**Supplemental File for**

Title: Explaining Support for Post-Secondary Education Funding for Indigenous Students

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**Study Materials**

**Predictor Variables**

**[Meritocratic beliefs]**

“**Instructions:** Please indicate how much you agree or disagree with the following statements.” (1 = *strongly disagree,* 7 = *strongly agree*)

1. Anyone who is willing and able to work hard has a good chance of succeeding.

2. Getting ahead is a matter of working hard and relying on yourself.

3. The person who can approach an unpleasant task with enthusiasm is the person who gets ahead.

4. Most people who don’t succeed at life don’t put in enough work or effort.

5. People who fail at getting ahead have usually not tried hard enough.

6. Lack of effort can be a person’s greatest downfall.

**[Personal Prejudice]**

[Items: Aboriginal peoples (main item), East Indian Canadians (control item)]

“**Instructions:** In Canada, there a wide variety of people with all sorts of backgrounds, and individuals tend to vary in terms of how warmly or coldly they feel towards them. We interested in the general sentiments of Canadians towards a variety of groups in Canadian society.

Using a scale from 0 to 100, please report your personal feelings towards the following groups. As you complete this task, think of an imaginary thermometer. The warmer or more favorable you feel, the higher the number you choose will be. The colder or less favorable you feel, the lower the number. If you feel neither cold nor warm toward the group, rate it a 50.” (0 = You feel extremely cold toward this group, 100 = You feel extremely warm toward this group)

1. School teachers
2. Welfare recipients
3. Firefighters
4. Aboriginal peoples
5. Union members
6. Homeless people
7. East Indian Canadians
8. Insurance brokers

**[Group Zero-Sum Beliefs]**

“**Instructions:** Please indicate how much you agree or disagree with the following statements.” (1 = *strongly disagree,* 7 = *strongly agree*)

1. There are groups within Canadian society that are putting a strain on our resources.

2. Some groups in Canadian society don’t contribute their fair share.

3. Money spent on social services for some groups in Canada means less money will be spent on services for other Canadians.

4. When some groups in Canada gain positions of power that means other Canadians have less say.

5. Good jobs for some groups in Canada means fewer good jobs for other Canadians.

6. Financial aid to some groups hurts other Canadians.

**[Perceived Societal Social Mobility]**

“**Instructions:** Please indicate how much you agree or disagree with the following statements.” (1 = *strongly disagree,* 7 = *strongly agree*)

1. It is not too difficult for people to change their economic position in society.

2. People are likely to change their rank in society compared to their parents.

3. Most people end up staying in the same social class for their entire lives. (rev)

4. These days, people are likely to change their economic standing.

5. Many Canadians can change their social class.

6. People are more likely to change their economic rank than stay at the level they were born into.

7. It is very unlikely that people will change their position in today's society. (rev)

8. Generally, people have good chances to increase or decrease their position in society.

**[Political Orientation]**

[Note: These questions appeared in the demographic section]

1. In general, when it comes to politics do you usually think of yourself as liberal, moderate, conservative, or something else? (1=Very Liberal, 2=Liberal, 3=Slightly Liberal, 4=Moderate/middle-of-the-road, 5=Slightly Conservative, 6=Conservative, 7=Very Conservative, 8=Don’t know/not political, 9=Libertarian, 10=Other).

2. When it comes to money and fiscal policy do you usually think of yourself as liberal, moderate, conservative, or something else? (1=Very Liberal, 2=Liberal, 3=Slightly Liberal, 4=Moderate/middle-of-the-road, 5=Slightly Conservative, 6=Conservative, 7=Very Conservative, 8=Other).

3.When it comes to social policy do you usually think of yourself as liberal, moderate, conservative, or something else? (1=Very Liberal, 2=Liberal, 3=Slightly Liberal, 4=Moderate/middle-of-the-road, 5=Slightly Conservative, 6=Conservative, 7=Very Conservative, 8=Other).

**Dependent Variable**

[Note: This variable was embedded among a group of four measures unrelated to the study purpose. Specifically, a measure of union support (6-items), gender pay equity support (5-items), followed by the PSSSP measure below, and ending with measure of support for income redistribution (6-items).

“In this section of the survey we will ask you a variety of questions pertaining to your opinions on a number of different Canadian social programs and policies. Please read the instructions carefully to ensure you are answering the questions with the correct program or policy in mind.”

**[Support for the Post-Secondary Student Support Program]**

“**Instructions:** Please indicate how much you agree or disagree with the following statements about the Post-Secondary Student Support Program. This is a federally funded program that supplies eligible First Nations and Inuit Students with funding to access post-secondary education. The funding received is meant to cover tuition, fees, and living costs.”

 (1 = *strongly disagree,* 7 = *strongly agree*)

1. In general, I support the Post-Secondary Student Support Program for First Nations and Inuit students. 2. I would vote for increased government funding of this program.

3. I think this program should be terminated. (rev)

4. I believe there should be less funding for this program. (rev)

5. It is important that this program exists.

**Unrelated Variables**

[The dependent variable was embedded among the three variables below to help disguise the study purpose (appearing after measures of union and pay equity support and before the measure of income redistribution). Sample items are provided. Please contact the corresponding author for complete measures.]

[Support for Unions]

Instructions: Please indicate how much you agree with the statements below about unions in Canada. A union is an organized association of workers formed to protect and advance their collective rights and interests. *(1=Strongly disagree, 7=Strongly agree)*

1. There should be more legal protection for unions.

2. More workers should form or join existing unions.

[Support for the Pay Equity Act]

Instructions: Please indicate how much you agree or disagree with the following statements about the Pay Equity Act. The Pay Equity Act is an example of an affirmative action policy put in place in Canada in an effort to reduce the wage gap between men and women in the work force. This Act requires employers to compare the wages of men and women working in positions in the same job class to ensure that men and women are being compensated equally for work of the same value. (1 = *strongly disagree,* 7 = *strongly agree*)

1. In general, I support this policy.

2. I believe that this policy is necessary.

[Income Redistribution Policy]

Instructions: Please indicate how much you agree with the following statements about economic inequality, that is, the gap between people with the highest incomes (e.g., the top 20%) and people with the lowest incomes (e.g., the bottom 20%).

1. There should be a limit to the level of income inequality in Canada.

2. Incomes in this country should be more evenly distributed.

[Other Measures]

Note: As part of other research participants subsequently completed measures evaluating Canadian stereotypes (26-items), need for cognition (5-items), death anxiety (5-items), shared reality (5-items) and system justification (8-items).

[**Demographics]**

“**Instructions:** We would now like you to answer some additional questions about your background characteristics to help us better answer our research questions. Once again, we would like to assure you that all information you provide will remain confidential, responses will not be used to identify individuals, and that you may decline to answer any of the questions.”

1. What is your gender? Male Female Other
2. How old are you? \_\_\_
3. What is your ethnicity? (1=Aboriginal 2=Black 3=Asian 4=East Indian 5=Hispanic 6=Middle Eastern 7=White 8=Other, specify)
4. Are you a Canadian citizen? Yes No
5. Do you currently live in Canada? Yes No
6. If yes, which province or territory do you currently live in? ( 1=Alberta, 2=British Columbia, 3=Manitoba, 4=New Brunswick, 5=Newfoundland and Labrador, 6=Nova Scotia, 7=Ontario, 8=Prince Edward Island, 9=Quebec, 10=Saskatchewan, 11=Northwest Territories, 12=Nunavut, 13=Yukon, 14=Other)
7. Think of this ladder to the right [image of ladder] as representing where people stand in Canada. At the top of the ladder are the people who are the best off - those who have the most money, the most education, and the most respected jobs. At the bottom are the people who are the worst off - who have the least money, least education, and the least respected jobs or no job. The higher up you are on this ladder, the closer you are to the people at the very top; the lower you are, the closer you are to the people at the very bottom. If 10 is the top of the ladder and 1 is the bottom, where would you place yourself on this ladder? (Options: 10-1)
8. What is the highest level of education that you have completed? (1 = Less than high school, 2 = Some high school, 3 = High school graduate – high school diploma or equivalent (e.g., GED), 4 = Some college but no degree, 5 = Associate Degree, 6 = Bachelor’s Degree (e.g., BA, AB, BS), 7 = Master’s Degree (e.g., MA, MS, MSW, MBA), 8 = Doctorate or Professional Degree (e.g., MD, DDS, JD)
9. Are you currently employed? Yes - Full-time Yes - Part-time No Retired
10. Please choose the range of your annual household income: (1 = 0-$5000, 2 = $5001-$10,000, 3 = $10,001-$20,000, 4 = $20,001-$30,000, 5 = $30,001-$45,000, 6 = $45,001-$60,000, 7 = $60,001-$80,000, 8 = $80,001-$100,000, 9 = $100,001=$125,000, 10 = $125,001-$150,000, 11 = $150,001-$200,000, 12 = More than $200,001

**[Final Questions]**

“**Instructions:** You now finished all of the study tasks. To help us with our research, please answer the following standard questions about your experience of the study in general.”

1. Were any of the instructions or questions unclear? Do you have any comments about this survey that you would like to share with us?

2. Can you think of any reason why we shouldn't use your data in our analysis? For example, if you were tired or distracted when you were answering the questions, or didn't read the instructions carefully, your responses may not be accurate.

\_Use my responses - I answered the questions as honestly and accurately as possible.

\_Do not use or retain my responses (e.g., they may have been affected by one of the situations described above).

**Mean Index Scores**

Note: Scores for all multiple-item measures used in the analyses were calculated based on the average scores of the items in a measure (not by summing the items).

**Preregistration**

A PDF containing the AsPredicted *'Predicting Support for the Post-Secondary Student Support Program' (#20166)* document is available here: <https://aspredicted.org/eu5j2.pdf>

A summary is provided below, followed by deviations from the exclusion criteria:

“What's the main question being asked or hypothesis being tested in this study?

It is hypothesized that personal prejudice toward Aboriginal peoples, conservative political views, perceived social mobility, meritocratic beliefs, and group zero-sum beliefs will negatively correlate with support for the Post-Secondary Student Support Program.”

“Describe the key dependent variable(s) specifying how they will be measured.

Main DV:

Support for the Post-Secondary Student Support Program [5-items, 7-point scale]

Predictors:

Personal prejudice toward Aboriginal peoples [1-item, 100-point feeling thermometer scale],

Conservative political views [3-items, 7-point scale]

Perceived social mobility [8-items, 7-point scale]

Meritocratic beliefs [6-items, 7-point scale]

Group zero-sum beliefs [6-items, 7-point scale]”

“Specify exactly which analyses you will conduct to examine the main question/hypothesis.

A multiple regression will be employed to determine the relationship between support for the Post-Secondary Support Program and the five predictors described above. All predictors will be entered in the same step of the regression. It is hypothesized that each predictor variable will

negatively relate to support for the Post-Secondary Student Support Program, p < 0.05.”

“Describe exactly how outliers will be defined and handled, and your precise rule(s) for excluding observations.

Participants’ data will be excluded from the analysis if they: 1) identify as Aboriginal, 2) fail to complete 50% of the main measures, or 3) wish to have their data omitted.”

“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.

210.”

**How and why we deviated from the above preregistration criteria:**

As described in the manuscript, we expanded our exclusion criteria slightly from what was explicitly listed in the preregistration document. First, we expanded the “fail to complete 50% of the main measures” criterion to also include “fail to complete 50% of each measure.” One participant did not complete any of the political orientation items and one participant did not complete the prejudice toward Indigenous Peoples item. Failing to complete these measures meant these participants would not be in our main analyses and their data could not be used to test our hypotheses, thus we opted to exclude them. Second, as our main analyses could only be conducted with participants that scored along the 7-point political liberal-conservative dimension (as listed in the preregistered measures section), we excluded those that chose alternative answers for this measure. Almost all of these participants choose “don’t know/not political” or “other,” with only one choosing “libertarian.” We typically include this exclusion criterion in our research involving political orientation, as done in other prior research, but failed to list it in this case.

**Additional Analyses**

Table S1. *Correlation Matrix for Main Study Variables and Demographics*

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Variable | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 |
| 1. Support for the PSSSP | (-) | -.55\*\* | -.27\*\* | -.31\*\* | -.52\*\* | -.59\*\* | -.32\*\* | -.12 | -.10 | -.07 | .04 | -.05 |  -.03 |
| 2. Prejudice (Indigenous Peoples) |  | (-) | .09 | .18\* | .42\*\* | .36\*\* | .68\*\* | .14 | -.11 | <.01 | .07 | .15\* |  .07 |
| 3. Perceived Social Mobility  |  |  | (-) | .60\*\* | .35\*\* | .37\*\* | .03 | .04 | -.17\* | -.02 | -.03 | .01 |  .18\* |
| 4. Meritocratic Beliefs  |  |  |  | (-) | .44\*\* | .48\*\* | .11 | .08 | -.13 | -.07 | -.14 | .05 |  .16\* |
| 5. Group Zero-Sum Beliefs |  |  |  |  | (-) | .48\*\* | .30\*\* | .13 | -.02 | .06 | -.05 | .01 | -.02 |
| 6. Political Orientation |  |  |  |  |  | (-) | .21\*\* | .14 | -.04 | .12 | -.11 | .04 | .07 |
| 7. Prejudice (East Indians) |  |  |  |  |  |  | (-) | .08 | -.11 | -.06 | .02 | .13 | .08 |
| 8. Gender  |  |  |  |  |  |  |  | (-) | .01 | -.02 | -.19\* | .07 | -.14 |
| 9. Ethnicity |  |  |  |  |  |  |  |  | (-) | .20\*\* | -.02 | .03 | .03 |
| 10. Age |  |  |  |  |  |  |  |  |  | (-) | .07 | .14 | <.01 |
| 11. Education |  |  |  |  |  |  |  |  |  |  | (-) | -.02 | .28\*\* |
| 12. Household Income |  |  |  |  |  |  |  |  |  |  |  | (-) |  .35\*\* |
| 13. Subjective SES |  |  |  |  |  |  |  |  |  |  |  |  | (-) |

*Note,* \**p* < .05, \*\**p* < .01

Table S2. *Personal Prejudice Towards Indigenous Peoples and Other Canadian Groups*

|  |  |  |  |
| --- | --- | --- | --- |
| Variable | *M* | Range | *SD* |
| School Teachers | 22.40 | 0 - 80 | 17.73 |
| Welfare Recipients | 49.32 | 0 - 100 | 20.99 |
| Firefighters | 15.11 | 0 - 70 | 14.64 |
| Indigenous Peoples | 34.86 | 0 - 99 | 24.95 |
| Union Members | 37.11 | 0 - 98 | 21.91 |
| Homeless People | 45.93 | 0 - 98 | 24.09 |
| East Indian Canadians | 34.08 | 0 - 98 | 22.08 |
| Insurance Brokers | 56.50 | 0 - 100 | 24.10 |

*Note.* Scores are reverse-coded. Higher scores indicate more personal prejudice.

**Multiple regression including prejudice control variable (East Indian Canadians)**

Table S3*. Additional Regression Analysis of Predictors of Support for the PSSSP*

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| Variable | *b* | SE | *b* 95% CI | ß | *t* | *p* |
| Prejudice (Indigenous Peoples) | -.02 | <.01 | [-.03, -.01] | -.39 | 5.12 | < .001 |
| Perceived Social Mobility | -.11 | .11 | [-.33, .11] | -.06 | -0.96 | .340 |
| Meritocratic Beliefs | .08 | .08 | [-.09, .24] | .06 |  0.92 | .361 |
| Group Zero-Sum Beliefs | -.25 | .08 | [-.41, .09] | -.20 | -3.14 | .002 |
| Political Orientation | -.39 | .07 | [-.52, -.26] | -.38 | -5.81 |  < .001 |
| Prejudice (East Indian Canadians) | <.01 | <.01 | [-<.01, .01] | .08 | 1.06 | .291 |
| *R*2  (Adjusted *R*2) |  |  |  |  | .52 | (.50) |
| Constant |  |  |  |  |  8.235 | < .001 |

**Exploration of Multicollinearity**

As several of the main predictor variables correlated moderately with each other, we examined whether the degree of multicollinearity may cause some concern for interpretation of the regression results. Although guidelines vary for interpreting multicollinearity diagnostics, generally when the Variance Inflation Factor (VIF) exceeds 5, or 10, it may be problematic (Menard, 1995; Stevens, 2002). However, as seen in Table S4 below, none of the predictors had VIFs that approached these levels, which suggests that overlap among the key variables may not be a notable concern in this study. Moreover, as the measures used had reasonably good internal reliability (αs = 0.79-0.95), and a considerable amount of the total variance was explained (~50%), multicollinearity concerns may also be reduced.

Table S4: *Multicollinearity Coefficients for PSSSP Support*

|  |  |
| --- | --- |
|  | VIF |
| Prejudice toward Indigenous Peoples | 1.283 |
| Perceived Social Mobility | 1.613 |
| Meritocratic Beliefs | 1.864 |
| Group Zero-Sum Beliefs | 1.578 |
| Political Orientation | 1.570 |

**Sensitivity Analyses**

We conducted sensitivity analyses using the GPower (3.1.9) program on the final sample (n = 187) used in the main analyses. Following the program guidelines, f2 = .02 is considered a small effect size, f2 = .15 a medium effect size, and f2 = .35 a large effect size. Within GPower, we selected the “Linear multiple regression: Fixed model, R2 deviation from zero” statistical test, and conducted a sensitivity analysis for 80% power, 187 sample size, and α error probability of 0.05. For our main regression with 5 predictors, this indicated an ability to detect effect sizes of at least, f2 = .0707. For our exploratory analyses, where our goal was to test these same predictors beyond controlling for 6 background factors (n = 183), we ran a sensitivity test to detect R2 increase. There was a similar ability to detect effect sizes at least, f2 = .0724. Although not our focus, the ability to detect R2 increase of all 11 predictors in the exploratory analysis was also somewhat similar, f2 = .0971.

**Estimated True Scores**

As a robustness check, estimated true scores were calculated for each participant and main variable following a formula provided by Furr (2017). The exception was personal prejudice, which consisted of only one item. Although such adjustments were noticeable in the data (e.g., a participant’s social mobility scores: Original *M* = 2.50, Estimated True Score *M* = 2.82), there was little noticeable changes to the associations among variables, and no apparent effect on the significance or pattern of results. As seen in the Table below, the multiple regression using estimated true scores shows a near identical pattern of results.

Table S5*. Regression Analysis of Primary Predictors of Support for the PSSSP Using Estimated True Scores*

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| Variable | *b* | SE | *b* 95% CI | ß | *t* | *p* |
| Prejudice Toward Indigenous Peoples | -.02 | < .01 | [-.02, -.01] | -.34 | -5.77 | < .001 |
| Perceived Social Mobility | -.13 | .14 | [-.40, .13] | -.06 | -1.00 | .321 |
| Meritocratic Beliefs | .08 | .09 | [-.09, .26] | .07 | 0.94 | .351 |
| Group Zero-Sum Beliefs | -.29 | .09 | [-.47, -.10] | -.20 | -3.09 | .002 |
| Political Orientation | -.42 | .07 | [-.56, -.28] | -.38 | -5.88 | < .001 |
| *R*2 (Adjusted *R*2) |  |  |  |  | .52  | (.50) |
| Constant |  |  |  |  | 8.58 | < .001 |