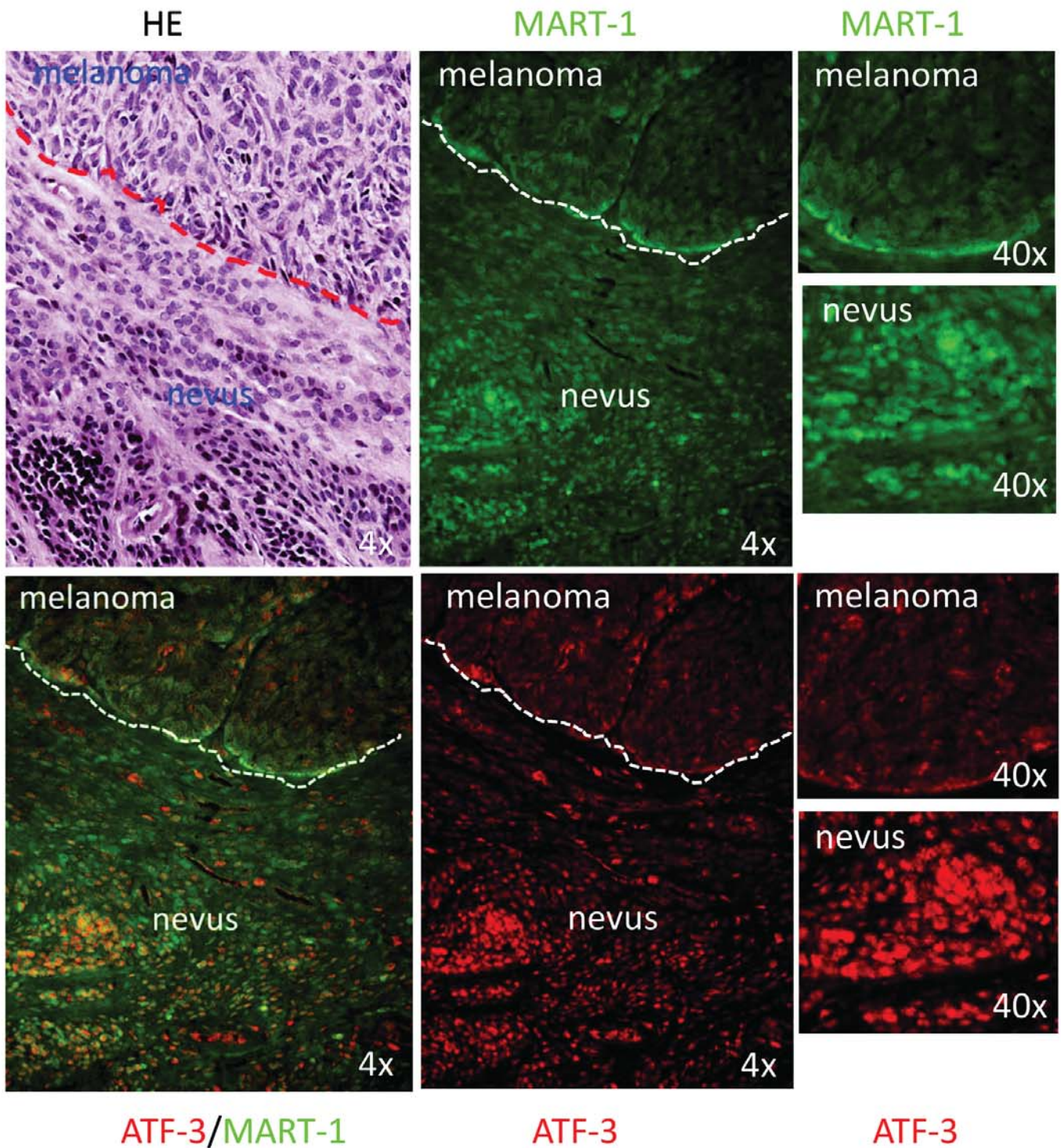
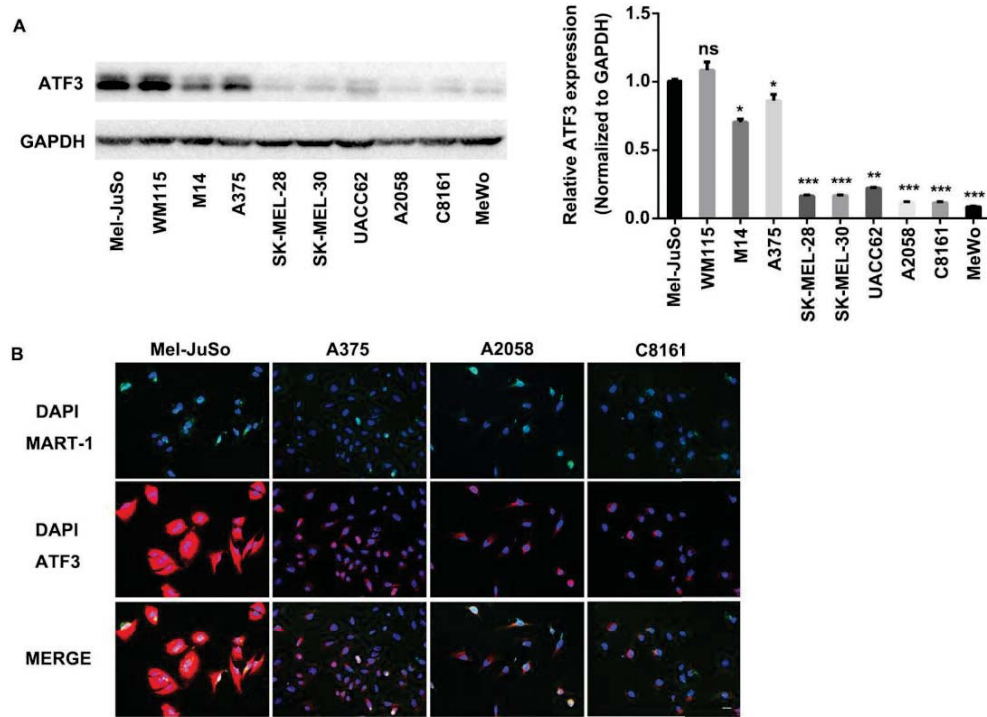


Supplementary Table 1: Gene-specific primers for RT-PCR

Gene	Species	Probe length (bp)	Primers (5' – 3')
ATF-3	Human	118	For: GTCCATCACAAAAGCCGAGG Rev: GCACTCCGTCTTCTCCTTCT
H36B4	Human	142	For: GCAATGTTGCCAGTGTCTGT Rev: GCCTTGACCTTTTCAGCAAG

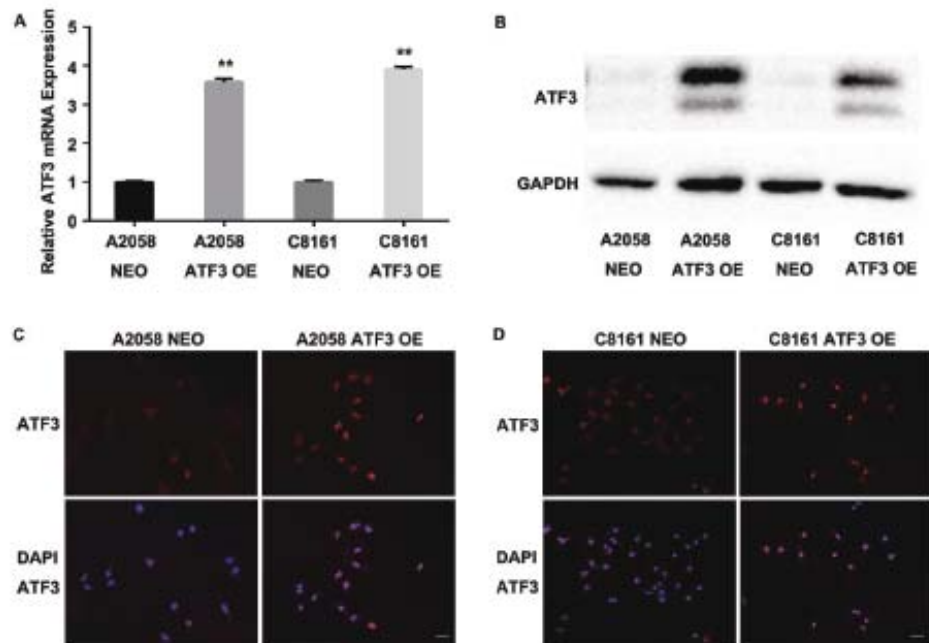


Supplementary Figure 1. Significant decrease of ATF-3 immunoreactivity in the melanoma component in comparison to the adjacent dermal nevus. Representative IF images of double staining of ATF-3 (red) and MART-1 (green) in human melanocytic specimens of melanoma arising in nevus are shown. Strong nuclear positivity of ATF-3 (red) present in the melanoma component in comparison to the adjacent dermal nevus.



Supplementary Figure 2. ATF3 expression decreased in melanoma cell lines.

(A) Immunoblotting analysis of ATF3 expressions in melanoma cell lines. The column summarized the relative ATF3 protein expression in melanoma cell lines normalized to GAPDH. (B) Representative images of ATF3 immunofluorescence double staining in melanoma cell lines. Scale bar represent 20 μ m. Data are presented as the mean \pm standard deviation, * P < 0.05, **P < 0.01, ***P < 0.001.



Supplementary Figure 3. ATF3 over-expression in melanoma cell lines.

(A) qRT-PCR and (B) immunoblotting analysis of ATF3 over-expressions in A2058 and C8161 melanoma cell lines. (C) and (D) Representative images of ATF3 immunofluorescence staining in ATF3 over-expressed A2058 and C8161 cell lines. Scale bar represent 50 μ m. Data are presented as the mean \pm standard deviation, **P < 0.01; NEO, neomycin ; OE, over expression.