

Supplementary File 1. Example calculations of synGAP/PSD-95 ratio and TARPs/PSD-95 ratio for animals 33 and 34.

The Table shows the steps to calculate a synGAP/PSD-95 ratio and a TARPs/PSD-95 ratio from digital data recorded from one pair of gels containing samples from animals 33 and 34 (see Figure 1-figure supplement 1). Data were collected from at least 3 technical replicates of synGAP gel lanes for each animal and usually 6 technical replicates of target gel lanes. The resulting ratios were averaged.

Animal ID	Signal	Intensity	Signal Intensity - Bkg.	synGAP/PSD-95 Ratio
33	PSD95	6620000	2540000	0.489
33	PSD95_Background	4080000		
33	SynGAP	1720000	1242000	
33	SynGAP_Background	478000		
34	PSD95	5800000	1970000	0.686
34	PSD95_Background	3830000		
34	SynGAP	1800000	1351000	
34	SynGAP_Background	449000		
Animal ID	Signal	Intensity	Signal Intensity - Bkg.	TARPs/PSD-95 Ratio
33	PSD95	5460000	2560000	0.104
33	PSD95_Background	2900000		
33	TARPs	1170000	265000	
33	TARPs_Background	905000		
34	PSD95	3880000	1760000	0.092
34	PSD95_Background	2120000		
34	TARPs	853000	162000	
34	TARPs_Background	691000		