E-cigarettes and vaping

Smoking is the number 1 cause of preventative death in the UK

E-cigarettes are a safer alternative to smoking, but still carry some of the associated risks

Nicotine
Methanol
Acetone
PAHs (benzo[a]pyrene)
Arsenic
Ammonia
Carbon monoxide
VOCs

Although we know a lot about the harmful chemicals present in cigarettes, less is known about e-cigarettes

What we do know, is that e-cigarettes are not created equal—those made from different materials are likely to contain different chemicals and levels of nicotine

Vaping at higher temperatures produces more VOCs

Nicotine levels in cigarettes and e-cigarettes

4mg/cigarette

Delivery matters—more nicotine absorption from smoking cigarettes

20mg/ml
Regulated

Nicotine e-fluid levels have no official upper limit in US/Canada - in Europe it is 20mg/ml

>50mg/ml
Not regulated

Vaping has been shown to be effective for quitting smoking tobacco
The risks for pregnant women are unknown
Public health advice now states anybody who does not smoke should not vape

References
Committee on toxicity - Statement on the potential toxicological risks from electronic nicotine (and non-nicotine) delivery systems (E(N)NDS - e-cigarettes) -