

Supplementary table 1: Items derived from the BCS scale

BCS Scale	CSS-21 Scale
Addiction barriers	
1. Withdrawal symptoms	Rephrased and retained
2. Miss the companionship of cigarettes	During initial testing, it was found that this item is measuring the same concept as item 8, and hence removed from the CSS-21 scale
3. Thinking about never being able to smoke again	Rephrased and retained
4. Thinking about cigarettes all the time	During initial testing, it was found that this item is measuring the same concept as item 8, and hence removed from the CSS-21 scale
5. Not knowing for how long it will be very hard not to smoke	During initial testing, this item was found to be redundant and/or difficult to understand, and hence removed from the CSS-21 scale
6. Being addicted to the cigarettes	Retained
7. Fear of failing to quit	Rephrased and retained
8. Feeling lost without cigarettes	Retained
External Barriers	
9. No encouragement or help from friends	During initial testing, it was found that this item is measuring the same concept as item 11, and hence removed from the CSS-21 scale.
10. Family members or significant others encouraging you to smoke	Rephrased and retained
11. No encouragement or help from family members or significant others	Rephrased and retained
12. Friends encouraging you to smoke	During initial testing, it was found that this item is measuring the same concept as item 10, and hence removed from the CSS-21 scale.
13. No encouragement at work for not smoking	Rephrased and retained
14. Lack of understanding from family and significant others about what it is like to quit smoking	During initial testing, this item was found to be redundant and/or difficult to understand, and hence removed from the CSS-21 scale.
15. Seeing things or people which remind you of smoking	Rephrased and retained
Internal Barriers	

16. Having strong feelings such as anger or feeling upset when you are by yourself	Rephrased and retained
17. Feeling less in your control of your moods	During initial testing, it was found that this item is measuring the same concept as item 16, and hence removed from the CSS-21 scale.
18. Having strong feelings such as anger, or feeling upset when you are with other people	Rephrased and combined with item 16
Item not loaded in any subscale	
19. Fear of weight gain	This item was not loaded on any subscales in the BCS scale, but was included in CSS-21 scale.

Supplementary figure 1: Screeplot of eigenvalues

