**Supplementary Figure 1** Controls for effectiveness of sensory deprivation. 

A, Upon early naris occlusion deprived bulbs showed a significant reduction in the density of BrdU\(^+\) cells in the granule cell layer when compared to the non-deprived bulb in the same animal (expressed as the ratio of the density of BrdU\(^+\) cells in the granule cell layer of the deprived bulb over the non-deprived bulb, significance was indicated by an asterisk if p<0.05, n=4-7 brains per time point, \(t\)-test). 

B, For adult rats expressing both NaChBac and PSDG (Mpsdg:2A:nachbac), upon naris occlusion deprived bulbs showed a significant reduction in the density of BrdU\(^+\) cells in the granule cell layer when compared to the non-deprived bulb in the same animal (expressed as the ratio of the density of BrdU\(^+\) cells in the granule cell layer of the deprived bulb over the non-deprived bulb, significance was indicated by an asterisk if p<0.05, n=4-6 brains per time point, \(t\)-test). 

C, Effectiveness of sensory deprivation after synaptic development was tested by a reduced expression of c-fos in the granule cell layer and tyrosine hydroxylase in the glomerular layer. The picture shows typical sections from both bulbs of a rat with naris occlusion (n=5 brains, scale bar = 400 \(\mu\)m). 

D, SypG\(^+\) clusters were predominatly found in spines of adult-born GCs at 28 d.p.i. (scale bar = 10 \(\mu\)m) 

E, A non-conducting pore mutant of NaChBac did not change glutamatergic input synapse development. Scatter plot and mean density of PSDG\(^+\) clusters (clusters/\(\mu\)m) in dendritic domains of new control or a non-conducting pore mutant of NaChBac, E191K NaChBac-expressing GCs (black and red circles, respectively) born in adult at 28 d.p.i.. The different dendritic domains were (from top) distal, proximal and basal domain. No significant differences were detected (\(t\)-test).