

SUPPLEMENTAL FIGURES & TABLE FOR:

Spatiotemporal loss of *NF1* in Schwann cell lineage leads to different types of cutaneous neurofibroma susceptible to modification by the Hippo pathway

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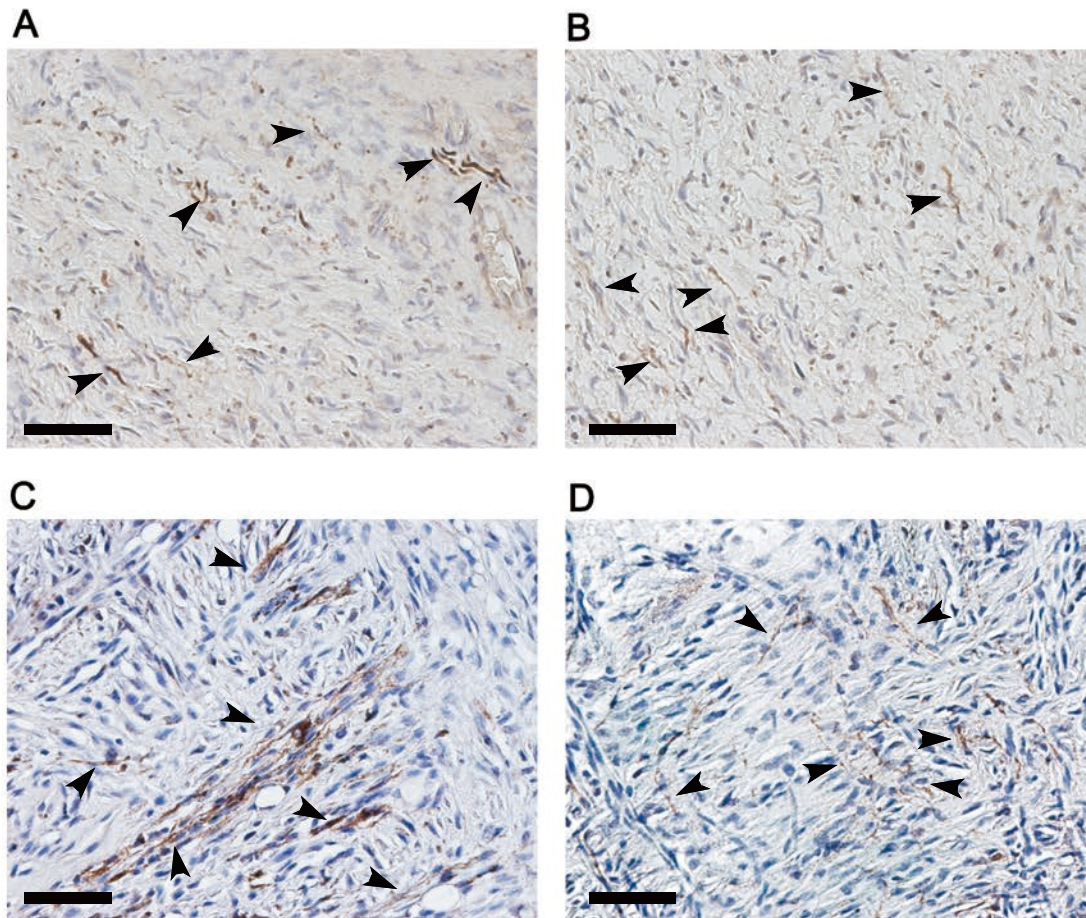
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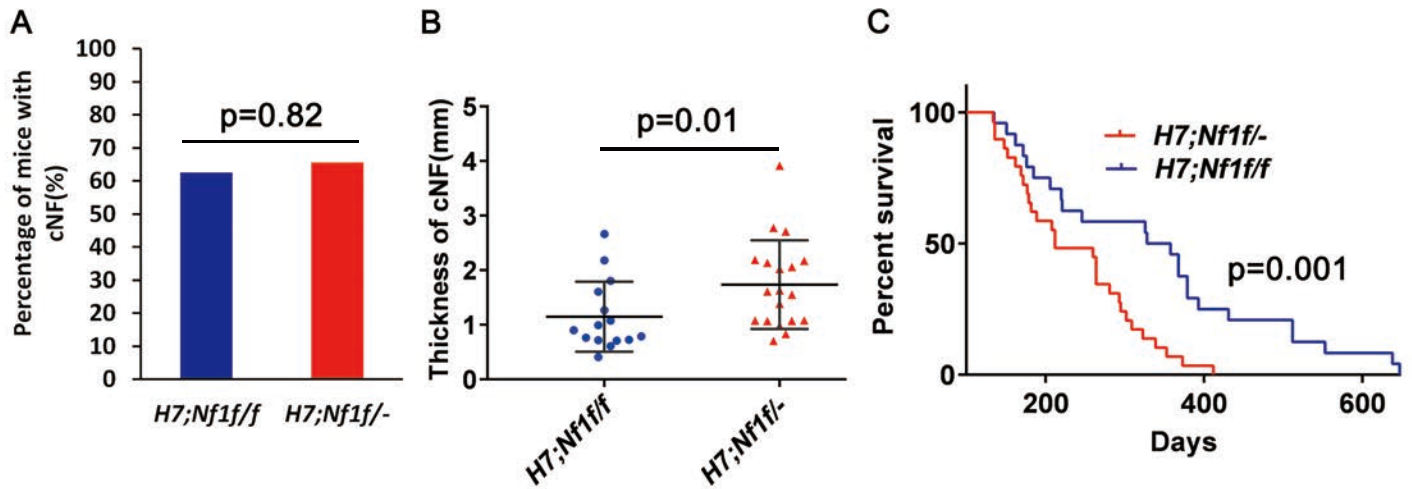
The authors declare no potential conflicts of interest

Supplemental Figure 1



Supplemental Figure 1. The expression of beta-III-Tubulin in human and mouse cNF. (A and B) The expression of beta-III-Tubulin (neuron marker) in human cNF. (C and D) The expression of beta-III-Tubulin in mouse cNF. Arrow head = nerve fiber. Scale bar = 50 μ m.

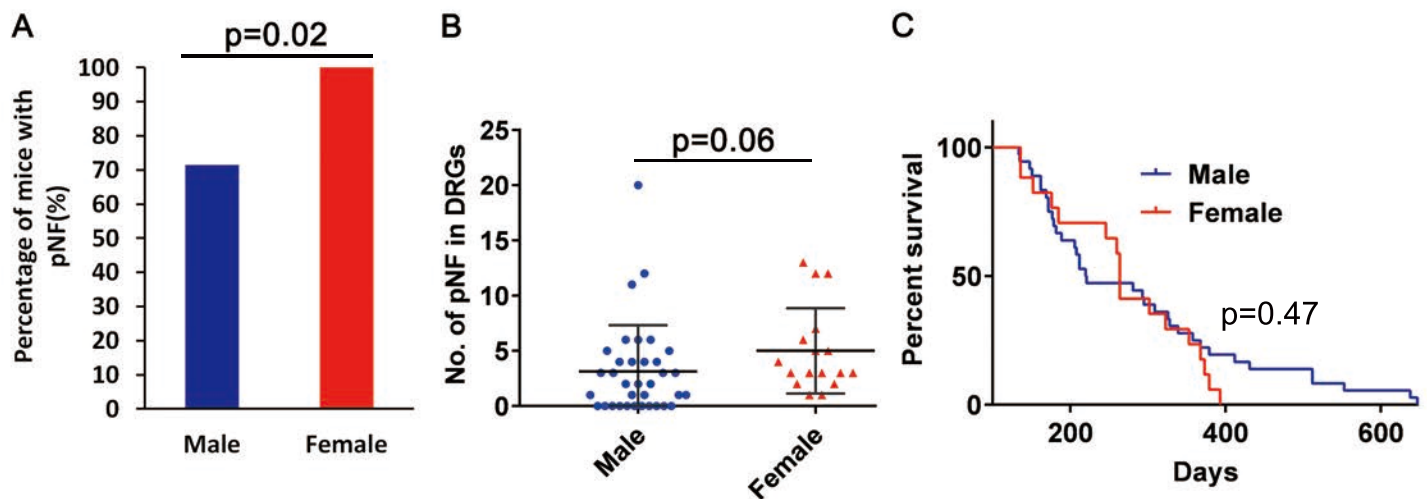
Supplemental Figure 2



Supplemental Figure 2. Prevalance of cNF and survival analysis of *H7;Nf1f/f* and *H7;Nf1f/-* in both of *H7;Nf1mut* and *H7;Nf1mut;Lats1/2mut* mice.

(A). Percentage of mice with cNF in *H7;Nf1f/f* and *H7;Nf1f/-*. 15 of 24 (62.5%) mice developed cNF in *H7;Nf1f/f*, and 19 of 29 (65.5%) mice developed cNF in *H7;Nf1f/-*. (B). Thickness of cNF developed in *H7;Nf1f/f* and *H7;Nf1f/-* mice. (C). Survival analysis in *H7;Nf1f/f* and *H7;Nf1f/-* mice.

Supplemental Figure 3



Supplemental Figure 3. Prevalance of pNF and survival analysis of male and female in both of *H7;Nf1mut* and *H7;Nf1mut;Lats1/2mut* mice.

(A). Percentage of mice with pNF in male and female. 25 of 35 (71.4%) mice developed pNF in male, and 17 of 17 (100%) mice developed pNF in female. (B). No. of pNF developed in DRGs in male and female mice. (C). Survival analysis in male and female mice.

Supplemental Table 1. Genotype and phenotype of *H7;Nf1mut* and control mice

Sex	Life Span (days)	pNF No. in DRG	SN Thk (mm) L	SN Thk (mm) R	cNF (Y:Yes; N:No)	cNF Thk (mm)	Location of cNF	Sex	Life Span (days)	pNF No. in DRG	SN Thk (mm) L	SN Thk (mm) R	cNF (Y:Yes; N:No)	cNF Thk (mm)	Location of cNF
Genotype: <i>Hoxb7-Cre;Nf1^{-/-}</i>								Genotype: <i>Hoxb7-Cre;Nf1mut;Lats1^{f/+};Lats2^{f/+}</i>							
F	264	1	0.5	0.5	N	N/A	N/A	M	151	1	0.6	0.9	N	N/A	N/A
F	264	3	0.6	0.6	N	N/A	N/A	F	152	12	1.2	1.2	Y	1.08	H&N, U
F	264	3	0.7	0.5	N	N/A	N/A	M	162	1	0.6	0.6	Y	0.73	H&N, U,B
M	212	4	0.7	0.6	Y	0.71	H&N	M	179	3	0.5	0.5	Y	2.02	H&N
M	212	3	0.6	0.6	N	N/A	N/A	M	182	1	0.9	0.8	Y	2.19	H&N
M	169	0	0.5	0.6	Y	1.55	H&N	M	208	6	1.6	1.4	Y	1.39	H&N
F	136	1	0.6	0.6	Y	1.08	H&N	M	221	12	1	1	Y	0.79	H&N, U
F	136	4	0.6	0.6	Y	0.98	H&N,U	M	281	1	0.6	0.6	N	N/A	N/A
M	309	0	0.7	0.7	Y	0.83	H&N	M	293	0	0.6	0.7	Y	3.91	H&N
Genotype: <i>Hoxb7-Cre;Nf1^{ff}</i>								F	323	13	0.7	0.8	N	N/A	N/A
F	185	3	0.6	0.5	Y	1.81	H&N	M	328	20	0.7	0.7	N	N/A	N/A
M	688	0	0.6	0.5	Y	0.76	U	F	353	5	2	0.8	N	N/A	N/A
F	393	6	0.5	0.5	N	N/A	N/A	F	379	2	0.7	0.7	N	N/A	N/A
M	638	5	0.5	0.5	Y	1.08	H&N,U	M	412	6	0.9	1	Y	2.71	H&N, U
M	553	0	0.6	0.6	N	N/A	N/A	M	206	0	0.7	0.6	Y	2.66	H&N, U,B
M	135	N.A.	N.A.	N.A.	Y	2.18	H&N	Genotype: <i>Hoxb7-Cre;Lats1^{ff};Lats2^{+/+ a}</i>							
M	431	1	0.6	0.5	Y	0.71	H&N	F	522	0	0.6	0.5	N	N/A	N/A
M	220	0	0.7	0.6	Y	0.41	H&N,U	F	489	0	0.6	0.6	N	N/A	N/A
F	246	2	0.5	0.5	Y	1.61	H&N,U	M	647	0	0.8	0.7	N	N/A	N/A
M	512	0	0.6	0.6	Y	0.72	H&N,U	M	647	0	0.6	0.6	N	N/A	N/A
M	512	4	0.5	0.6	N	N/A	N/A	M	647	0	0.5	0.5	N	N/A	N/A
M	379	0	0.6	0.6	Y	0.90	H&N	M	647	0	0.6	0.7	N	N/A	N/A
M	358	5	0.6	0.5	N	N/A	N/A	M	544	0	0.6	0.6	N	N/A	N/A
F	368	3	0.7	0.5	Y	0.99	H&N,U	M	544	0	0.6	0.5	N	N/A	N/A
M	368	3	0.7	0.6	N	N/A	N/A	Genotype: <i>Hoxb7-Cre;Lats1^{+/+};Lats2^{ff a}</i>							
M	326	0	0.6	0.6	Y	0.61	H&N	M	534	0	0.6	0.6	N	N/A	N/A
Genotype: <i>Hoxb7-Cre;Nf1mut;Lats1^{ff};Lats2^{+/+}</i>								F	579	0	0.6	0.6	N	N/A	N/A
M	134	6	0.8	0.8	N	N/A	N/A	M	579	0	0.6	0.7	N	N/A	N/A
F	176	3	0.5	0.5	N	N/A	N/A	M	424	0	0.6	0.7	N	N/A	N/A
M	177	2	0.7	0.6	Y	1.07	H&N	M	390	0	0.8	0.6	N	N/A	N/A
M	189	2	1.4	1.5	Y	1.07	H&N	M	390	0	0.6	0.6	N	N/A	N/A
M	295	3	0.9	0.6	Y	2.06	H&N, U	F	390	0	0.6	0.7	N	N/A	N/A
Genotype: <i>Hoxb7-Cre;Nf1mut;Lats1^{+/+};Lats2^{ff}</i>								F	390	0	0.6	0.6	N	N/A	N/A
M	148	4	1.5	1.2	Y	2.78	H&N, U	M	341	0	0.6	0.7	N	N/A	N/A
M	162	0	0.7	0.7	Y	2.14	H&N, U,B	F	357	0	0.7	0.8	N	N/A	N/A
M	172	4	0.9	0.8	Y	1.27	H&N	Genotype: <i>Hoxb7-Cre;Lats1^{f/+};Lats2^{f/+ a}</i>							
M	172	11	1.6	1.9	Y	1.61	H&N	M	534	0	0.6	0.6	N	N/A	N/A
F	260	7	0.6	0.5	N	N/A	N/A	M	534	0	0.6	0.6	N	N/A	N/A
M	339	2	0.5	0.5	N	N/A	N/A	F	288	0	0.6	0.6	N	N/A	N/A
F	373	12	0.8	0.7	Y	2.17	U	F	288	0	0.6	0.6	N	N/A	N/A
F	302	5	0.9	0.7	Y	1.63	H&N, U	F	288	0	0.6	0.6	N	N/A	N/A

Supplemental Table legend

Supplemental Table 1. Genotype and phenotype of *H7;Nf1mut* and control mice

Summaries of the sex, life span, number of para-spinal pNF, sciatic nerve thickness, presence of cNF, cNF thickness, location of cNF and genotypes.

F: Female. M: Male. No.: Number. SN: Sciatic Nerve. Thk: Thickness. mm: Millimeter. L: Left; R: right. N/A: Not applicable. N.A., Not Available. H&N: Head and Neck. U: Upper back. B: Bottom back. ^a: at end of study, mice look normal and none of the mice show any sign of skin lesion or paralysis. Bold and italic: mice genotype.