

Table 1. Statistical Results													
Figure		Assay Performed	Parameter (Unit)	Groups	N	Descriptive Statistics	Statistical Analysis				Column statistics		
						Average ± SEM	Statistical Test		P value	Significance		Factor	Comparison
1	C-1	EPSC amplitude comparison	EPSC amplitude (pA)	1st. AC st	10	211.3 ± 30.58	Wilcoxon matched-pairs signed rank		0.002		Two-tail		
				1st Ctx st	10	22.61 ± 7.548							
	C-2	EPSC amplitude (pA)	2nd AC st	10	308.6 ± 45.97	Wilcoxon matched-pairs signed rank		0.002		Two-tail			
			2nd Ctx st	10	29.69 ± 9.084								
1	G	Paired-pulse ratio comparison	Paired-pulse ratio	AC	10	1.496 ± 0.1088	Mann Whitney U test		P value		Two-tail		
				Ctx input	10	1.108 ±						0.0068	
4	D	IHC (c-FOS+ cells in BLA)	Number of c-FOS+ cell / mm²				Statistical Test		P value				
				AC cut	6	30.49 ± 7.053	Unpaired T test						
				AC uncut	6	56.48 ± 8.401							
5	B-1	Open field-distance	cm				Statistical Test		P value				
				AC uncut	8	3567 ± 192.3	Unpaired T test						
				AC cut	8	43.6 ± 240.7							
	B-2	Open field-rearing	Number				Statistical Test		P value				
				AC uncut	8	36.13 ± 3.414	Unpaired T test						
				AC cut	8	59.63 ± 5.964							
B-3	Open field-central/corner rate	% of time				Statistical Test		P value					
			AC uncut	8	24.13 ± 3.263	Unpaired T test							
			AC cut	8	18.4 ± 3.055								0.2204
5	C	Light-dark box	% of time in light box				Statistical Test		P value				
				AC uncut	8	27.14 ± 3.349	Unpaired T test						
				AC cut	8	32 ± 2.594							
5	D-1	Elelabeled plus maze - close arm	% of time				Statistical Test		P value				
				AC uncut	8	67.57 ± 3.154	Unpaired T test						
				AC cut	8	62.9 ± 2.048							
	D-2	Elelabeled plus maze - central area	% of time				Statistical Test		P value				
				AC uncut	8	13.68 ± 2.861	Unpaired T test						
				AC cut	8	12.09 ± 1.223							
D-3	Elelabeled plus maze - open arm	% of time				Statistical Test		P value					
			AC uncut	8	18.76 ± 2.6	Unpaired T test							
			AC cut	8	25.02 ± 2.981								0.136
6	B	Reciprocal social interaction	Interaction time				Statistical Test		P value				
				AC uncut	19	59.81 ± 4.527	Unpaired T test						
				AC cut	16	87.57 ± 6.629							
6	C	Sucrose preference	Drinkingvolume(ml)				2-way RM ANOVA				Multiple Comparison Procedures (Bonferroni t-test)		
				AC uncut- Water	10	1.592 ±	Surgery:: F(1,18)=0.203, P=0.657 Drink::F(1,18)=4.385, P=0.051 Interaction:: F(1,18)=8.026, P=0.011				Col 1	AC uncut VS. AC cut	0.657
				AC uncut-	10	1.992 ± 0.08512					Col 2	Water VS. Sucrose	0.051
				AC cut-Water	10	1.892 ± 0.115					Col 2 with AC uncut	Water VS.Sucrose	0.003
				AC cut-Sucrose	10	1.832 ± 0.1852					Col 2 with AC cut	Water VS.Sucrose	0.608
											Col 1 with Water	AC uncut VS. AC cut	0.098
						Col 1 with Sucrose	AC uncut VS. AC cut	0.369					
7	B-1	Auditory fear conditioning - Basal	% of freezing time				Statistical Test		P value				
				AC uncut	9	11.29 ± 0.8988	Unpaired T test						
				AC cut	9	14.88 ± 16.40							
	B-2	Auditory fear conditioning - AS	% of freezing time				Statistical Test		P value				
				AC uncut	9	48.7 ± 5.301	Unpaired T test						
				AC cut	9	48.09 ± 6.494							
B-3	Auditory fear conditioning - Memory	% of freezing time				Statistical Test		P value					
			AC uncut	9	53.61 ± 3.993	Unpaired T test							
			AC cut	9	34.43 ± 5.474								0.012
7	C-1	Auditory fear conditioning with D-cycloserine- Basal	% of freezing time				Statistical Test		P value				
				AC uncut	9	11.21 ± 1.507	Unpaired T test						
				AC cut	9	8.656 ± 1.116							
	C-2	Auditory fear conditioning with D-cycloserine- AS	% of freezing time				Statistical Test		P value				
				AC uncut	9	46.75 ± 4.973	Unpaired T test						
				AC cut	9	51.94 ± 6.322							
C-3	Auditory fear conditioning with D-cycloserine- Memory	% of freezing time				Statistical Test		P value					
			AC uncut	9	42.61 ± 3.122	Unpaired T test							
			AC cut	9	43.03 ± 7.392								0.9592