

**Supplementary Table 2. Primary antibodies used in this study**

<b>Antibody</b>	<b>Species</b>	<b>Source</b>	<b>Ref.-No.</b>	<b>RRID</b>	<b>WB Dilution</b>	<b>IF Dilution</b>
$\beta$ -Actin	Mouse	Cell Signaling	3700	AB_2242334	1:100 000	-
DCX	Guinea Pig	Millipore	AB2253	AB_1586992	-	1:400
FOXA2	Mouse	Santa Cruz	sc-101060	AB_1124660	-	1:250
GBA	Mouse	Abnova	H00002629-M01	AB_1505986	-	1:500
GBA	Rabbit	Sigma	G4171	AB_1078958	1:500	-
HPIg	Rabbit	Cell Signaling	2619S	AB_2070984	-	1:200
Ki67	Mouse	BD Biosciences	550609	AB_393778	-	1:200
LAMP1	Mouse	Abcam	ab25630	AB_470708	-	1:400
LaminB1	Rabbit	Abcam	ab16048	AB_443298	-	1:200
LC3	Rabbit	MBL	PM036	AB_2274121	1:1000	1:1000
MAP2	Rabbit	Abcam	ab32454	AB_2138147	-	1:100
MAP2	Mouse	Millipore	MAB3418	AB_94856	-	1:200
MAP2	Chicken	Abcam	ab92434	AB_2138147	-	1:1000
Nestin	Mouse	Millipore	MAB5326	AB_2251134	-	1:100
Pax6	Rabbit	Covance	PRB-278P	AB_291612	-	1:300
P62 (SQSTM1)	Mouse	Abcam	ab56416	AB_945626	1:500	-
Sox2	Goat	R&D Systems	AF2018	AB_355110	-	1:100
Sox2	Rabbit	Abcam	ab97959	AB_2341193	1:500	-
TH	Rabbit	Santa Cruz	sc-14007	AB_671397	1:1000	-
TH	Rabbit	Abcam	ab112	AB_297840	-	1:1000
Tom20	Mouse	Santa Cruz	sc-17764	AB_628381	1:500	-
TUJ1	Chicken	Millipore	AB9354	AB_570918	-	1:600
TUJ1	Mouse	BioLegend	801201	AB_2313773	1: 50 000	-
VDAC	Rabbit	Cell Signaling	4661	AB_10557420	1:1000	-