Beliefs about Being Alone, Time Alone, and Loneliness Across Eight Nations (#184189)

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1) Have any data been collected for this study already?
No, no data have been collected for this study yet.

2) What's the main question being asked or hypothesis being tested in this study?
We will collect data from eight countries to examine whether people's beliefs about being alone (1) predict how lonely they feel, and (2) buffer people who spend a lot of time alone against loneliness. The countries included are: Israel, Poland, U.K, Australia, Spain, Mexico, South Africa, and Brazil.

H1: In all countries tested, beliefs about being alone significantly predict loneliness, such that people with more positive beliefs about being alone are less lonely than those with more negative beliefs.

H2: Across countries, beliefs about being alone moderate the link between time spent alone and loneliness, such that among people who spend a lot of time alone, those with positive beliefs are significantly less lonely than those with negative beliefs.

3) Describe the key dependent variable(s) specifying how they will be measured.
1. Beliefs about being alone: Assessed via a 6-item scale used in our prior studies on this topic. Each item includes a bipolar scale rated from 1 [highest rating on first construct] to 7 [highest rating on second construct])
2. Loneliness: Assessed via the UCLA Loneliness Scale-8-item version (each item rated from 1=never to 4=often)
3. Time spent alone: Social contact will be assessed via three items from MIDUS/MIDJA surveys that ask about frequency of contact with friends, family, and significant other in the past month (each item is rated from 1=never to 3=7+ times in the past month). Total social contact scores will be reverse scored to serve as an index of time spent alone in the past month. This method is identical to prior studies we conducted in the U.S. and in Japan.

4) How many and which conditions will participants be assigned to?
There are no conditions in this study.

5) Specify exactly which analyses you will conduct to examine the main question/hypothesis.
H1: For each country separately, we will conduct a bivariate correlation (Pearson's r) to test whether beliefs about being alone predict loneliness.
H2: We will combine all eight countries' data into one dataset. Then, we will construct a mixed-effects linear regression model to test the effects of two predictors (time spent alone, beliefs about being alone) and their interaction on loneliness. This model will include country as a random intercept to account for variations across different cultural contexts.

6) Describe exactly how outliers will be defined and handled, and your precise rule(s) for excluding observations.
Means and SDs will be computed for variables of interest (i.e., beliefs about being alone, loneliness, time spent alone). We will exclude any outlier observations that lie above or below 3 SDs below the sample mean.

Participants will be excluded if they do any of the following:
A. Complete the study too quickly–i.e., in under 4 minutes, which we consider too rapid to have allowed for careful reading and thoughtful answering of survey questions.
B. Take an unusually long time to complete the study–i.e., more than 3 SDs above the mean sample of duration–as prolonged completion times likely indicate that participants were distracted and/or did not complete the survey in one sitting.
C. Do not finish the study.
D. Provide non-human responses to an open-ended question, to safeguard against bot-generated data.
E. Do not follow study instructions.
F. Do not commit to providing high-quality responses in an initial commitment check (e.g., those who respond "No" or "I can't promise either way" to "We care about the quality of our survey data. For us to get the most accurate measures of your opinions, it is important that you provide thoughtful answers to each question in this survey. Do you commit to providing thoughtful responses to the questions we ask in this survey?").

7) How many observations will be collected or what will determine sample size? No need to justify decision, but be precise about exactly how the number will be determined.
We performed a power analysis using the powerCurve function from the simr package in R, setting the fixed effect of the interaction between social contact and beliefs to -0.3057 (which is the smallest interaction effect detected in our prior studies conducted in the U.S and Japan), with the model's

random intercept variance and residual standard deviation as 1.05 and 4.465, respectively (based on model outcome for the combined analysis of data from U.S and Japan in our prior study). The analysis, which tested sample sizes of 50, 100, 150, 200, and 250 per country, and ran 1,000 simulations, revealed that a sample of 150 participants per country provides 97.10% power [CI 95.86, 98.05] to detect the interaction; to account for potential exclusions, we will recruit 180 participants per country (i.e., we will recruit 1,440 total participants across the eight countries).

8) Anything else you would like to pre-register? (e.g., secondary analyses, variables collected for exploratory purposes, unusual analyses planned?)
Other Measures: We will additionally collect data on cultural dimensions (individual-collectivism, relational mobility, tightness-looseness) and demographics. We will add an open-ended question assessing beliefs about being alone for future exploratory analyses.

Exploratory Analyses: (1) We will conduct an inferential test (e.g., ANOVA) to examine whether beliefs about being alone significantly differ across the various countries. (2) We will test if 'country' moderates the hypothesized interaction between time spent alone and beliefs about being alone on loneliness. We will run this model both without and with cultural dimensions and demographics as covariates. (3) For each country separately, we will test if beliefs about being alone significantly moderates the link between time spent alone and loneliness. (4) We will conduct bivariate correlations between variables of interest.

Translations: All surveys conducted in non-English speaking countries (i.e., Israel, Poland, Spain, Mexico, Brazil) will be translated to the appropriate language (i.e., Hebrew, Polish, Spanish, Portuguese). The translation process will be as follows: First, we will use Google Translate to translate the English version of the survey into the appropriate language. Then, the first author (MR) will meet with a native speaker of that language and discuss the study purpose and goals. Afterward, the native speaker will review the translation and make any revisions as needed. Finally, the translated survey will be back-translated into English using Google Translate to verify the fidelity of the translation.