



# The Relationship Between Religiosity and Symptoms of Depression in Highly Educated Individuals Aged 39-45



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## Introduction

- Research on the relationship between religiosity and depression suggests that religiosity may be correlated with lower rates of depression (Gupta et al. 2011; Bonelli et al. 2012). Other studies, however, did not find a relationship between religiosity and depression (Park et al. 2018; Jung et al. 2017; Balbuena et al. 2013).
- Individuals that have not achieved higher levels of education, such as a bachelor's degree, are more likely to be vulnerable to depression (Taple et al. 2022) and are more likely to value religiosity (Schwadel 2015).

## Research Questions

- Is there a relationship between religiosity and symptoms of depression in the sample?
- Does this relationship between religiosity and symptoms of depression differ for individuals that have received a bachelors degree or higher level of education?

## Methods

### Sample

- The data were drawn from the 5th wave of the National Longitudinal Survey of Adolescent Health (Add Health). The survey included sampling of White, Black/African American, Hispanic, Asian, Pacific Islander, and American Indian/Alaska Native adults aged 39 to 45 years.

### Measures

- Symptoms of depression is a binary variable based on the response to four questions about experiencing symptoms in the past seven days. If participants experienced at least one symptom it was coded as 1.
- Religiosity is a binary variable based on the question "how important (if at all) is your religious faith to you?" If participants reported some level of importance it was coded as 1.
- Education is a binary variable coded as 1 for when participants describe having achieved a bachelors degree or higher.

## Results

### Bivariate

- Chi-Square analysis showed that religiosity is **not** significantly associated with the presence of symptoms of depression ( $X^2 = 3.19$ ,  $p = 0.074$ ).
- Chi-Square analysis showed that education level is significantly associated with the presence of symptoms of depression ( $X^2 = 74.88$ ,  $p = 0.000$ ).

### Multivariate

- Logistic regression analyses showed that religiosity is not significantly associated with symptoms of depression ( $p = 0.498$ )(Fig. 2), but that income, type of religion, and a diagnosis of depression are associated with symptoms of depression.
- Individuals with an annual income below the federal poverty level of \$15,000 had higher odds of experiencing symptoms of depression when compared to individuals with annual incomes above \$50,000 (OR = 2.43,  $p = 0.035$ )
- Christian individuals had lower odds of experiencing symptoms of depression when compared to non-Christian individuals (OR = 0.288,  $p = 0.006$ )

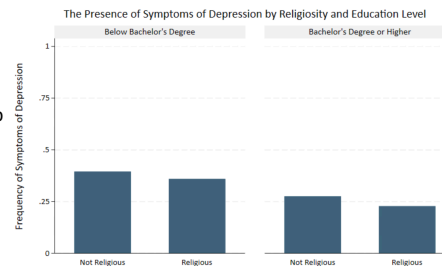


Figure 1: The Presence of Symptoms of Depression by Religiosity and Education Level

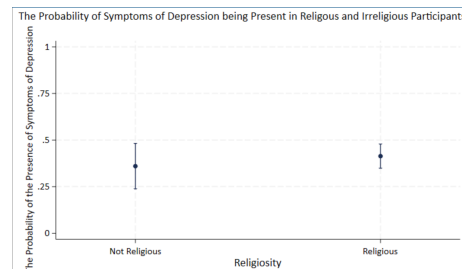


Figure 2: The Probability of Symptoms of Depression being Present in Religious and Irreligious Participants

## Discussion

- While there is not an association between religiosity and symptoms of depression in this data, other covariates (diagnosis of depression, income, and type of religion) are associated.
- These findings suggest that renewed religiosity may not be a treatment method for symptoms of depression, but that managing income inequality and poverty may decrease the odds of symptoms.
- Future research is needed to determine the role of these additional covariates in relation to education level.

## References

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