

## **Future life expectations and smoking status: a study on adolescents from 6 European cities**

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Many theories suggested that individuals with a low socio-economic (SE) status are more likely to develop negative expectations for their future life, and thus to show more frequently unhealthy behaviors. This study addresses the role of adolescents' future health expectations (HE) in SE inequalities in smoking in adolescents.

We used data from the SILNE survey (n = 9,324), carried out in 6 European cities, on adolescents aged 14-16 years old.

We measured SE inequalities in future HE among adolescents, and the extent to which these expectancies influenced health-related behaviors, with a focus on smoking. We hypothesized that low future HE (1) increased the likelihood of smoking; (2) were more prevalent among adolescents with a low SE status; (3) mediated the relationship between SE status and smoking behavior.

Firstly, multivariate regressions modeled the smoking probability as a function of HE, adjusting for age, sex, country, SE condition, family background, health status, and peer effects. Logistic regressions were then performed to model the likelihood of having good HE as function of SE status, adjusting for age, sex, family background, health status, and peer effects (hypothesis 2). Finally, we tested whether the association of smoking with SE status was altered when adjusting for HE (hypothesis 3).

We observed a significant association of smoking and HE, for low longevity (OR = 2.53, p-value < 0.01) and poor health (OR = 3.06, p-value < 0.01). Expected short longevity and poor HE were significantly associated with self-reported poor health (OR = 2.76 and OR = 12.29, respectively), long-term illness (OR = 1.49 and OR = 1.83), and mother and father being smokers. Low HE were significantly inversely associated with subjective income (OR = 0.79 and OR = 0.82). The association between smoking and SE background did not change significantly when controlling for expectations.

HE are strong independent predictors of smoking, and are associated to SE background. However, they do not explain SE inequalities in smoking. Anti-tobacco policies emphasizing long-term benefits would possibly fail among adolescents if they do not take into account adolescent expectations.

#### **Key messages**

- Health expectations are strong independent predictors of smoking, and are associated to socioeconomic background.
- Health expectations do not explain SE inequalities in smoking.