Reviewer’s report

Title: Predicting nicotine dependence profiles among adolescent smokers: The roles of personal and social-environmental factors in a longitudinal framework

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Reviewer: Jennifer Rose

Reviewer’s report:

The authors have been responsive to reviewers concerns, and it is this reviewer’s opinion that the study makes a unique contribution to research on the development of nicotine dependence in adolescents.

It is interesting that smoking exposure variables (age of initiation, frequency, quantity) were not associated with increasingly developed nicotine dependence suggested by the profiles. Do the authors have any insight into why this might be the case, given that a large body of research has found a positive association between smoking exposure and endorsement of nicotine dependence symptoms?

Regarding the counter intuitive finding that those high on neuroticism with no smoking friends were more likely to be classified into the "high craving and behavioral dependence" profile, might it also be possible that these individuals smoke for reasons other than social (e.g., to reduce anxiety)? Perhaps these nonsocial reasons are elevated in high neurotic adolescents who have few friends. This is an interesting finding that warrants a little more discussion.

Level of interest: An article of importance in its field

Quality of written English: Acceptable

Statistical review: No, the manuscript does not need to be seen by a statistician.

Declaration of competing interests:

I declare that I have no competing interests.