

Supplemental Table 1. *Healthy Controls (n = 22); Neural Responses to Facial Emotion Identification*

<b>Contrast/Lobe</b>	<b>Talairach Coordinates</b>					<b>mm<sup>3</sup></b>
	<b>BA</b>	<b>x</b>	<b>y</b>	<b>z</b>	<b>Z</b>	
<u>Frontal</u>						
Inferior Frontal	46/10	-38	35	10	4.39	7952
Middle/Inferior Frontal/Insula	46/45/9/13	-32	14	27	4.37	1240
Superior Frontal	46/45/13 10	34 -17	12 51	18 18	3.89 3.76	3112 216
<u>Parietal</u>						
Inferior Parietal	39/40	22	-50	22	3.78	296
	39/40	-22	-34	28	3.33	248
Precuneus	7	-17	-56	37	3.55	320
<u>Temporal</u>						
Parahippocampal	30	-10	-36	3	4.10	2704
	19/30	-22	-48	-1	3.86	200
	19	-34	-46	1	3.74	720
<u>Subcortical</u>						
Caudate Body		6	-1	14	3.84	528
Putamen/Globus Pallidus/ Hippocampus		20	-17	-1	4.72	3592
		-22	-19	-3	4.39	2072
Pulvinar		12	-29	16	3.85	336
Medial Dorsal Nucleus		-8	-11	13	4.25	728
Pons/Raphe		-1	-32	-25	3.73	1072

*Note.* BA = Brodmann's area; x, y, z = Talairach coordinates of regions in which significant effects were demonstrated.

Supplemental Table 2.

*MDD group (n = 24); Neural Responses to Facial Emotion Identification*

<b>Contrast/Lobe</b>	<b>Talairach Coordinates</b>					<b>mm<sup>3</sup></b>
	<b>BA</b>	<b>x</b>	<b>y</b>	<b>z</b>	<b>Z</b>	
<u>Frontal</u>						
Inferior Frontal/Insula	47/13	-32	18	1	4.61	3552
Superior Frontal	9	-15	53	24	3.62	192
Precentral	4	33	-17	48	4.56	2376
Middle Frontal/Pre/Postcentral	3/4/5/ 6/8/9	10	-38	63	6.03	129512
Anterior Cingulate	24/32	-13	22	20	3.42	320
Ventral Anterior Cingulate	24	-13	-5	10	3.64	448
<u>Parietal</u>						
Inferior Parietal/Superior Temporal	39/40	43	-52	20	3.81	472
	39/40	-43	-50	45	4.02	208
	39/40	-27	-52	23	5.36	6024
Precuneus	7	15	-58	46	3.45	208
<u>Temporal</u>						
Middle Temporal	22/19	-40	-58	16	3.77	1192
Middle/Superior Temporal	21/22	45	-44	1	4.12	1480
Parahippocampal/ Amygdala		-25	-11	-13	3.57	240
<u>Occipital</u>						
Lingual	18	-32	-77	3	3.46	544
	17	15	-81	-1	3.76	160
<u>Subcortical</u>						
Pulvinar/Medial Dorsal Nucleus		-3	-23	9	3.69	640
Mammillary Body/ Substantia Nigra		3	-7	-6	3.74	632
Cerebellum		-18	-73	-16	3.57	168
		-18	-79	-29	3.75	176

*Note.* BA = Brodmann's area; x, y, z = coordinates of regions in which significant effects were demonstrated.

Supplemental Table 3. *Accuracy and Reaction Time on the Facial Emotion Perception Test (FEPT) for Healthy Control (HC) and Major Depressive Disorder (MDD) Groups*

Variable	HC		MDD		<i>t</i> (44)	<i>p</i>	<i>d</i>
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>			
Overall							
% Accuracy Faces	89.8	4.3	86.6	7.0	1.86	.04	0.75
RT Faces	1172.9	107.8	1154.8	155.6	0.46	.33	0.17
% Accuracy Animals	87.9	10.2	84.5	10.3	1.10	.14	0.33
RT Animals	1186.3	135.3	1155.2	142.8	0.76	.23	0.23
Happy							
% Accuracy	98.1	2.6	95.7	4.8	2.07	.02	.90
RT	916.8	104.1	1004.1	204.0	-1.85 <sup>a</sup>	.04	-0.84
Sad							
% Accuracy	81.5	11.9	78.0	15.8	0.83	.21	0.21
RT	1205.2	166.2	1230.8	227.2	-0.43	.33	-0.15
Angry							
% Accuracy	82.8	9.0	82.9	18.5	-0.01	.50	-0.01
RT	1251.8	187.3	1144.9	178.0	1.99	.03	0.57
Fearful							
% Accuracy	80.4	12.3	74.0	16.6	1.57	.06	0.55
RT	1391.5	186.6	1320.5	232.5	1.14	.13	0.38

*Note.* RT = Reaction Time for correct responses. <sup>a</sup>Degrees of freedom = 34.85 due to unequal error variance,  $t(34.85) = -1.85$ ,  $p = .04$ .

Supplemental Figure 1. Relationships amongst Left and Right Inferior Frontal Gyrus and Right IFG/Left IFG ratio with FEP performance in MDD and HC groups. The figure illustrates correlations amongst left and right inferior frontal gyrus (IFG), right IFG/left IFG ratio score, and FEPT task performance in the MDD group, with correlations for the HC group presented in parentheses. Significant correlations are marked with an asterisk; trend-level correlation marked with a caret.

