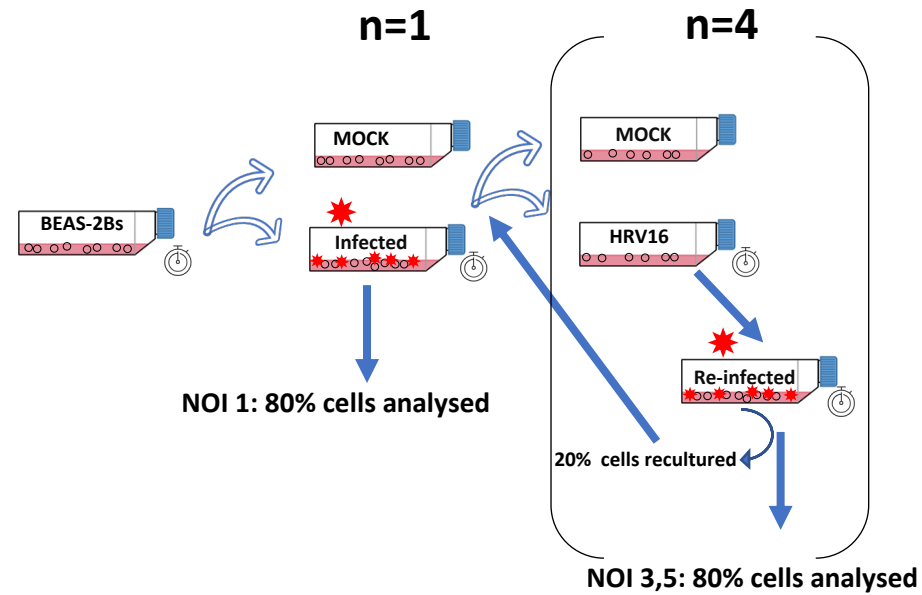



Supplement figure 1



 cells grown to 80% confluency

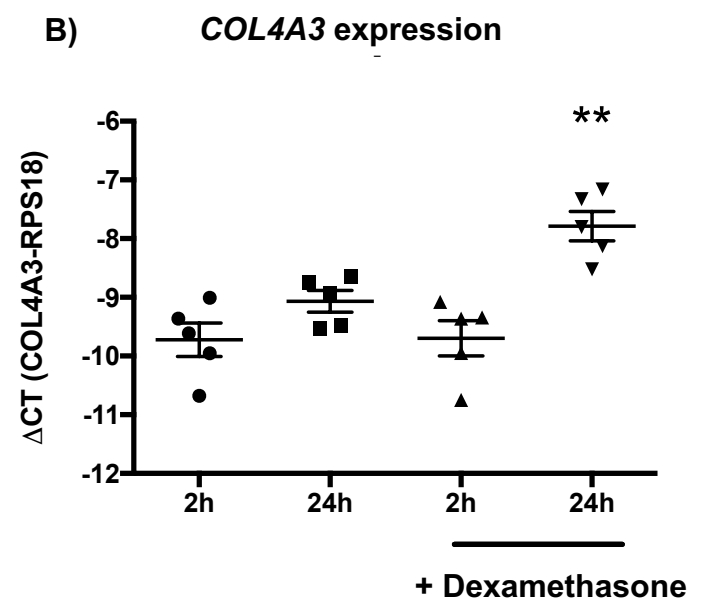
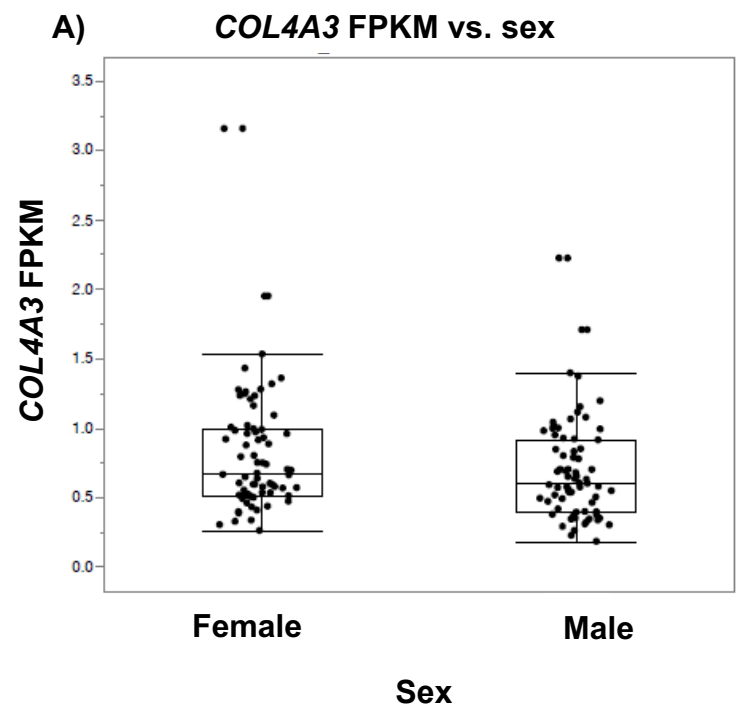
 HRV-16

MOCK - No virus

Schematic depicting *in vitro* experimental model of five consecutive infections of BEAS-2B cells with HRV- 16.

BEAS-2B cells were seeded at 2×10^6 per T25 flask and cultured until 80% confluent and were infected with HRV-16. Obtained infected cells were washed gently and split into two parts with 80% of cells for analysis and 20% re-seeded for following MOCK and HRV16 infections. This procedure was repeated for 5 times with 72 hours time interval between each infection. Samples were analysed after first, third and fifth infection (NOI:1,3,5).

Supplement figure 2

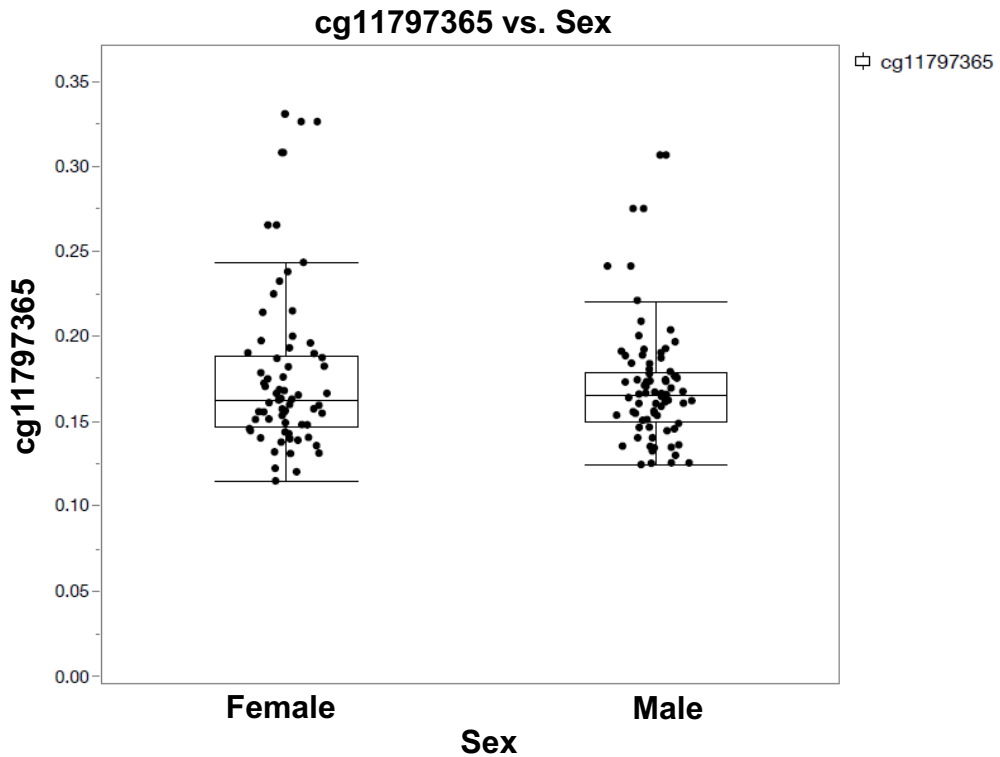


A) COL4A3 mRNA expression is independent of sex.

B) 100nM dexamethasone increases expression of COL4A3 in BEAS-2B after 24h in vitro. n=5 replicates. Mean±SEM, Kruskal-Wallis with Dunn's post-test, **p<0.01.

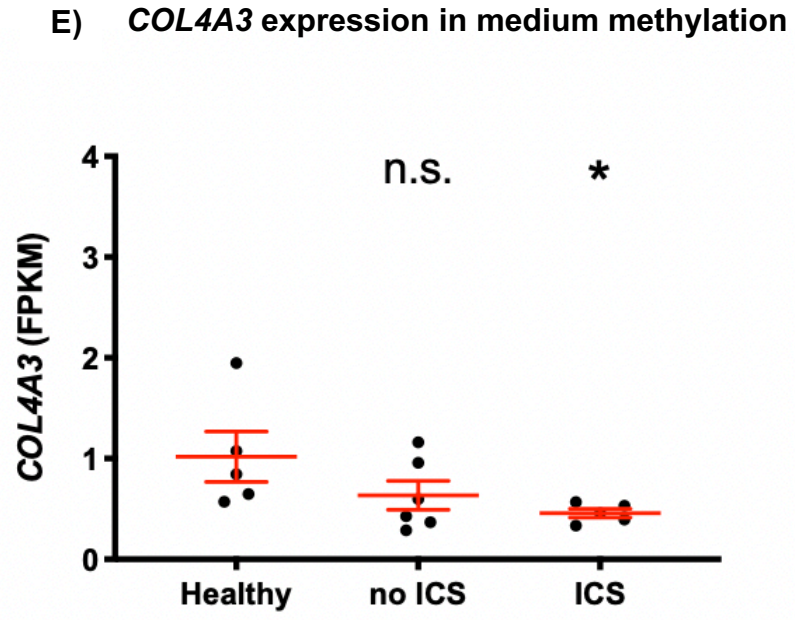
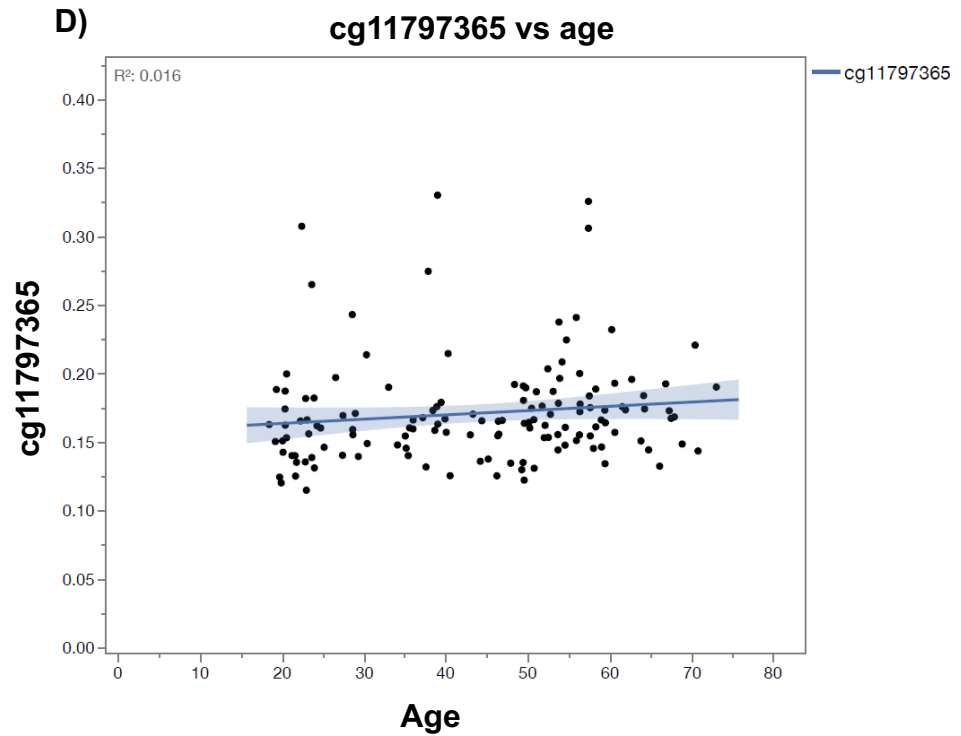
Supplement figure 2

C) cg11797365 vs. Sex



C) Level of cg11797365 methylation is not associated with sex of the patients

Supplement figure 2



D) Level of cg11797365 methylation (β -value) is not associated with age of the patients

E) COL4A3 expression in control and asthmatic subjects with medium methylation (β -value ≥ 0.2) $n_{\text{healthy}} = 5$, $n_{\text{no ICS users}} = 6$, $n_{\text{ICS users}} = 5$. (Mean \pm SEM, Kruskal-Wallis with Dunn's-post test * $p < 0.05$ compared to control subjects).

Supplement figure 3

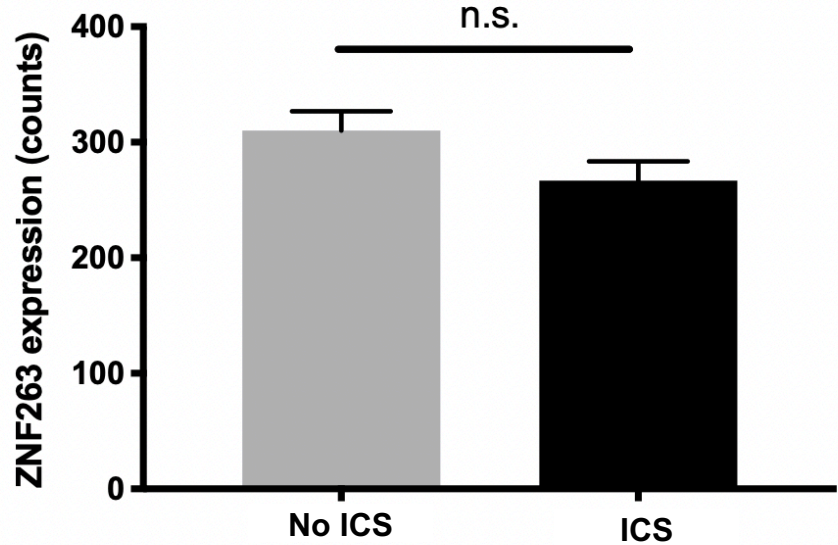


Figure 3: Impact of ICS on ZNF263 expression. (Mean±SD, unpaired t-test, n.s. $p > 0.05$).

Supplement figure 4

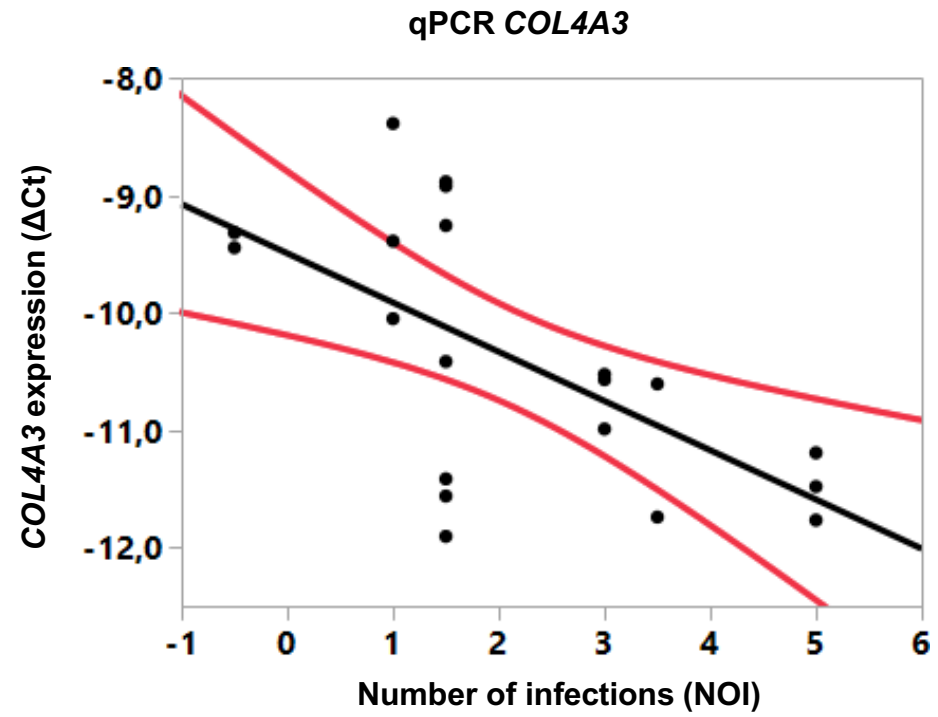


Figure 2: qPCR confirms a linear correlation between reduced *COL4A3* mRNA expression and NOI