

Supplementary Table 1. Non-Significant Effects

Phase x Housing (pair vs single) x Age (adol vs adult)	EXP 1 (Fig 2)		EXP 2 (Fig 3)		EXP 3 (Fig 5)
Coc-SA Day x Housing x Age, Active lever	F(9, 270) = 0.572, p=0.820		F(9, 243) = 0.397, p=0.936		-
Coc-SA Day x Housing, Active lever	F(9, 270) = 1.658, p=0.099		F(9, 243) = 0.327, p=0.965		-
Coc-SA Day x Age, Active lever	F(9, 270) = 0.660, p=0.745		F(9, 243) = 0.492, p=0.879		-
EXT Day x Housing x Age, Active lever	F(7, 210) = 0.840, p=0.555		F(7, 189) = 0.940, p=0.477		-
EXT Day x Housing, Active lever	F(7, 210) = 2.696, p=0.011		F(7, 189) = 0.181, p=0.989		-
EXT Day x Age, Active lever	F(7, 210) = 0.886, p=0.518		F(7, 189) = 2.854, p=0.007		-
Context x Housing x Age, Active lever	F(1, 30) = 0.304, p=0.585		F(1, 27) = 2.228, p=0.147		-
Context x Housing, Active lever	F(1, 30) = 9.889, p=0.004		F(1, 27) = 0.485, p=0.492		-
Context x Age, Active lever	F(1, 30) = 1.929, p=0.175		F(1, 27) = 1.997, p=0.169		-
Pre Existing Differences: pair vs single	EXP 1		EXP 2		EXP 3
	Adol	Adult	Adol	Adult	Adol
Sessions to acquire Coc-SA	t(18) = -0.313, p=0.758	t(12) = 1.759, p=0.104	t(13) = 0.819, p=0.428	t(14)=0.483, p=0.636	F(12) = 1.469, p=0.249
Infusions, Avg Coc-SA, last 3 sessions	t(18) = 0.252, p=0.804	t(12) = -1.148, p=0.273	t(13) = 0.906, p=0.381	t(14)=-0.810, p=0.432	F(12) = 1.140, p=0.307
Active lever, Avg Coc-SA, last 3 session	t(18) = -0.038, p=0.970	t(12) = -0.395, p=0.700	t(13) = 0.104, p=0.919	t(14)=-0.365, p=0.365	F(12) = 0.754, p=0.402
Inactive lever, Avg Coc-SA, last 3 session	t(18) = 0.299, p=0.768	t(12) = 0.721, p=0.485	t(13) = 0.124, p=0.903	t(14)=0.275, p=0.788	F(12) = 4.338, p=0.060
Active lever, EXT, last session	t(18) = -0.158, p=0.876	t(12) = -1.138, p=0.278	t(13) = 0.097, p=0.924	t(14)=-1.012, p=0.329	F(12) = 1.12, p=0.311
Inactive lever, EXT, last session	t(18) = 1.852, p=0.081	t(12) = 0.963, p=0.354	t(13) = 1.131, p=0.279	t(14)=-0.654, p=0.524	F(12) = 0.002, p=0.966
EXT (sessions) x Housing (pair vs single)	EXP 1		EXP 2		
	Adol	Adult	Adol	Adult	
Active lever, EXT session x Housing interaction	F(7, 18) = 1.212, p=0.301	N/A	F(7, 13)= 0.744, p=0.635	F(7, 14)=0.420, p=0.888	-
Active lever, Housing main	F(1, 18) = 0.256, p=0.619	F(1, 12)=1.074, p=0.320	F(13)=0.022, p=0.884	F(1, 14)=0.209, p=0.654	-
Inactive lever, EXT session x Housing interaction	F(7, 18) = 0.508, p=0.827	N/A	F(7, 13)= 1.431, p=0.203	F(7, 14)=0.556, p=0.790	-
Inactive lever, Housing main	F(1, 18) = 2.085, p=0.166	F(1, 12)=0.003, p=0.960	F(13)=0.360, p=0.559	F(1, 14)=0.706, p=0.415	-
Context (EXT S8 vs Test) x Housing (pair vs single)	EXP 1		EXP 2		EXP 3
	Adol	Adult	Adol	Adult	
Active lever, Context x Housing interaction	N/A	N/A	F(1, 13) = 0.259, p=0.620	F(1, 14)=2.995, p=0.106	N/A
Active lever, Housing main	N/A	N/A	F(1, 13) = 0.201, p=0.662	F(1, 14)=1.566, p=0.231	N/A
Inactive lever, Context x Housing interaction	F(1, 18) = 2.111, p=0.163	F(1, 12)=0.599, p=0.454	F(1, 13) = 0.095, p=0.763	F(1, 14)=0.655, p=0.432	F(1, 12) = 0.202, p=0.661
Inactive lever, Context main	N/A	N/A	N/A	N/A	N/A
Inactive lever, Housing main	N/A	F(1, 12)=0.189, p=0.671	F(1, 13) = 0.273, p=0.610	F(1, 14)=0.885, p=0.363	F(1, 12) = 0.358, p=0.560
Test Bins (10 min) x Housing (pair vs single)	EXP 1		EXP 2		
	Adol	Adult	Adol	Adult	
Active lever, Test Bin x Housing interaction	F(5, 18) = 2.217, p=0.059	N/A	F(5, 13) = 0.937, p=0.463	F(5, 14) = 0.966, p=0.445	-
Active lever, Test Bin	N/A	N/A	N/A	N/A	-
Active lever, Housing main	N/A	N/A	F(1, 13) = 0.236, p=0.635	F(1, 14) = 2.348, p=0.148	-
Inactive lever, Context x Housing interaction	F(5, 18) = 1.229, p=0.302	F(5, 12) = 1.007, p=0.421	F(5, 13) = 0.045, p=0.999	F(5, 14) = 0.429, p=0.827	-
Inactive lever, Test Bin	N/A	N/A	N/A	N/A	-
Inactive lever, Housing main	N/A	F(1, 12) = 0.013, p=0.911	F(1, 13) = 0.021, p=0.887	F(1, 14) = 0.840, p=0.375	-

N/A= not applicable, Significant effect reported in main text