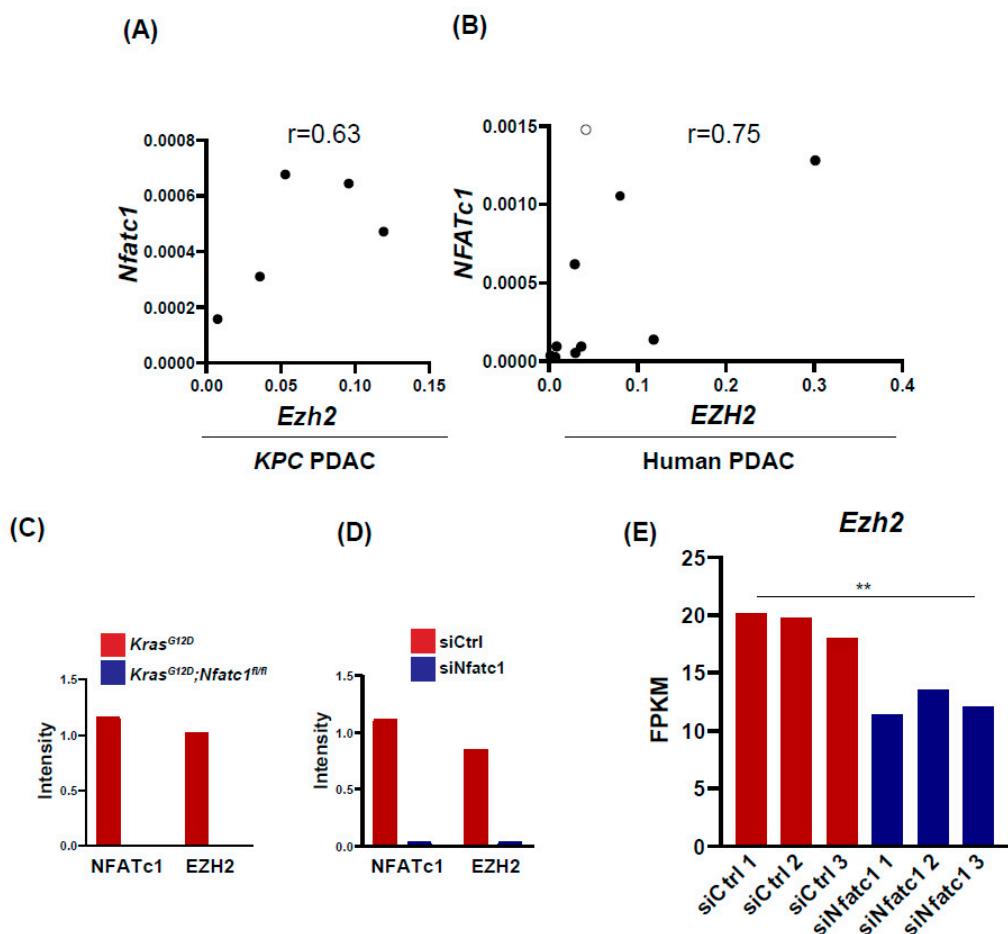
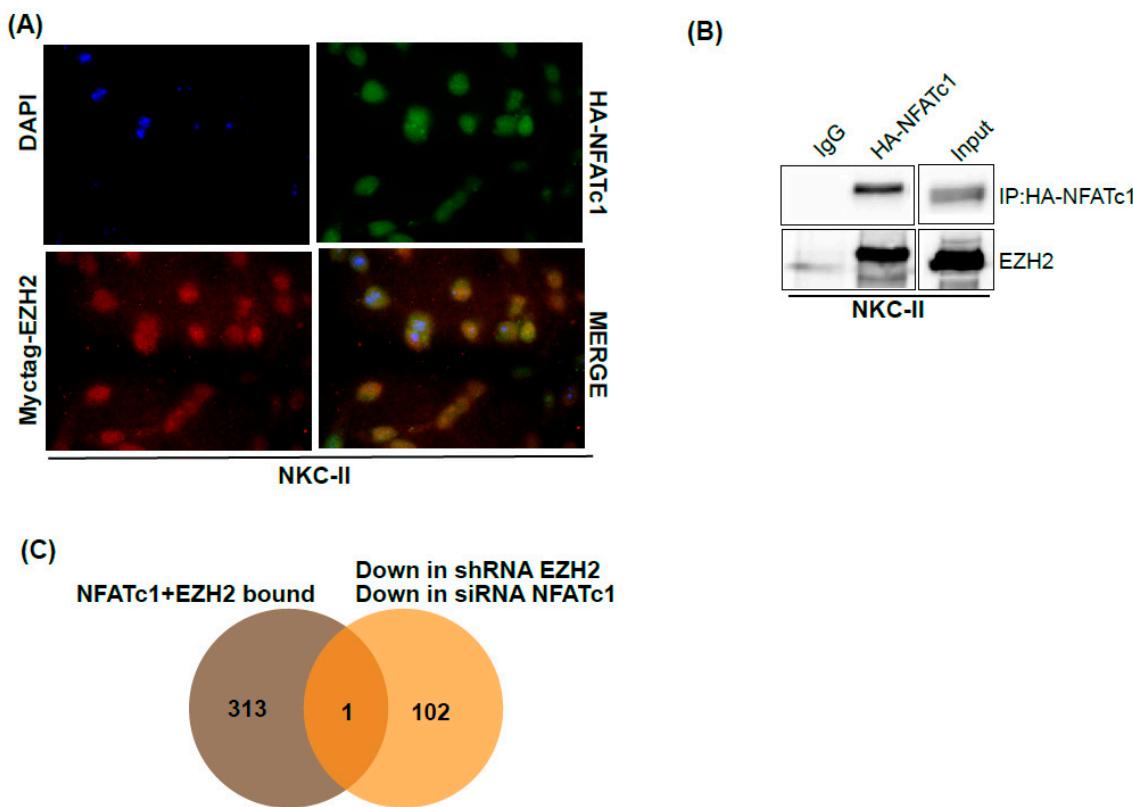


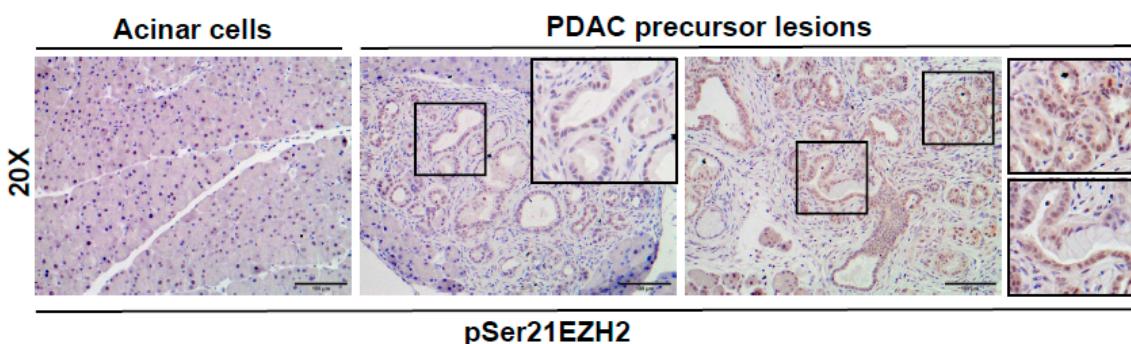
## Supplementary Materials



**Figure S1.** **(A,B)** Correlation plots of *NFATc1*- and *EZH2* mRNA expression in *KPC* (A) and human (B) PDAC (corresponding to Figures 1D,E). The pearson correlation coefficient 'r' is depicted in the figures. **(C,D)** Densitometry of *NFATc1* and *EZH2* expression upon *NFATc1* knockdown (referring to Western Blot analysis depicted in Figure 2B and E, respectively). The densitometry is representative for 3 biological replicates. **(E)** FPKM values of *Ezh2* as identified in the triplicates of siRNA control (siCtrl) and siRNA *NFATc1* (siNfatc1) RNA-seq samples [19].



**Figure S2.** (A) Co-Immunofluorescence of HA-NFATc1 and Myctag-EZH2 upon overexpression of EZH2 wt in NKC-II cells. (B) Nuclear lysates obtained from NKC-II cells were subjected to HA-NFATc1 IP. Western Blot analysis confirms interaction with EZH2. (C) Overlay of NFATc1- and EZH2 bound genes with the 103 genes down-regulated upon NFATc1- and EZH2 knockdown ( $\log_{2}FC > 0.5$ ,  $q$  value  $< 0.1$ ).



**Figure S3.** Immunohistochemical analysis of pSerEZH2 expression in 4- and 12-week old *Kras*<sup>G12D</sup> mice harboring normal pancreatic tissue or ADM and PanIN lesions. Representative pictures of 3 mice/age. Scale bar: 100  $\mu$ m.

**Table S1.** qPCR primer sequences.

Gene	Sequence	Species
<i>Ezh2</i> FP	CAACCCGAAAGGGCAACAAA	Mouse
<i>Ezh2</i> RP	ACCAGTCTGGATAGCCCTCT	Mouse
<i>Nfatc1</i> FP	GCCTTTGCGAGCAGTAT	Mouse
<i>Nfatc1</i> RP	GCTGCCTTCCGTCTCAT	Mouse
<i>RPLP0</i> FP	TGGGCAAGAACACCATGATG	Mouse/Human
<i>RPLP0</i> RP	AGTTTCTCCAGAGCTGGTTGT	Mouse/Human
<i>EZH2</i> FP	AAAGAAACTACCGAACAGCA	Human
<i>EZH2</i> RP	CAGAAAAGCGTATGAAAGGAGTG	Human
<i>NFATC1</i> FP	GTTCCTACCCCACAGTCATTAG	Human
<i>NFATC1</i> RP	CCCGCAGGTAATACTCCTTTG	Human

**Table S2.** Primary and secondary antibodies utilized for Western Blot analysis.

Antibody	Company	Dilution
EZH2	Cell Signaling #5246	1:1000
pSer21EZH2	Bethyl IHC-00388	1:1000
NFATC1	Santa Cruz sc-7294	1:500
HA	Cell Signaling #2367	1:1000
Myctag	Cell Signaling #2272S	1:1000
ACTIN-HRP	Sigma	1:40000
Anti-rabbit (IgG) HRP	Cell Signaling #7076	1:10000
Anti-mouse (IgG) HRP	Cell Signaling #7074	1:10000

**Table S3.** ChIP-seq primer sequences.

Gene	Sequence
<i>Ezh2</i> TSS FP	TCTGTCTCACAACTGAGGCACT
<i>Ezh2</i> TSS RP	TGTGGTAAGAAGGCATTATGTCA
<i>Ezh2</i> intragenic FP	ATGCCTTCTTACACAGTGACTT
<i>Ezh2</i> intragenic RP	CAGGGCACGAATTTCACCACAT