Supplementary Online Content

Hedman L, Backman H, Stridsman C, et al. Association of electronic cigarette use with smoking habits, demographic factors, and respiratory symptoms. *JAMA Netw Open*. 2018;1(3):e180789. doi:10.1001/jamanetworkopen.2018.0789

- **eTable 1.** Long-standing Cough in Relation to Smoking Habits and E-Cigarette Use, Analyzed by Logistic Regression, Presented as Unadjusted and Adjusted for Sex, Age Group, Educational Level, and Study Area and Expressed as Odds Ratios (OR) With 95% Confidence Intervals (CI).
- **eTable 2.** Sputum Production in Relation to Smoking Habits and E-Cigarette Use, Analyzed by Logistic Regression, Presented as Unadjusted and Adjusted for Sex, Age Group, Educational Level, and Study Area and Expressed as Odds Ratios (OR) With 95% Confidence Intervals (CI).
- **eTable 3.** Chronic Productive Cough in Relation to Smoking Habits and E-Cigarette Use, Analyzed by Logistic Regression, Presented as Unadjusted and Adjusted for Sex, Age Group, Educational Level, and Study Area and Expressed as Odds Ratios (OR) With 95% Confidence Intervals (CI).
- **eTable 4.** Any Wheeze in Relation to Smoking Habits and E-Cigarette Use, Analyzed by Logistic Regression, Presented as Unadjusted and Adjusted for Sex, Age Group, Educational Level, and Study Area and Expressed as Odds Ratios (OR) With 95% Confidence Intervals (CI).
- **eTable 5.** Recurrent Wheeze in Relation to Smoking Habits and E-Cigarette Use, Analyzed by Logistic Regression, Presented as Unadjusted and Adjusted for Sex, Age Group, Educational Level, and Study Area and Expressed as Odds Ratios (OR) With 95% Confidence Intervals (CI).

This supplementary material has been provided by the authors to give readers additional information about their work.

Number of eTables: 5

eTable 1-5: Unadjusted and adjusted logistic regression analyses. Dependent variables: longstanding cough, sputum production, chronic productive cough, recurrent wheeze and any wheeze. Independent variables: smoking habits and e-cigarette use, sex, age-group, educational level and study area.

eTable 1. Long-standing cough in relation to smoking habits and e-cigarette use, analyzed by logistic regression, presented as unadjusted and adjusted for sex, age group, educational level, and study area and expressed as odds ratios (OR) with 95% confidence intervals (CI).

	Unadjusted		Adjusted		
	OR	(95% CI)	OR	(95% CI)	
Non-smoker, No e-cigarette use	1.00		1.00		
Non-smoker, E-cigarette use	1.81	(1.08-3.02)	1.60	(0.92-2.80)	
Former smoker, No e-cigarette use	1.09	(1.00-1.19)	1.10	(1.00-1.20)	
Former smoker, E-cigarette use	1.69	(0.95-3.01)	1.57	(0.86-2.86)	
Smoker, No e-cigarette use	1.96	(1.78-2.17)	1.93	(1.74-2.13)	
Smoker, E-cigarette use	2.79	(2.19-3.56)	2.83	(2.21-3.63)	

eTable 2. Sputum production in relation to smoking habits and e-cigarette use, analyzed by logistic regression, presented as unadjusted and adjusted for sex, age group, educational level, and study area and expressed as odds ratios (OR) with 95% confidence intervals (CI).

	Unadjusted		Adjusted		
	OR	(95% CI)	OR	(95% CI)	
Non-smoker, No e-cigarette use	1.00		1.00		
Non-smoker, E-cigarette use	2.33	(1.46-3.71)	1.96	(1.18-3.24)	
Former smoker, No e-cigarette use	1.32	(1.22-1.43)	1.28	(1.18-1.39)	
Former smoker, E-cigarette use	1.25	(0.68-2.32)	1.12	(0.59-2.12)	
Smoker, No e-cigarette use	2.54	(2.32-2.79)	2.44	(2.22-2.68)	
Smoker, E-cigarette use	4.66	(3.74-5.80)	4.52	(3.61-5.65)	

eTable 3. Chronic productive cough in relation to smoking habits and ecigarette use, analyzed by logistic regression, presented as unadjusted and adjusted for sex, age group, educational level, and study area and expressed as odds ratios (OR) with 95% confidence intervals (CI).

	Unadjusted		Adjusted		
	OR	(95% CI)	OR	(95% CI)	
Non-smoker, No e-cigarette use	1.00		1.00		
Non-smoker, E-cigarette use	0.87	(0.28-2.77)	0.62	(0.15-2.51)	
Former smoker, No e-cigarette use	1.57	(1.37-1.79)	1.36	(1.19-1.57)	
Former smoker, E-cigarette use	1.83	(0.74-4.55)	1.73	(0.69-4.30)	
Smoker, No e-cigarette use	2.47	(2.13-2.88)	2.28	(1.96-2.67)	
Smoker, E-cigarette use	4.62	(3.40-6.30)	4.43	(3.22-6.08)	

eTable 4. Any wheeze in relation to smoking habits and e-cigarette use, analyzed by logistic regression, presented as unadjusted and adjusted for sex, age group, educational level, and study area and expressed as odds ratios (OR) with 95% confidence intervals (CI).

	Unadjusted		Adjusted		
	OR	(95% CI)	OR	(95% CI)	
Non-smoker, No e-cigarette use	1.00		1.00		
Non-smoker, E-cigarette use	0.88	(0.48-1.61)	0.87	(0.46-1.64)	
Former smoker, No e-cigarette use	1.36	(1.26-1.47)	1.37	(1.27-1.49)	
Former smoker, E-cigarette use	1.82	(1.07-3.08)	1.73	(1.01-2.97)	
Smoker, No e-cigarette use	2.90	(2.66-3.16)	2.83	(2.59-3.10)	
Smoker, E-cigarette use	3.72	(2.99-4.64)	3.86	(3.08-4.83)	

eTable 5. Recurrent wheeze in relation to smoking habits and e-cigarette use, analyzed by logistic regression, presented as unadjusted and adjusted for sex, age group, educational level, and study area and expressed as odds ratios (OR) with 95% confidence intervals (CI).

	Unadjusted		Adjusted		
	OR	(95% CI)	OR	(95% CI)	
Non-smoker, No e-cigarette use	1.00		1.00		
Non-smoker, E-cigarette use	1.53	(0.74-3.17)	1.46	(0.67-3.18)	
Former smoker, No e-cigarette use	1.62	(1.45-1.80)	1.48	(1.32-1.65)	
Former smoker, E-cigarette use	2.44	(1.26-4.76)	2.16	(1.07-4.37)	
Smoker, No e-cigarette use	3.36	(2.99-3.77)	3.02	(2.68-3.41)	
Smoker, E-cigarette use	6.94	(5.45-8.82)	6.88	(5.37-8.80)	