



**Figure S3. Distribution of  $\alpha$ -synuclein aggregate numbers from SNpc to striatum.** Number of  $\alpha$ -synuclein aggregates in SNpc and striatum of young mice at 1 m.p.i. (A) and 2 m.p.i. (B), and in adult mice at 1 m.p.i. (C) and 2 m.p.i. (D). The number of aggregates in striata of young mice was significantly lower compared to adult mice (MANOVA significance in SNpc. Main Factor Treatment:  $F(1) = 66.96$ ,  $** p < 0.001$ . MANOVA significance in the striatum. Interaction Treatment x Age x Anteroposteriorly:  $F(1, 2) = 4.9$ ,  $* p < 0.05$ ; Interaction Treatment x Age x Seeding Time:  $F(1, 1) = 6.9$ ,  $p < 0.05$ . In the figures, LSD test: ###  $p < 0.001$  for comparison between different inoculation of same age; \*\*\*  $p < 0.001$  for comparison between different age of same inoculation time).  $n = 5$  mice per group, 3 technical repetitions for SNpc and 9 for striatum per hemisphere in each animal.