

## Deletion of *Herpud1* enhances heme oxygenase-1 expression in a mouse model of Parkinson's disease

### Supplementary FIGURE LEGENDS

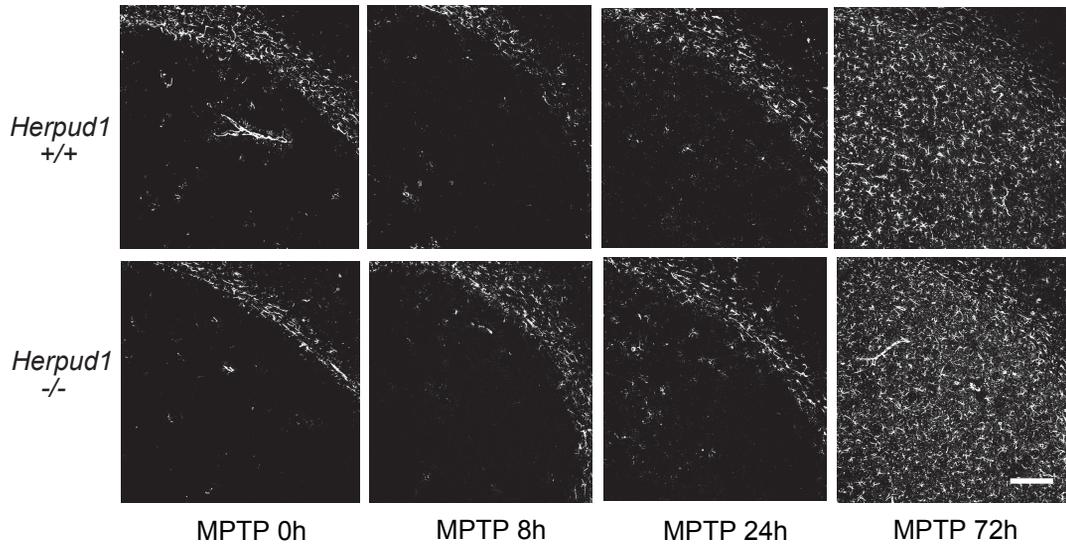
Figure S1. Astroglial activation in the CPu and HO-1 expression in the SNpc.

*Herpud1*<sup>+/+</sup> and *Herpud1*<sup>-/-</sup> mice were injected with MPTP and perfused with 4% paraformaldehyde at the indicated times. Brain sections, including sections with the CPu (A) or SNpc (B), were subjected to immunohistochemistry with the indicated antibodies. Arrows and arrowheads indicate HO-1 expression in the TH-positive dopaminergic neurons and astrocyte-like cells after MPTP administration, respectively. Scale bars = 150 $\mu$ m (A), 30 $\mu$ m (B).

Figure S2. Gene expression associated with protein degradation after MPTP administration.

*Herpud1*<sup>+/+</sup> and *Herpud1*<sup>-/-</sup> mice were injected with MPTP and protein samples (30  $\mu$ g) extracted from the CPu were subjected to western blotting with anti- Ub (A), anti- $\alpha$ -synuclein (B) and anti-LC3 (C) antibodies.

A



B

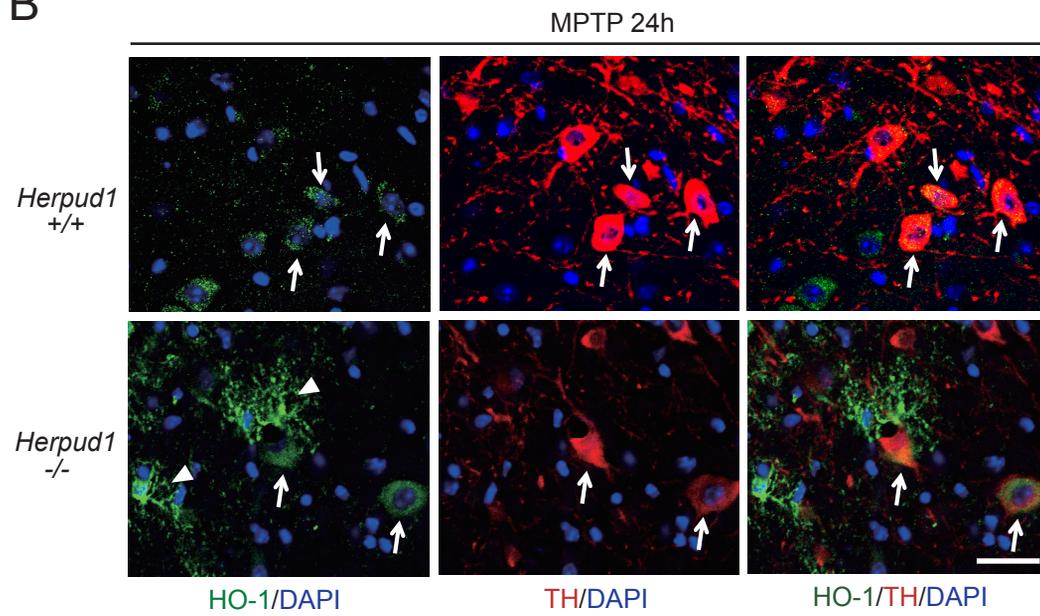


Fig.S1

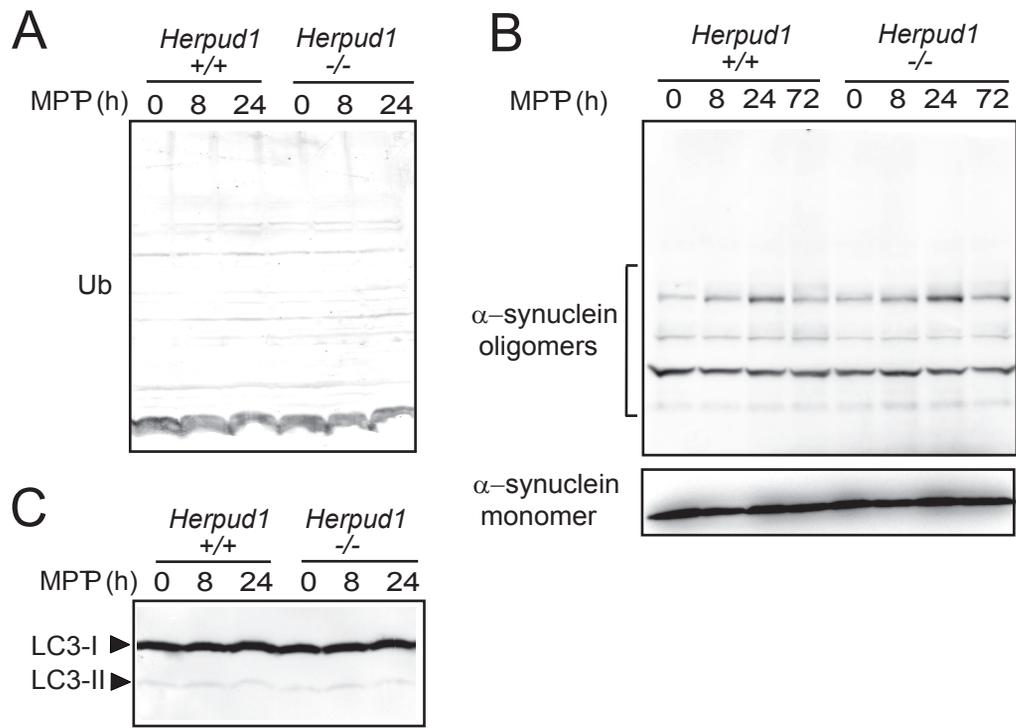


Fig.S2

<b>Potein</b>	<b>Gene</b>	<b>Forward</b>	<b>Reverse</b>
Herp	<i>Herpud1</i>	AGAACATCTctAGGCCTGAG	TGCCTTGCATAGATCTGCTG
HO-1	<i>Hmox1</i>	AGGAGCTGCACCGAAGGGCTG	TCATCTCCAGAGTGTTTCATGC
Nrf2	<i>Nfe2l2</i>	GATCCGCCAGCTACTCCCAGGTTG	CAGGGCAAGCGACTCATGGTCATC
GRP78	<i>Hspa5</i>	ATGGTATTCTCCGAGTGACA	ATGGTATTCTCCGAGTGACA
$\beta$ -actin	<i>Actb</i>	TGTGATGGTGGGAATGGGTCAGAA	TGTGGTGCCAGATCTTCTCCATGT

**Supplemental Table1**