Association between religiosity and depressive symptoms among adolescent students

Asociación entre religiosidad y síntomas depresivos en adolescentes escolarizados

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Summary

Background: Several studies report a significant association between religiosity and depressive symptoms among adolescents; but, other researches do not. Up to date, this relation has not investigated in adolescent students who live in a violent and low-income country. Objective: To establish the correlation between religiosity and depressive symptoms among students in Cartagena, Colombia. Method: A cross-sectional study was done with participation of adolescents aged between 13 and 17 years old. Students completed two scales: the five-item form of the Francis scale of attitude toward Christianity (Francis-5), which asked about God, Jesus and prayer (higher scores suggest higher religiosity); and the WHO Well-Being Index (WHO-5) inquired depressive symptoms last two weeks (lower scores suggest higher depressive symptoms). It was accepted as a significant Pearson correlation (rho, *r*) a coefficient value higher than 0.20. A total of 1,730 students answered the questionnaires. The mean age was 14.7 (SD = 1.2). According to gender, 912 (52.7%) students were girls; and 818 (47.3%), boys. Francis-5 showed high internal consistency, coefficient alpha of 0.909; and coefficient omega of 0.910. WHO-5 presented coefficient alpha of 0.757; and omega of 0.759. The Francis-5 scores were between zero and twenty (Mean = 18.2, SD = 3.0, median = 20, mode = 20); and WHO-5 scores, between zero and fifteen (Mean = 10.2, SD = 3.1, median = 10, mode = 10). Religiosity had not significant correlation with depressive symptoms (r = 0.080). Conclusions: Religiosity is not associated with depressive symptoms among adolescent students in Cartagena, Colombia.
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Keywords: Depressive symptoms, religiosity, adolescents, students, cross-sectional study

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Resumen

Introducción: varios estudios informan asociación significativa entre religiosidad y síntomas depresivos en adolescentes; sin embargo, otras investigaciones no. Hasta la fecha, esta relación no se ha investigado en estudiantes adolescentes que viven en el país violento y de bajos ingresos, como Colombia. Objetivo: establecer la correlación entre religiosidad y síntomas depresivos en estudiantes de Cartagena, Colombia. Método: Se diseñó un estudio transversal se llevó a cabo con la participación de adolescentes en edades comprendidas entre 13 y 17 años. Los estudiantes completaron dos escalas: la forma de cinco ítems de la escala de Francis de actitud hacia el cristianismo (Francis-5) que preguntó acerca de Dios, Jesús y la oración (las puntuaciones más altas indican mayor religiosidad), y el Índice de Bienestar General de la OMS (WHO-5) que indaga síntomas depresivos en las últimas dos semanas (las puntuaciones más bajas indican síntomas depresivos mayores). Se aceptó como una correlación de Pearson significativa (rho, r) un coeficiente superior a 0,20. Resultados: un total de 1.730 estudiantes respondieron el cuestionario. La media para la edad fue 14,7 (DE = 1,2). Por sexo, 912 (52,7%) estudiantes eran niñas, y 818 (47,3%), niños. Francis-5 mostró una alta consistencia interna, coeficiente alfa de 0,909, y el coeficiente omega de 0,910. WHO-5 presentó un coeficiente alfa de 0,757, y el omega de 0,759. Las puntuaciones para Francis-5 se observaron entre cero y veinte (media = 18,2, SD = 3,0, mediana = 20, moda = 20); y la WHO-5, entre cero y quince años (media = 10,2; SD = 3,1, mediana = 10; moda = 10). La religiosidad no tuvo correlación significativa con los síntomas de depresión (r = 0,080). Conclusiones: la religiosidad no se asocia a síntomas depresivos en estudiantes adolescentes en Cartagena, Colombia.

Palabras clave: síntomas depresivos, religiosidad, adolescentes, estudiantes, estudios transversales

Introduction

Adolescent religiosity is related to a better well-being or mental health[1-4]. In adolescents from the general population, several researchers reported a significant association between religiosity and depressive symptoms; but, some investigators did not corroborate it. Abdel-Khalek found that religious adolescents were less depressed[5]. Cotton et al. concluded that adolescents with higher levels of spirituality had fewer depressive symptoms[6]. Schapman & Inderbitzen-Nolan reported than frequent participation in religious activities was associated with better mental health, less anxious and depressive symptoms[7]. Shina et al. observed that participation in religious activities were consistently related to a reduced risk for depression[8]. Maharaj et al. reported that attendance at church and prayer with the family was associated with a lower depression rate[9].

However, Stewart et al. did not find any important relationship between religiosity and depressive symptoms[10]. Florenzano et al. showed very religious adolescents felt sad and nervous as common as the not religious at all[11]. Pérez et al. carried out a longitudinal study and observed low correlation (lower than 0.20) between spirituality and depressive symptoms[12]. Desrosiers & Miller found that daily spiritual experiences and religious coping were related to less depressive symptoms only among girls[13]. However, Wong et al. made a systematic review and concluded that the association between religiosity and mental health were stronger for males than for females[1].

Up to date, this relation has not investigated in adolescent students who live in a low-income country with frequent violent facts, as Colombia is. Poverty and violence are strongly associated to other environmental stressors[14,15]. Similarly, poverty is related to anxiety and depressive symptoms [16]. Religiosity among adolescents with socioeconomic disadvantages could be used to deal with stressor related to poverty and social disadvantages[17]. Previous research reported that Colombian adolescents frequently use religiosity for coping theirs concerns[18].

The aim of the authors of this research was to establish the correlation between religiosity and depressive symptoms among adolescent students in Cartagena, Colombia.

Method

A cross-sectional study was done. Adolescent students were invited to participate. We included students with ages between 13 and 17 years. Participants completed two scales: the five-item form of the Francis scale of attitude toward Christianity (Francis-5) which asked about God, Jesus and prayer (higher scores suggest higher religiosity)[19, 20]; and the WHO Well-Being Index (WHO-5) which inquired depressive symptoms during the last two weeks (lower scores suggest more depressive symptoms)[21]. Authors accepted as a significant Pearson correlation (rho, *r*) a coefficient higher than 0.20.

Results

A total of 1,730 students participated in the research. The mean age was 14.7 (SD = 1.2). According to gender, 912 (52.7%) students were girls; and 818 (47.3%), boys. Francis-5 showed high internal consistency, coefficient alpha of 0.909; and coefficient omega of 0.910. WHO-5 presented coefficient alpha of 0.757; and omega of 0.759. The Francis-5 scores were between zero and twenty (Mean = 18.2, SD = 3.0, median = 20, mode = 20); and WHO-5 scores, between zero and fifteen (Mean = 10.2, SD = 3.1, median = 10, mode = 10). Religiosity had not significant correlation with depressive symptoms (r = 0.080). The correlations were similar among boys and girls, 0.099 and 0.079, respectively.

Discussion

It was observed that religiosity has not significant correlation to depressive symptoms among adolescent students, both boys and girls, in Cartagena, Colombia.

Consistently with previous researchers who did not find significant association, we do not find statistically significant relationship between religiosity and depressive symptoms. Florenzano et al., Pérez et al., and Stewart et al. reported that religiousness or spirituality was not associated with depressive symptom complain[10-12]. Moreover, Smith, McCullough, & Poll made a meta-analytic review, included a large number of articles and adolescent participants, and found low correlation (r = -0,096) between religiosity and depressive symptoms[22]. Nevertheless, Abdel-Khalek, Cotton et al., Pearce et al., Schapman & Inderbitzen-Nolan, and Sinha et al. found that levels of spirituality, religiousness or participation in religious activities were negatively related to depressive symptom report[5-7, 23]. Newest systematic reviews and meta-analyses concluded that religiosity usually has positive impact on mental and physical health[24-26].

We found not difference in the correlations between religiosity and depressive symptoms between boys and girls. Pearce et al. reported similar findings; they did not find any discrepancy between boys and girls or ethnicity[23]. However, Desrosiers & Miller reported that religious coping were related to low report of depressive symptoms only among girls[13]. Miller & Gur suggested that physical maturation may be associated with the protective qualities of religiosity against depression in adolescent girls[27]. In the other hand, Wong et al. concluded that the correlate of religiosity and mental health were more important among boys than girls[1]. Pajević et al. proposed that the positive impact of religion on depressive symptoms may derive from precise cognitive-behavioral patterns, which provided a clearer life orientation, more solid basis and safer frames for personality development[4]. The pattern is very important to cope with full life course of negative events[28].

The differences in measurements of religiosity and depressive symptoms could explain the observed inconsistency between religiosity and depressive symptoms in various researches. Religiosity is a complex construct that can be used as church attendance, prayer frequency or God beliefs[2, 29-31]. Similarly, depressive symptom scales are not homogenous. These tools can explore different kind of symptoms; some of them quantify broadly somatic or cognitive symptoms of depressive disorders[32]. In addition, we have to keep in mind that socio-cultural and economical background may influence the role of religiosity in the well-being of adolescents[2, 29].

It is necessary to identify special sub-group of adolescents that receive a positive impact of religiosity in order to enhance the effect of religious beliefs on depressive symptoms and other adolescent behavior aspects[33]. Adolescents expose to violence and poverty, very common situations in Colombia, may use religiosity to address this long-time stressors. In some circumstances, religion could offer both social and emotional support[34].

It is concluded that religiosity is not associated with depressive symptoms among adolescent students who live in low-income country. The finding needs to be replicated with other samples in future Latino-American studies.

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