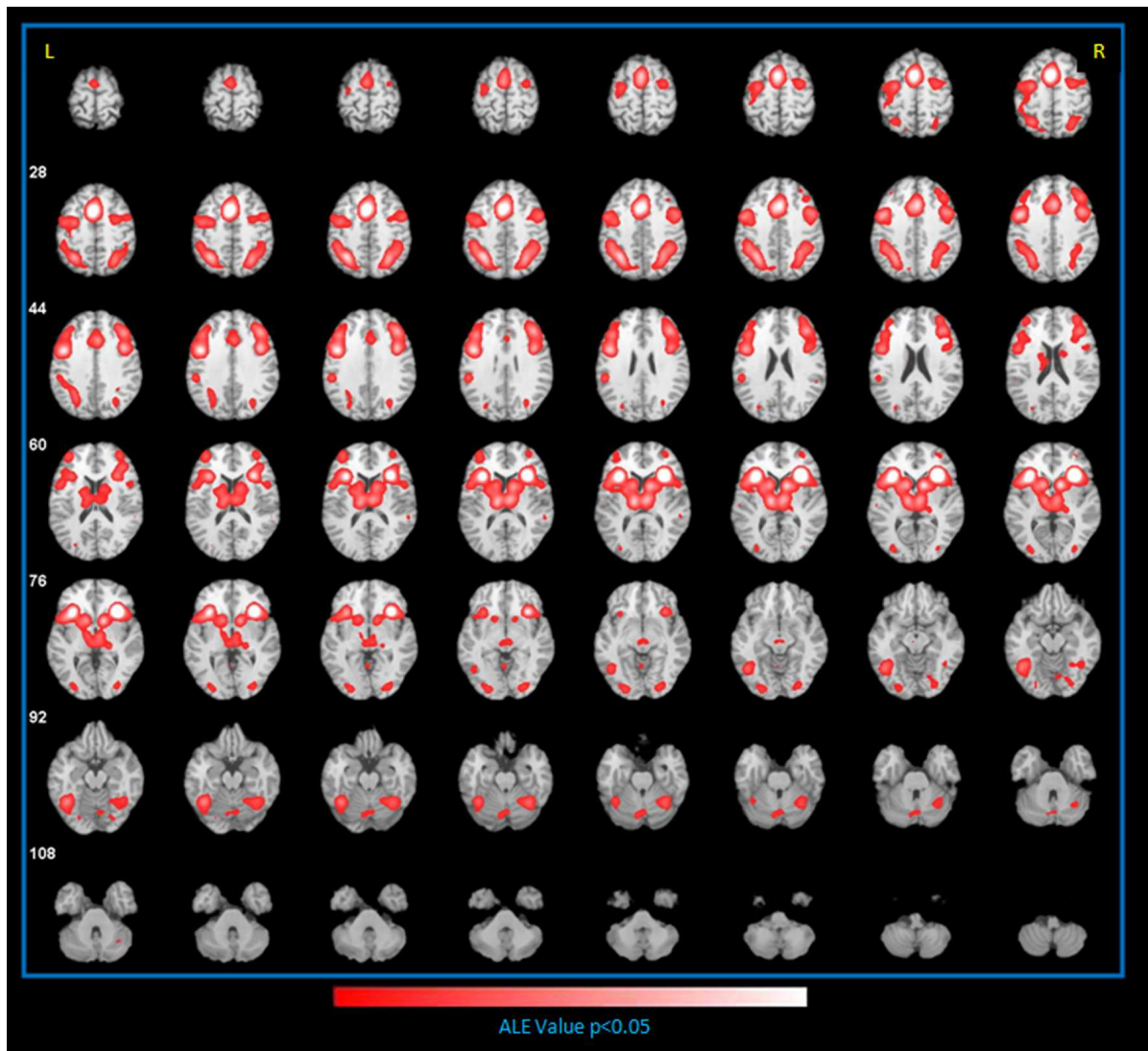
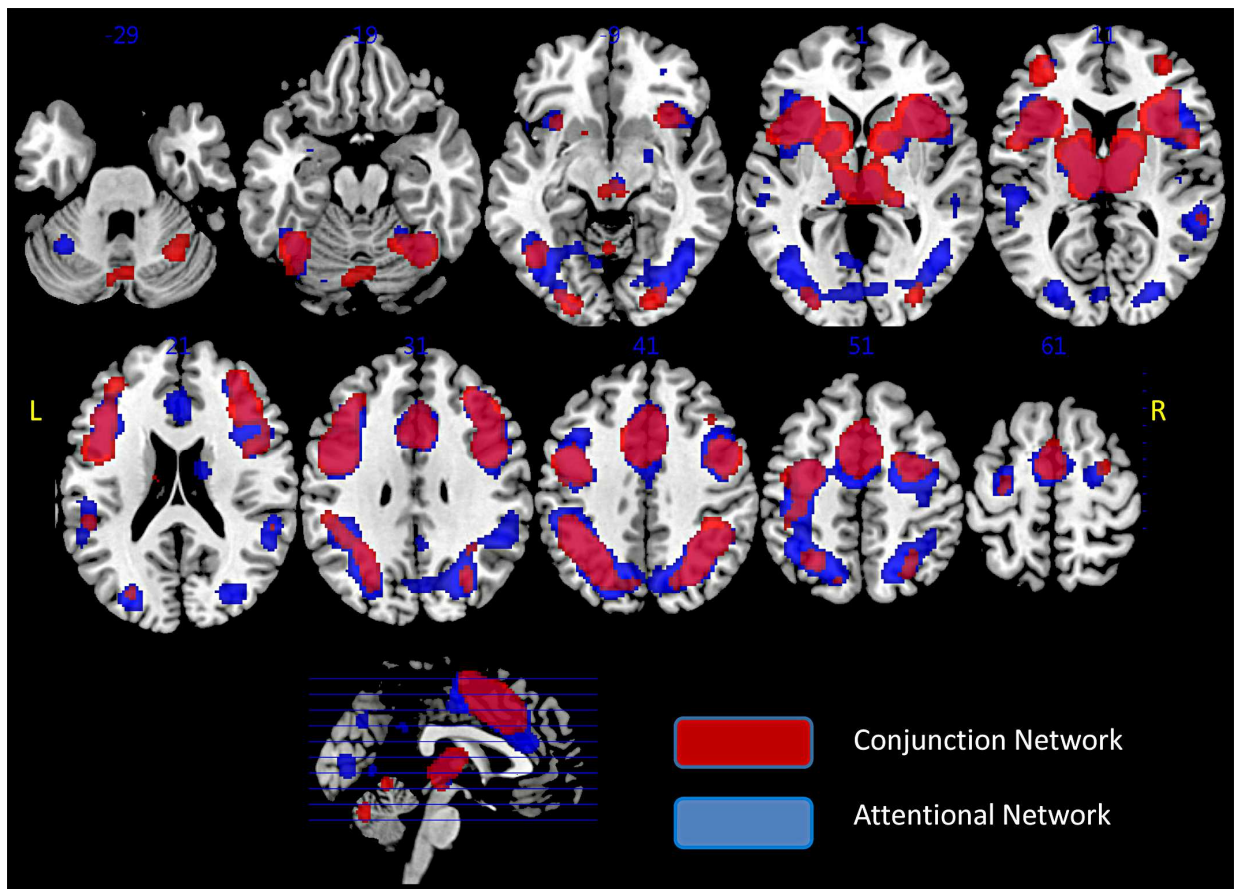


FIG S4 "HUB" NETWORK METAANALYTIC CONNECTIVITY



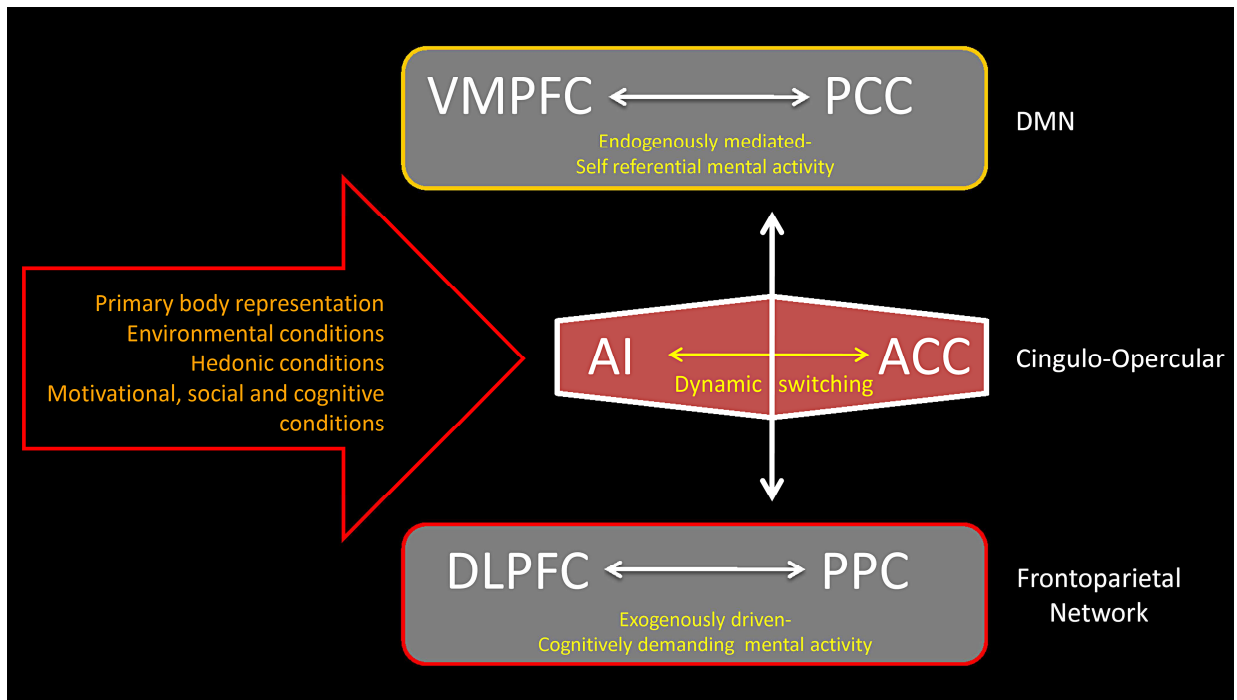
ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$

FIG S5 AREAS OF OVERLAP BETWEEN THE "HUB" NETWORK" META-ANALYTIC CONNECTIVITY AND THE FRONTOPIRIETAL ATTENTIONAL NETWORK



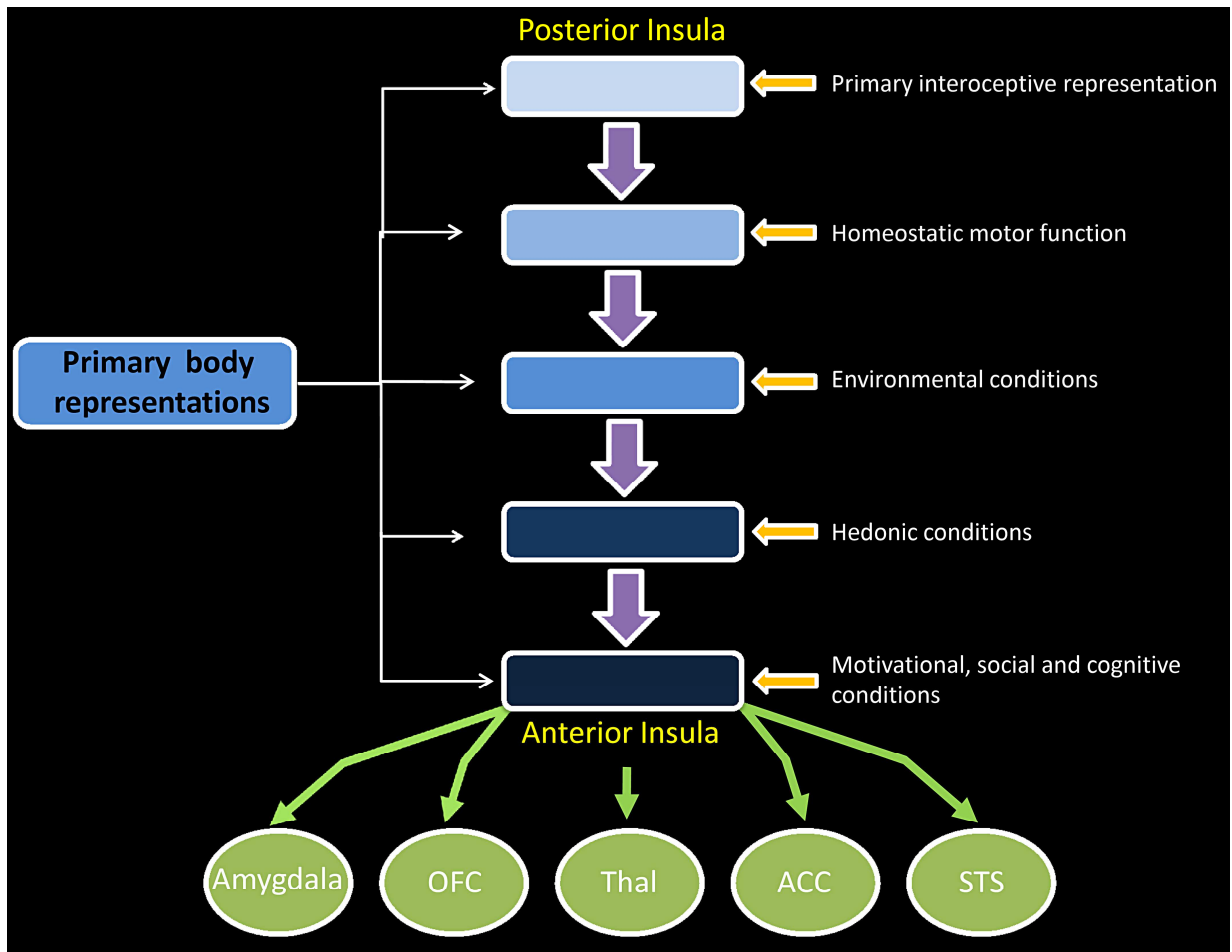
ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$ 100MM^3 AND VISUALIZED USING MRICRON ([HTTP://WWW.CABIATL.COM/MRICRO/MRICRON/INDEX.HTM](http://www.cabiatl.com/mricro/mricron/index.htm)).

FIG S6 NETWORK MODEL OF ANTERIOR INSULA FUNCTION.



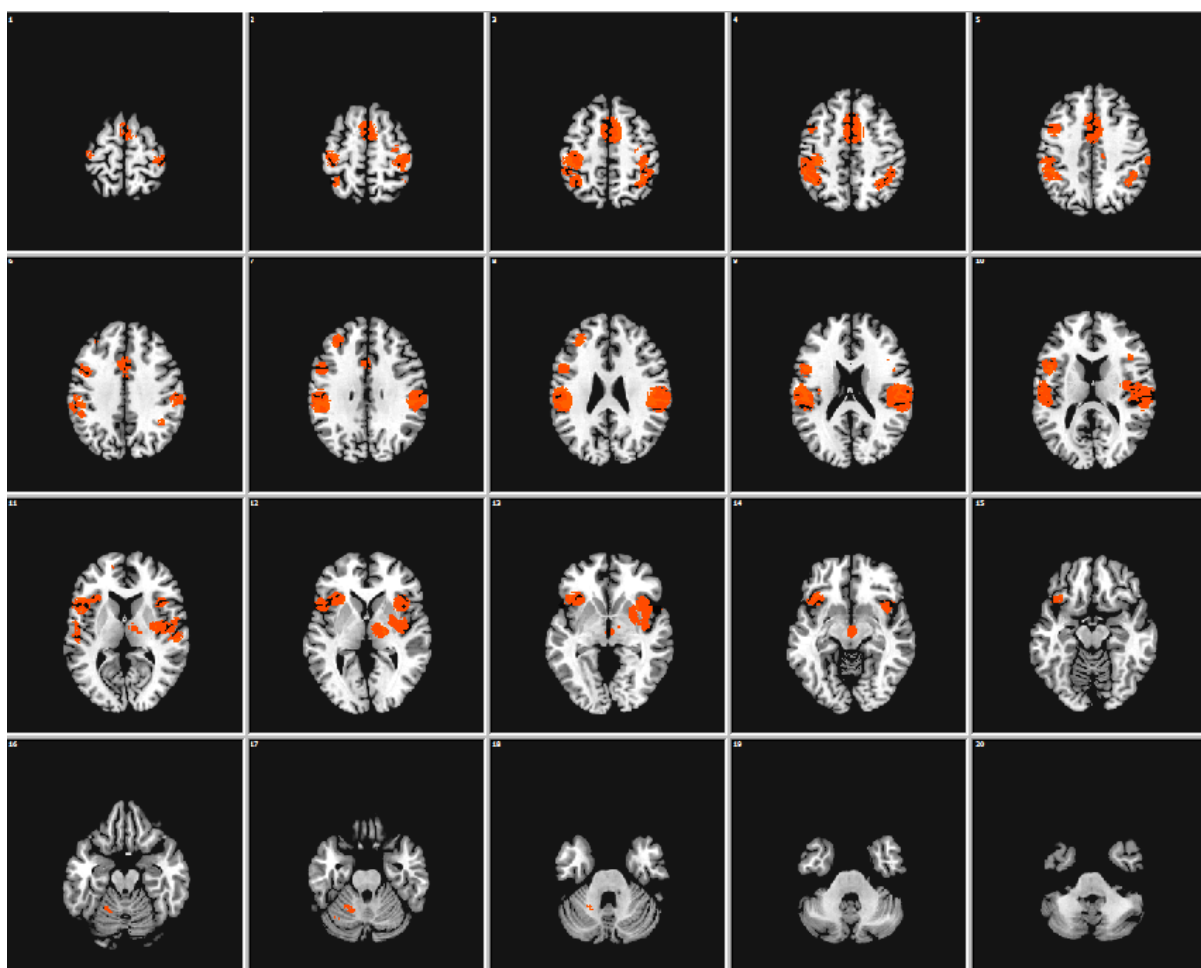
[1]

FIG S7 MODEL OF THE INSULAR STIMULUS INTEGRATION



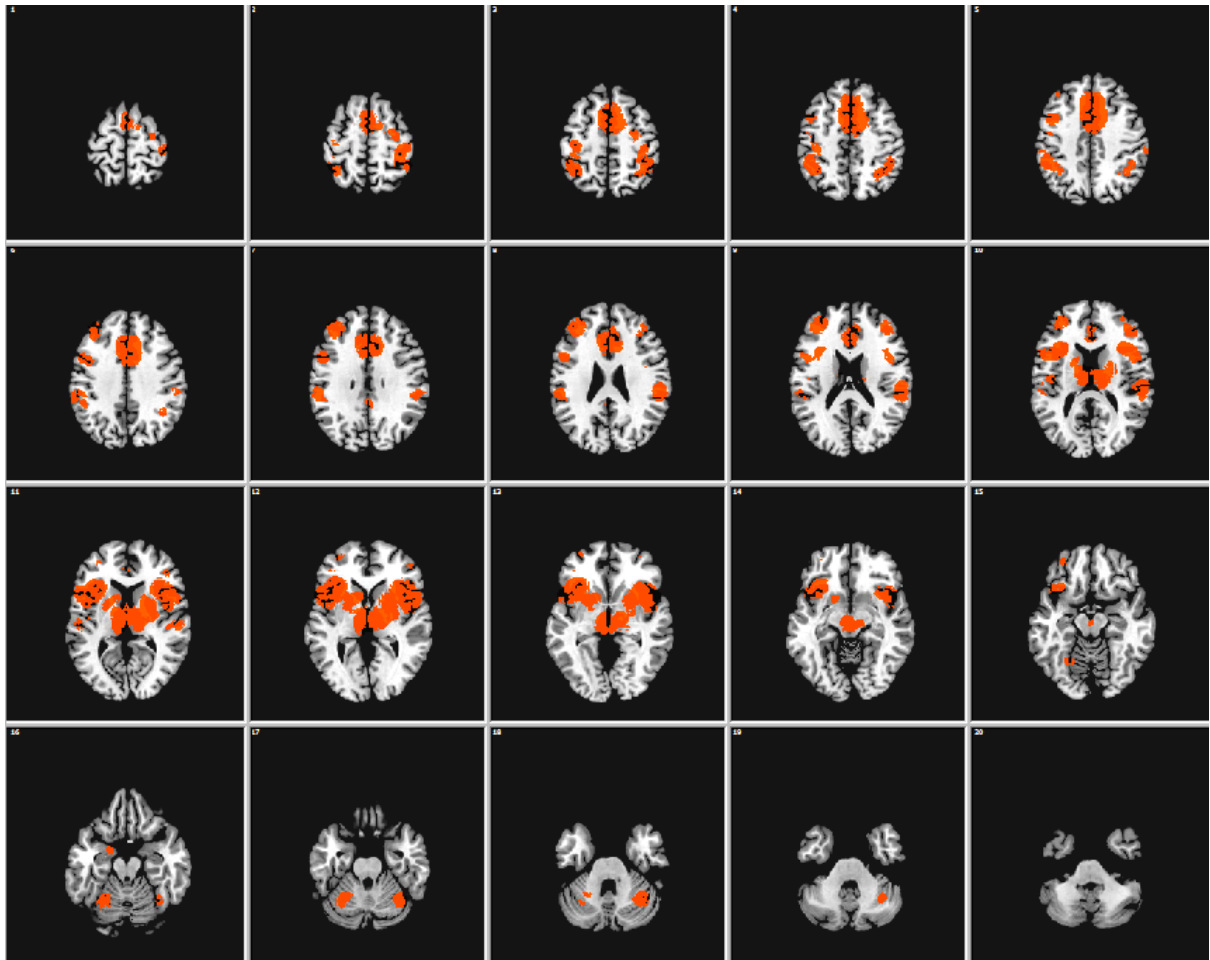
[2,3,4]

FIG S8 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND TACTILE STIMULATION NETWORK.



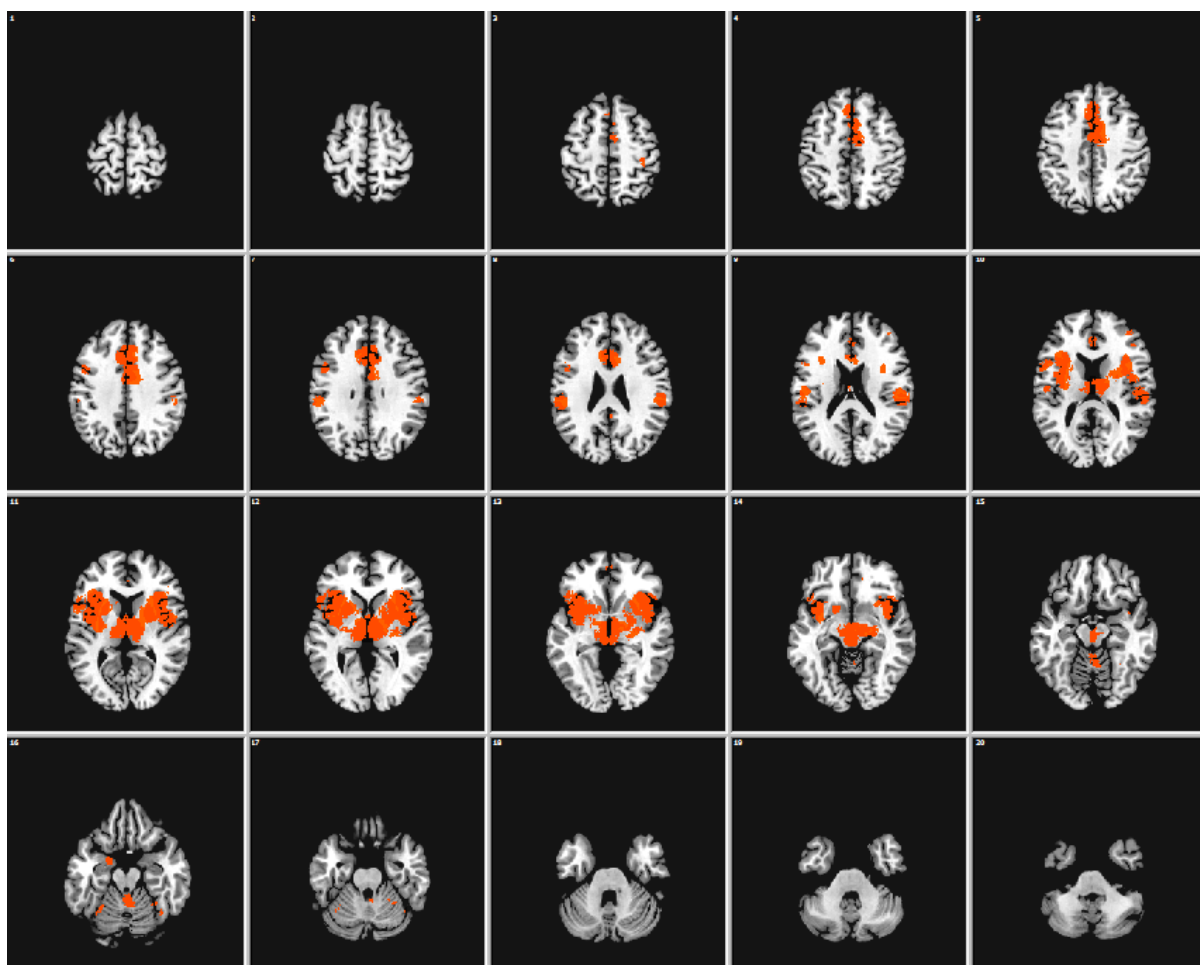
ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER
DIMENSION $K > 100\text{MM}^3$

FIG S9 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND ATTENTION NETWORK.



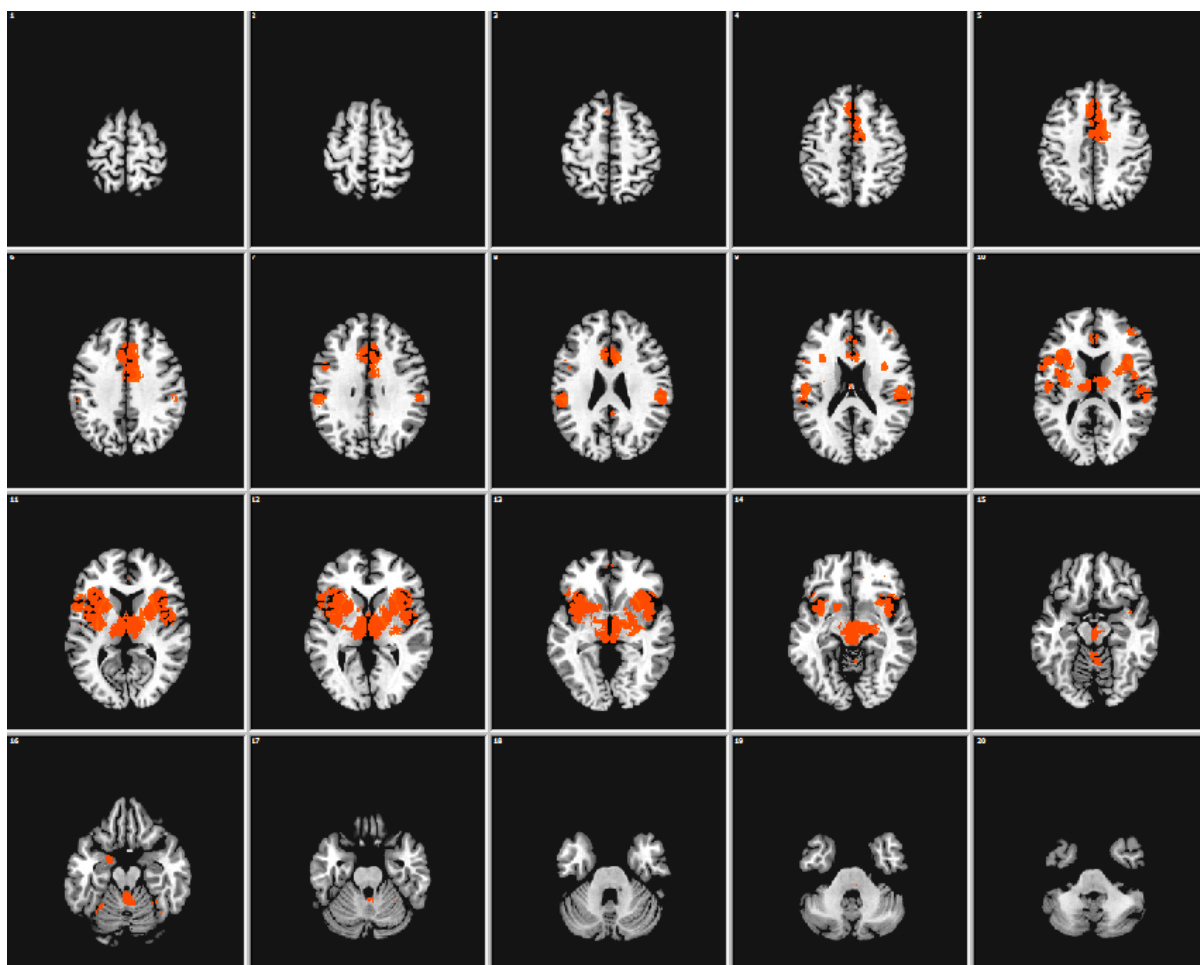
ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$

FIG S10 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND EMOTION NETWORK.



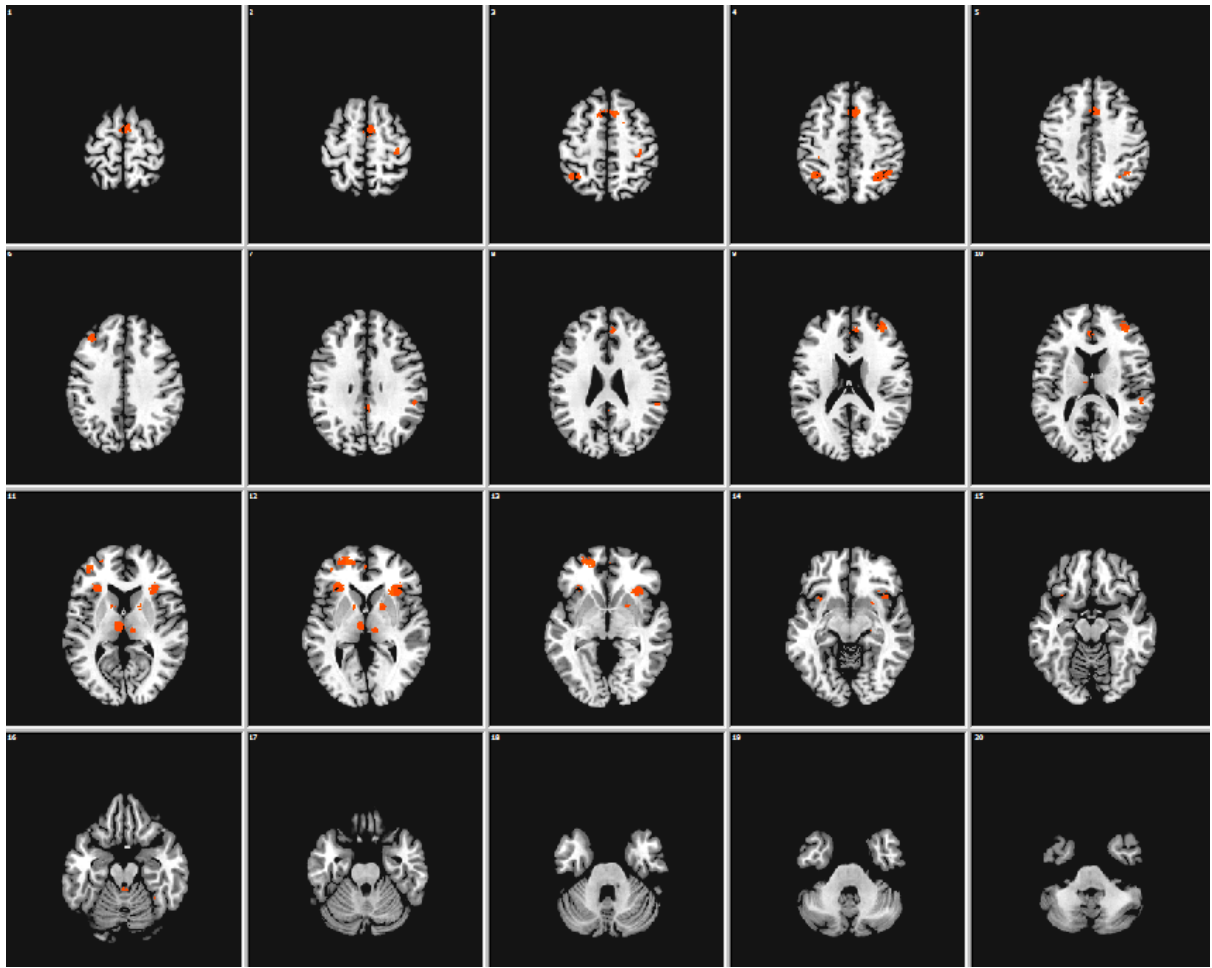
ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER
DIMENSION $K > 100\text{MM}^3$

FIG S11 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND INTEROCEPTION NETWORK.



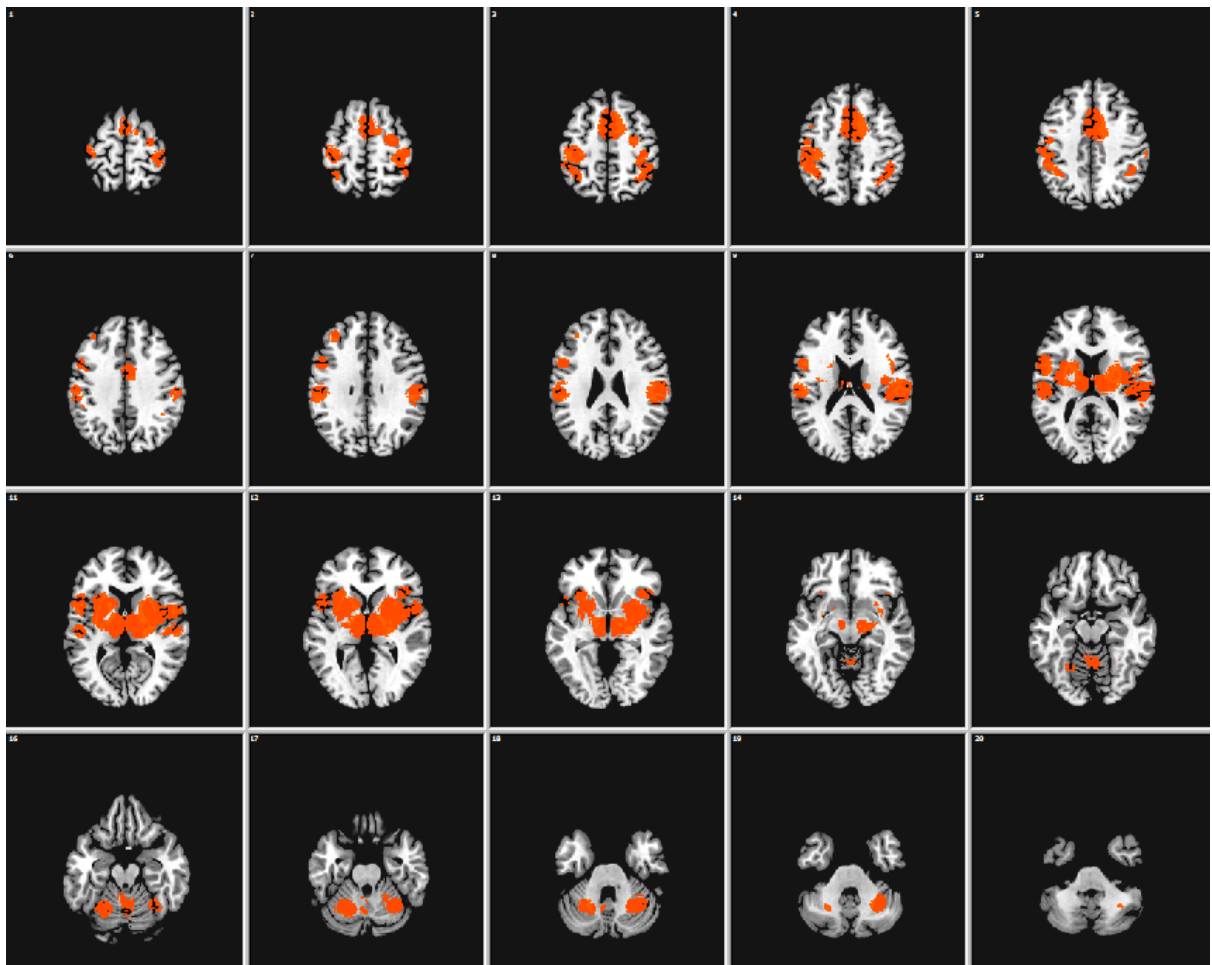
ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER
DIMENSION $K > 100\text{MM}^3$

FIG S12 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND MEMORY NETWORK.



ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$

FIG S13 AREAS OF OVERLAP BETWEEN PAIN NETWORK AND MOTOR NETWORK.



ALE MAPS WERE COMPUTED AT AN FDR-CORRECTED THRESHOLD OF $P < 0.05$; MINIMUM CLUSTER DIMENSION $K > 100\text{MM}^3$

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4. Mufson EJ, Mesulam MM (1982) Insula of the old world monkey. II: Afferent cortical input and comments on the claustrum. *J Comp Neurol* 212: 23-37.