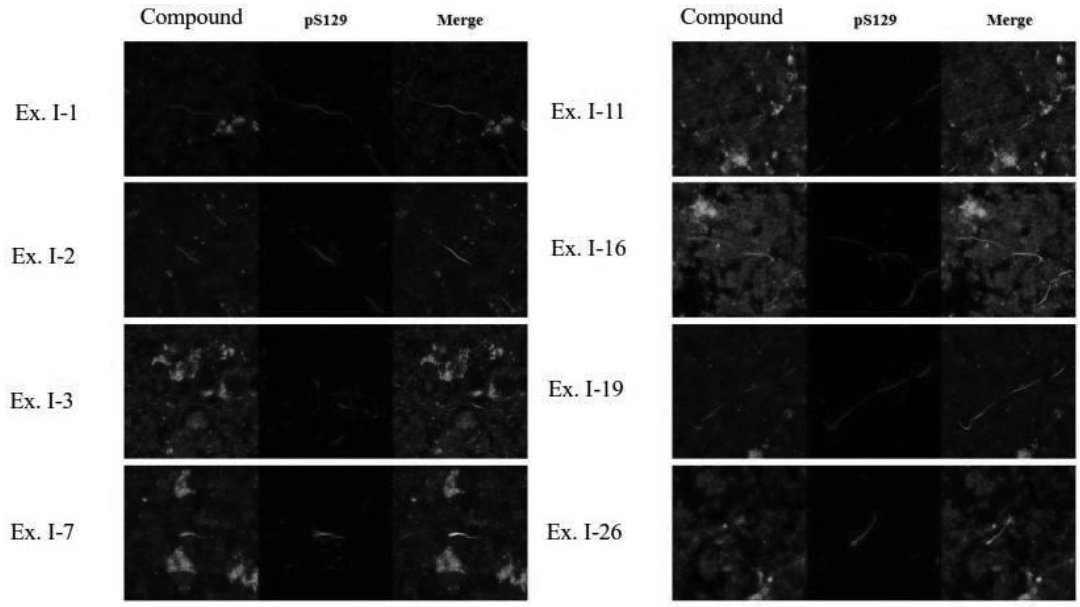

Compound
pS129
Merge
Ex. I-1
Ex. I-2
Ex. I-3
Ex. I-7
Compound
pS129
Merge
Ex. I-11
Ex. I-16
Ex. I-19
Ex. I-26

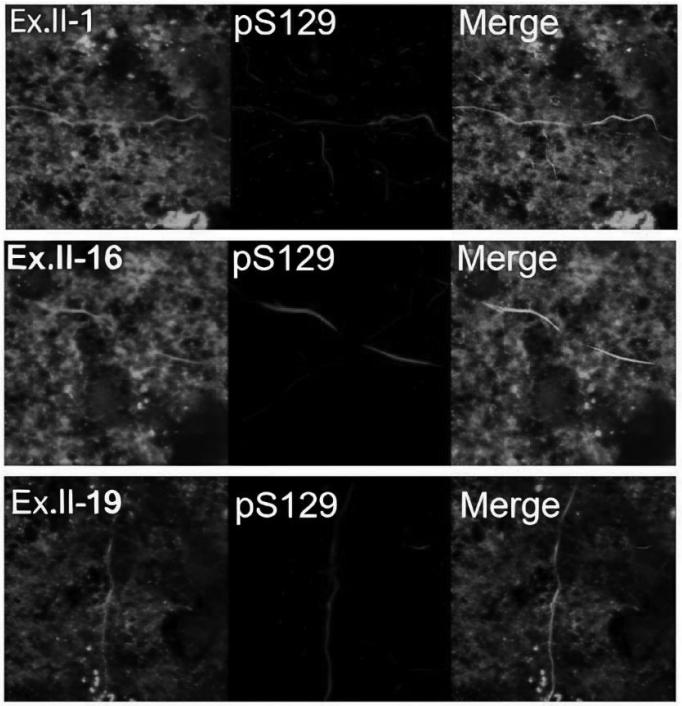
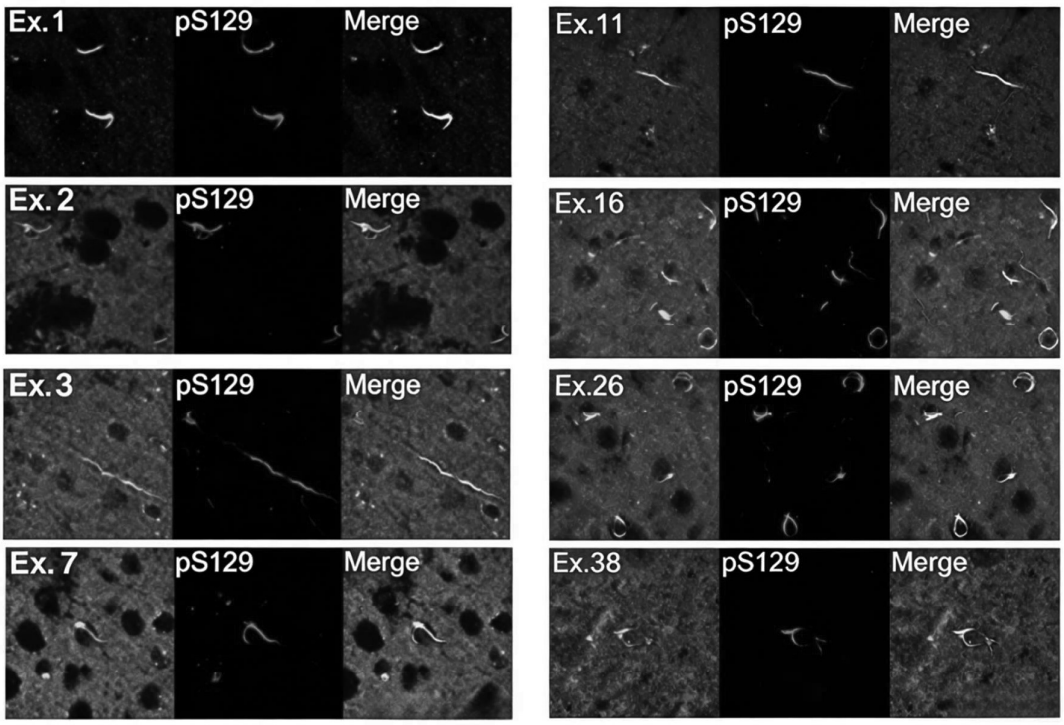

Ex.II-1
pS129
Merge
Ex.II-16
pS129
Merge
Ex.II-19
pS129
Merge

Fig. 1


Ex.1
pS129
Merge
Ex.11
pS129
Merge
Ex. 2
pS129
Merge
Ex.16
pS129
Merge
Ex. 3
pS129
Merge
Ex.26
pS129
Merge
Ex. 7
pS129
Merge
Ex.38
pS129
Merge

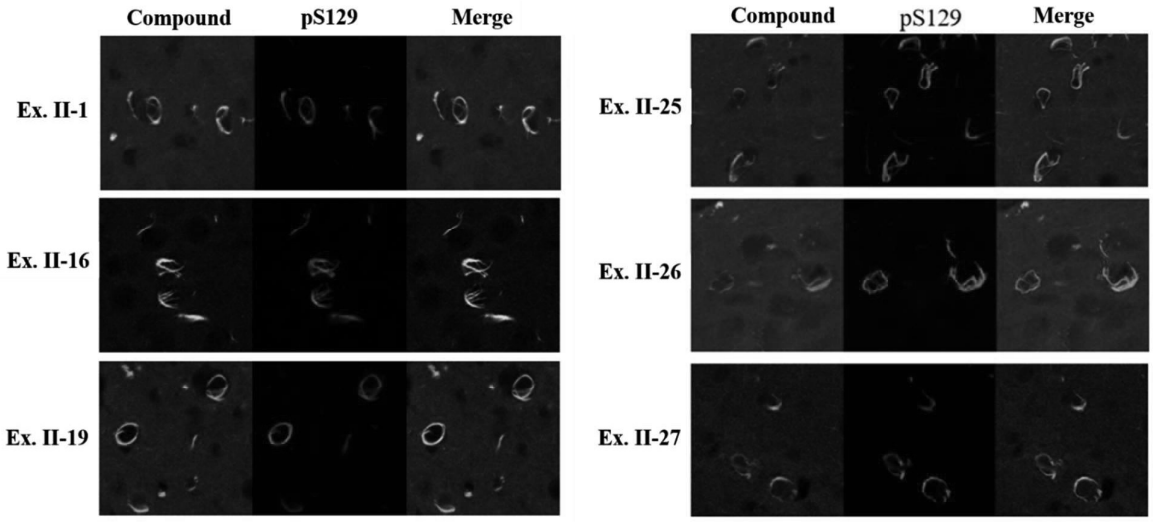

Compound
pS129
Merge
Ex. II-1
Ex. II-16
Ex. II-19
Compound
pS129
Merge
Ex. II-25
Ex. II-26
Ex. II-27

Fig. 2

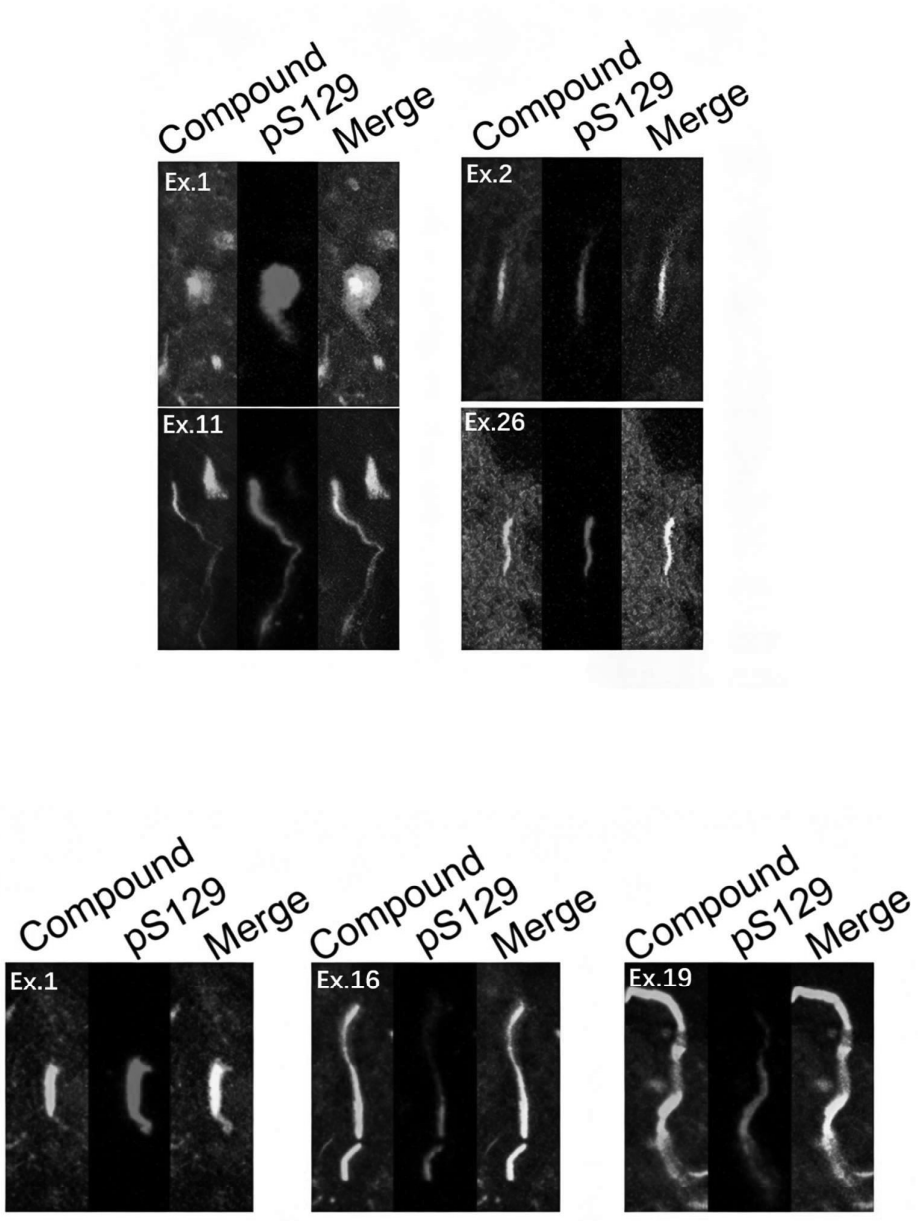

Compound
pS129
Merge
Ex.1
Ex.2
Ex.11
Ex.26
Compound
pS129
Merge
Ex.1
Ex.16
Ex.19

Fig. 3

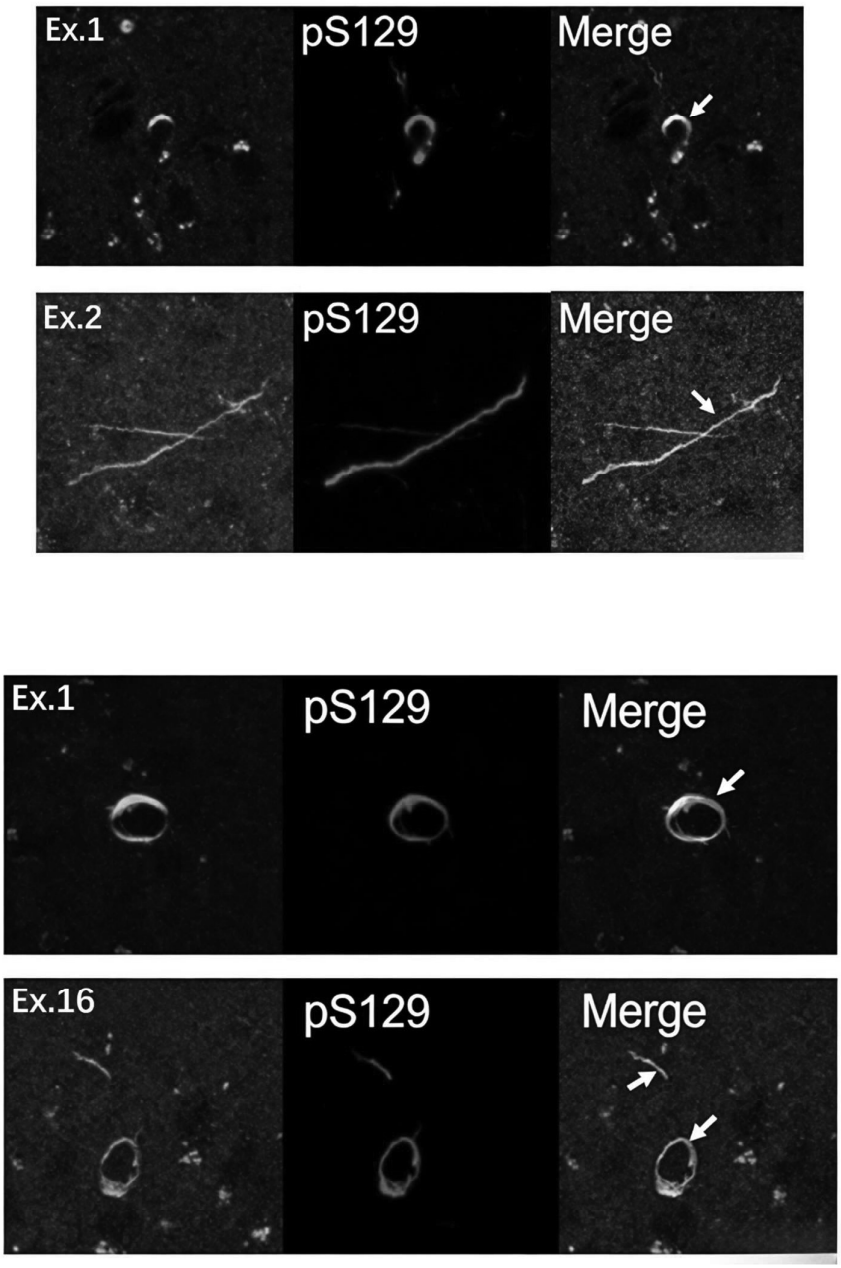

Ex.1
pS129
Merge
Ex.2
pS129
Merge
Ex.1
pS129
Merge
Ex.16
pS129
Merge

Fig. 4

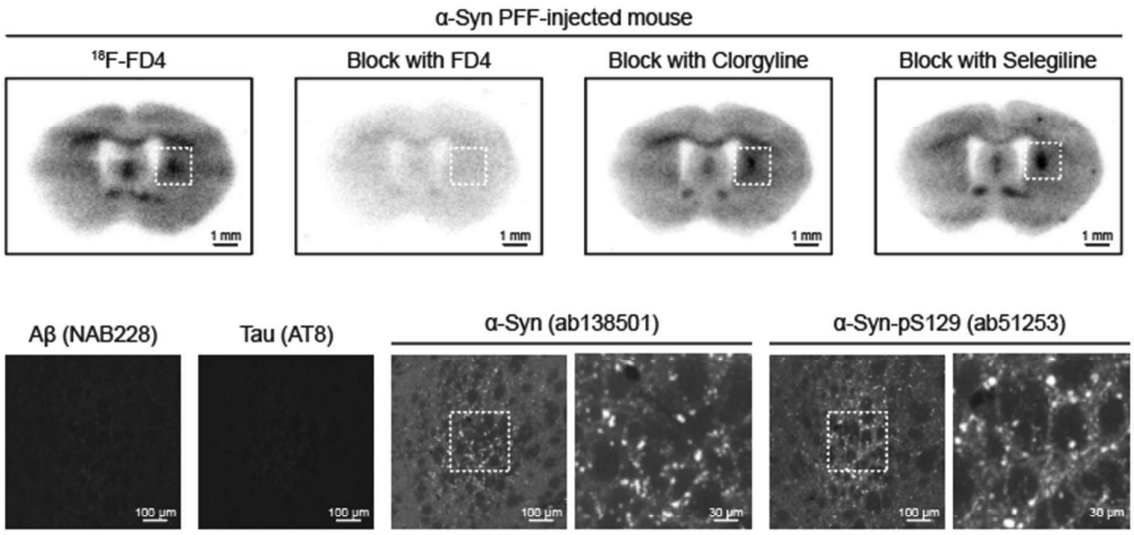

α-Syn PFF-injected mouse
^{18}F-FD4
Block with FD4
Block with Clorgyline
Block with Selegiline
1 mm
Aβ (NAB228)
Tau (AT8)
α-Syn (ab138501)
α-Syn-pS129 (ab51253)
100 μm
30 μm

Fig. 5A

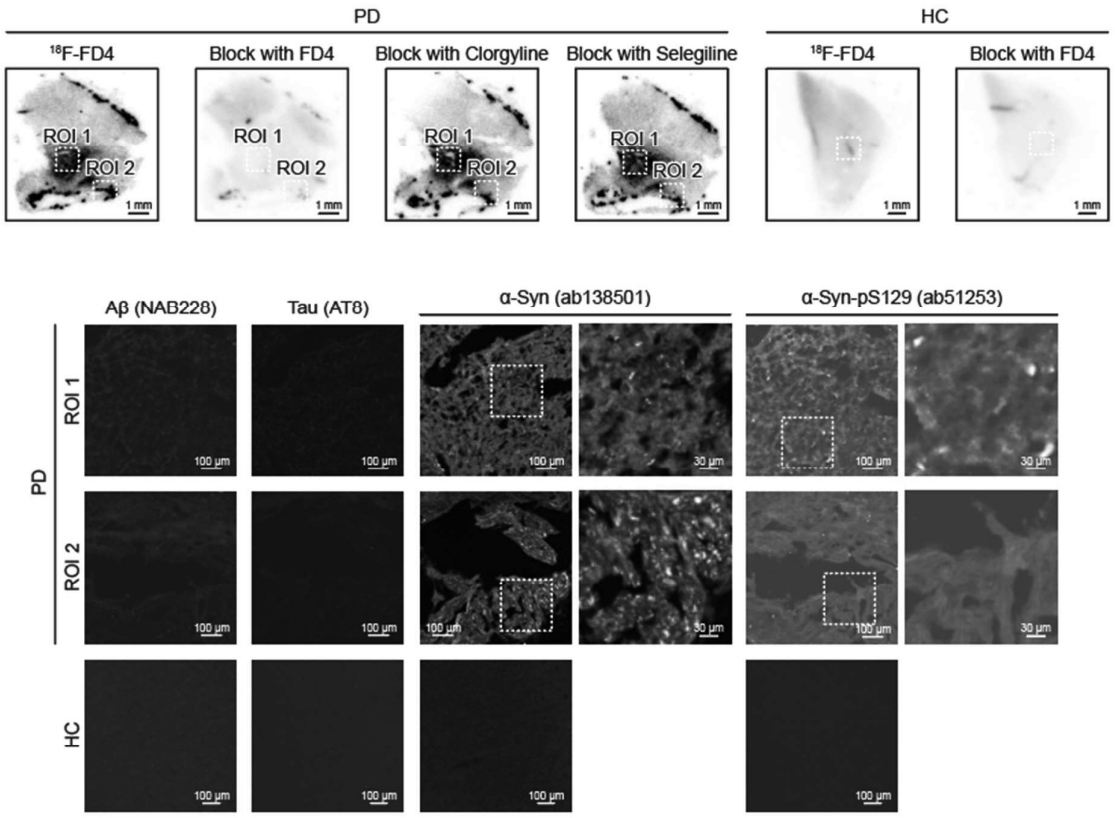

PD
HC
^{18}F-FD4
Block with FD4
Block with Clorgyline
Block with Selegiline
ROI 1
ROI 2
1 mm
Aβ (NAB228)
Tau (AT8)
α-Syn (ab138501)
α-Syn-pS129 (ab51253)
100 μm
30 μm

Fig. 5B

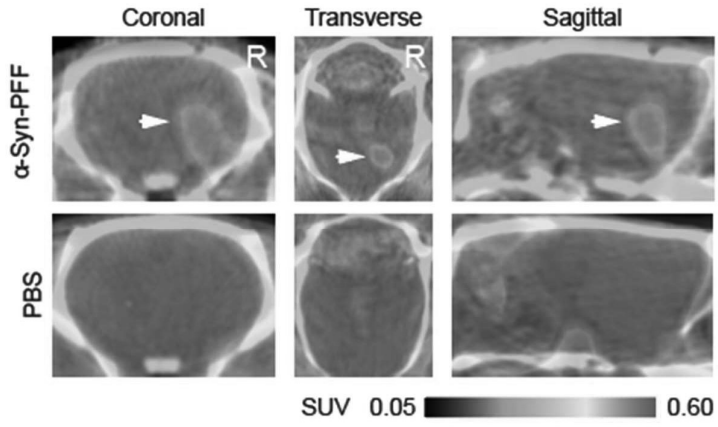

Coronal
Transverse
Sagittal
α-Syn-PFF
PBS
R
R
SUV 0.05 0.60

Fig. 6A

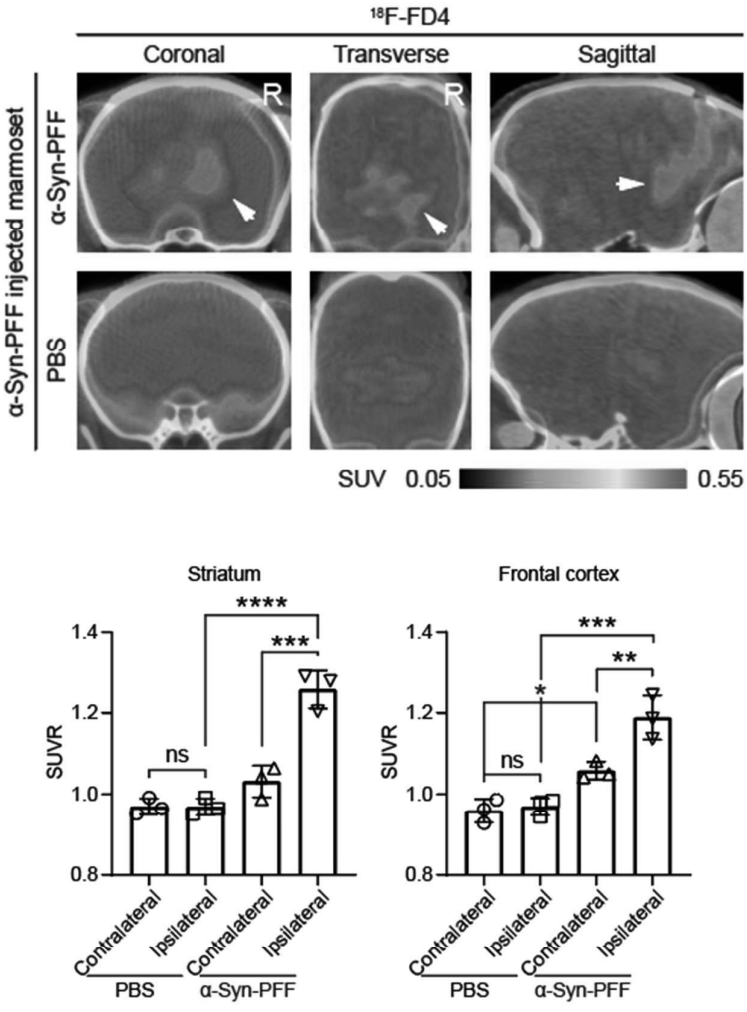

18F-FD4
Coronal
Transverse
Sagittal
α-Syn-PFF injected marmoset
α-Syn-PFF
PBS
R
R
SUV 0.05 0.55
Striatum
Frontal cortex
SUVR
1.4
1.2
1.0
0.8
****
***
ns
*
**
Contralateral
Ipsilateral
Contralateral
Ipsilateral
PBS
α-Syn-PFF

Fig. 6B

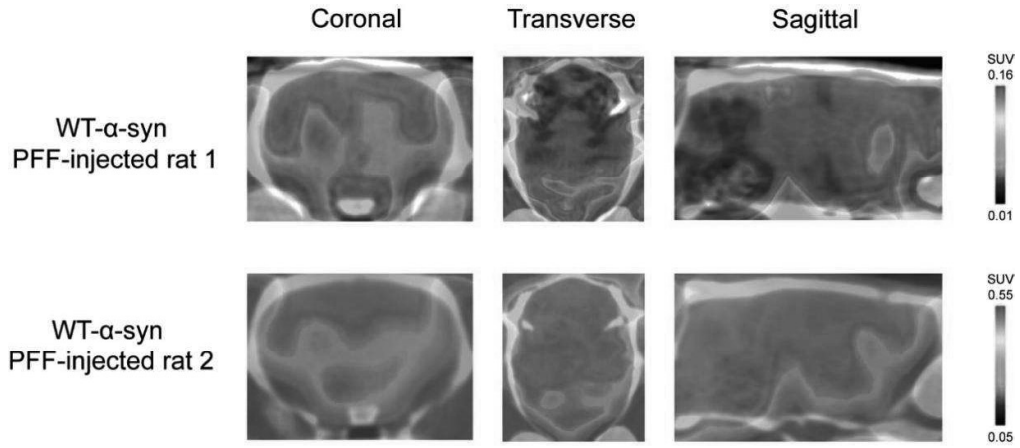

Coronal
Transverse
Sagittal
WT-α-syn
PFF-injected rat 1
SUV
0.16
0.01
WT-α-syn
PFF-injected rat 2
SUV
0.55
0.05

Fig. 6C

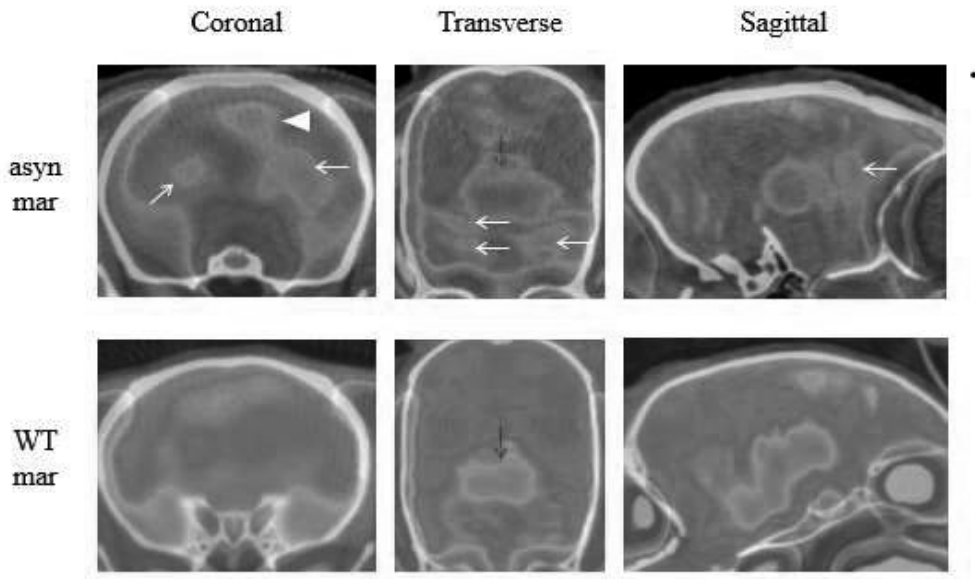

Coronal
Transverse
Sagittal
asyn
mar
WT
mar

Fig. 6D

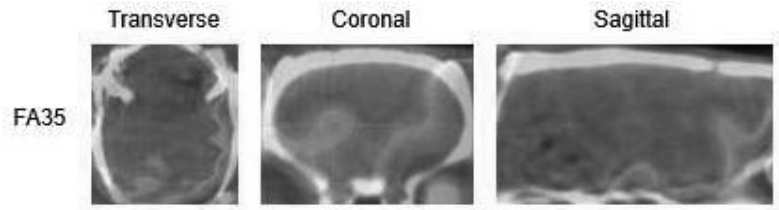


Fig. 6E

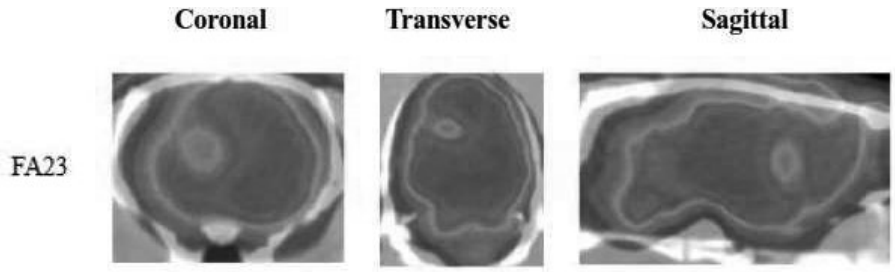


Fig. 6F

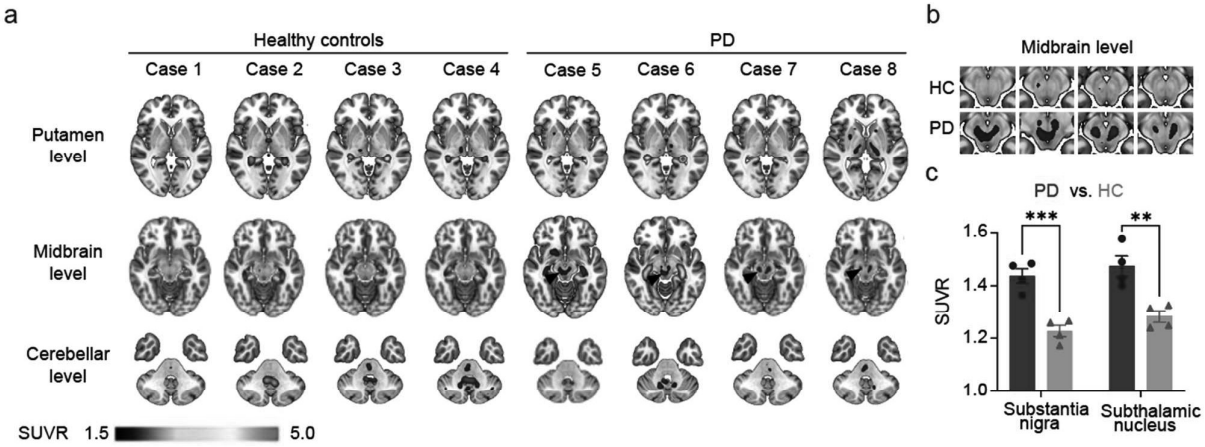


Fig. 7

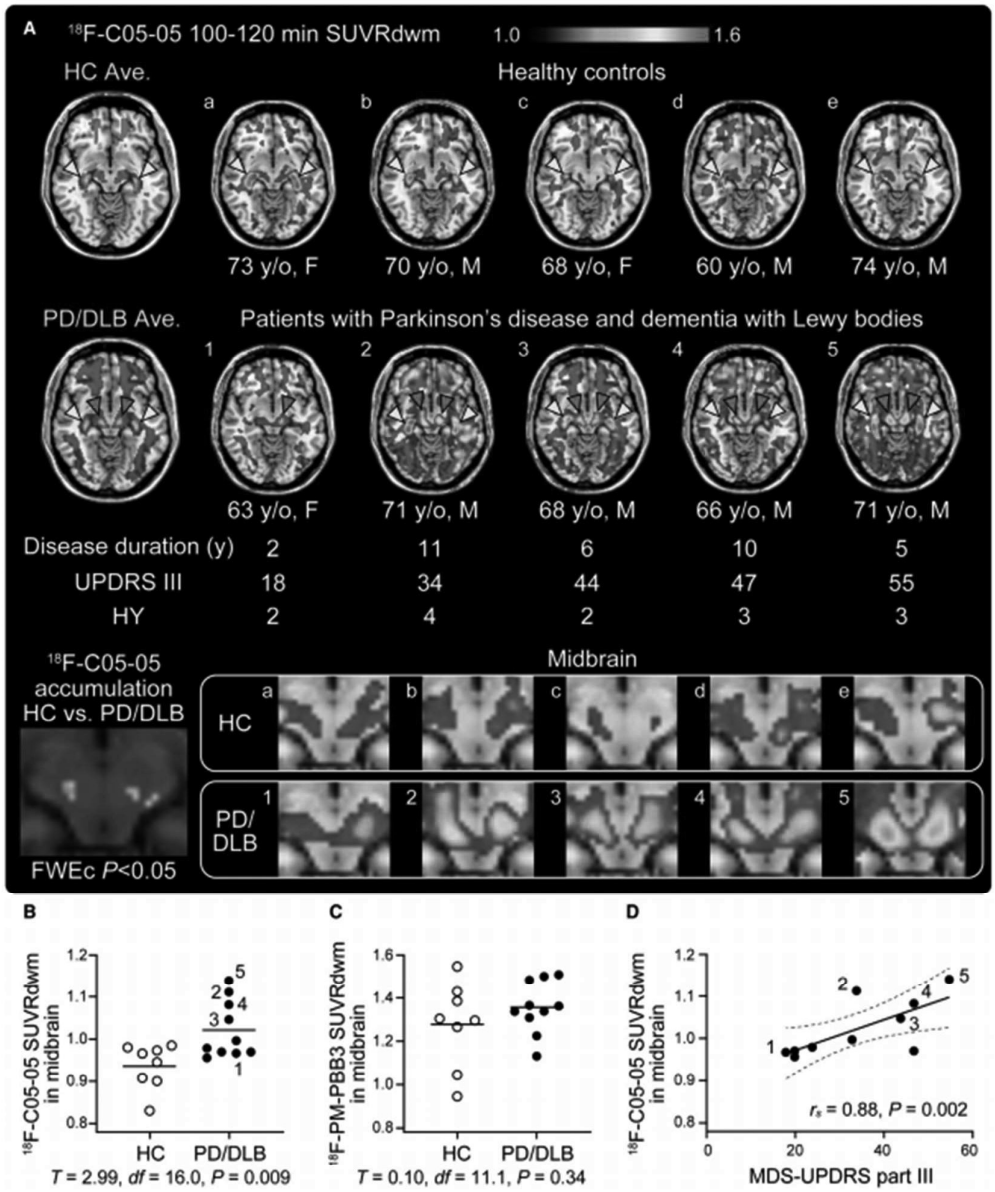

A
18F-C05-05 100-120 min SUVRdwm
1.0
1.6
HC Ave.
Healthy controls
a
b
c
d
e
73 y/o, F
70 y/o, M
68 y/o, F
60 y/o, M
74 y/o, M
PD/DLB Ave.
Patients with Parkinson's disease and dementia with Lewy bodies
1
2
3
4
5
63 y/o, F
71 y/o, M
68 y/o, M
66 y/o, M
71 y/o, M
Disease duration (y) 2 11 6 10 5
UPDRS III 18 34 44 47 55
HY 2 4 2 3 3
18F-C05-05 accumulation HC vs. PD/DLB
FWEc P<0.05
Midbrain
HC
PD/ DLB
B
18F-C05-05 SUVRdwm in midbrain
HC
PD/DLB
T = 2.99, df = 16.0, P = 0.009
C
18F-PM-PBB3 SUVRdwm in midbrain
HC
PD/DLB
T = 0.10, df = 11.1, P = 0.34
D
18F-C05-05 SUVRdwm in midbrain
rs = 0.88, P = 0.002
MDS-UPDRS part III

Fig. 8