Reviewer's report

Title: Belief system, meaningfulness, psychopathology associate with suicidal behaviors among Chinese college students: a cross-sectional survey

Version: 1 Date: 14 March 2012

Reviewer: Robert Young

Reviewer's report:

The paper suffers from a number of errors, omissions and stylistic problems that will require a major revision and some re-analyses. Despite these issues, the paper tackles an important topic and reports novel findings. I found the approach taken in the paper intriguing and it should be of interest to readers attracted to positive psychology. The sample selection appears to be appropriate, the sample size is adequate and the statistical methodology used generally appropriate for the task.

If the problems outlined below can be resolved then the authors appear to have conducted a study that contributes to our understanding of the relationship between suicidal behaviour-cognition, ‘meaningfulness’ and belief system(s).

Major issues

1) An experienced academic English writer should check the manuscript for grammar and spelling errors – e.g., ‘deviant to the majority people’.

2) The influence of gender on suicidal behaviour needs to be recognised. Given China has a major problem regarding suicide among young women, more attention should be given to gender differences. I would suggest a multi-group SEM model to explore gender differences.

3) Difference between religious groups is a possibility that need discussed. For example, our own study touched on similar issues finding that Catholic adolescents were (arguably) less likely to attempt suicide or self-harm than their Protestant peers (Young, Sweeting, Ellaway, 2011).

4) How have the authors addressed missing data? Within AMOS there is a full information maximum likelihood option, although other options to deal with missing data are available outside AMOS.

5) How have the authors addressed potential clustering effects? Multilevel options are not available in Amos, but fixed effects or multi-group options could be used. At the very least, acknowledgment of the problem and a few assumption checks are required.

6) Ethics – The authors’ should outline the procedures followed if a student reported a suicide plan or other serious risk of suicide.

7) Have the authors looked at the model using SCL-90 subscores? In other words, does the same pattern of findings hold for all psychopathology subscores? This would require only one additional model with all subscores
8) The authors used ULS estimation, because of non-normality in the indicators. It would be helpful to know if this makes any substantive difference to the results. The authors should supply a set of supplementary ML results, or at least assure the reader that ML and ULS estimates were broadly similar. Bayesian methods are also available in AMOS.

9) The ‘degrees of freedom’ for each model is missing.

10) No completing models were tested. However, the initial model seems to be broadly inline with the general hypothesis. No formal test(s) between model 1 and model 2 were conducted: presumably, because the models are non-nested and do not contain the same variables. Fixing certain pathways to zero would allow a formal comparison, although the results seem clear.

11) The interaction between political and religious belief could be explored by including an appropriate dummy variable into the SEM model. Has this been attempted?

12) Traditionally, in SEM any correlation table includes the mean and SD of each variable.

13) Both Durkheim’s and strain theories are highlighted – but the model by Joiner (2005: why people die by suicide) is also highly relevant.

Minor clarifications

1) The term ‘suicidal behaviours’ is used – yet suicidal thoughts are included in the construct?

2) What are ‘normal’ and ‘211’ universities?

3) In addition to social support and belongingness, other important variables are likely to be omitted from this study. No study can include every relevant variable, but this limitation should be acknowledged.

4) The authors stress the importance of Confucianism for political beliefs several times, yet the political beliefs question contains no mention of Confucianism! Could the authors explain this omission?

5) The rate of lifetime suicide ideation is particularly high. Some plausible explanation for this high rate is needed. For example, the stress associated with preparation for university entrance exams.

6) The discussion is somewhat expansive in parts and could be condensed.

7) The authors recognise that the political belief variable is dichotomous, limited and in need of development. The religious belief variable seems similarly limited and this could be recognised in the limitations section.

8) The authors provide many fit statistics. Chi, CFI, RMR, RMSEA and proportion of variance explained are usually sufficient.

9) The description of the SBQ-R scoring is somewhat confusing and could be clearer.
**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Needs some language corrections before being published

**Statistical review:** Yes, and I have assessed the statistics in my report.

**Declaration of competing interests:**

I declare that I have no competing interests.