

2019

The Relationship Between Faith Maturity and Life Satisfaction

Amanda L. Roche
Olivet Nazarene University

Follow this and additional works at: <https://digitalcommons.olivet.edu/elaia>



Part of the [Psychology Commons](#)

Recommended Citation

Roche, Amanda L. (2019) "The Relationship Between Faith Maturity and Life Satisfaction," *ELAIA*: Vol. 2 , Article 13.

Available at: <https://digitalcommons.olivet.edu/elaia/vol2/iss1/13>

This Article is brought to you for free and open access by the Honors Program at Digital Commons @ Olivet. It has been accepted for inclusion in ELAIA by an authorized editor of Digital Commons @ Olivet. For more information, please contact digitalcommons@olivet.edu.

The Relationship Between Faith Maturity and Life Satisfaction

Cover Page Footnote

I would first like to thank Dr. Kristian Veit for all his help and support on this project and whose constant encouragement and guidance was invaluable to the completion of this project. I would also like to thank the faculty and staff of the Honors Program for their support through these last few years of learning and application of knowledge. Thank you to the professors in the psychology department who first encouraged my excitement for psychology and continually help me to grow and challenge myself every day. I could not have made it through this project without my Honors Cohort, Cohort 9. The last four years with them has been fantastic and they have brought me so much joy throughout this journey through both the highs and the lows. Finally, I would like to thank my parents for their support, encouragement, and love, especially throughout these last four years. I could not have done any of this without them!



The Relationship Between Faith Maturity and Life Satisfaction

Amanda L. Roche

ACKNOWLEDGEMENTS

I would first like to thank Dr. Kristian Veit for all his help and support on this project and whose constant encouragement and guidance was invaluable to the completion of this project. I would also like to thank the faculty and staff of the Honors Program for their support through these last few years of learning and application of knowledge. Thank you to the professors in the psychology department who first encouraged my excitement for psychology and continually help me to grow and challenge myself every day. I could not have made it through this project without my Honors Cohort, Cohort 9. The last four years with them has been fantastic and they have brought me so much joy throughout this journey through both the highs and the lows. Finally, I would like to thank my parents for their support, encouragement, and love, especially throughout these last four years. I could not have done any of this without them!

ABSTRACT

Background

Studies have been conducted that conclude that having a more mature faith correlates to healthier psychological well-being and healthier personal relationships (Hill & Pargament, 2003; Okun & Stock, 1987; Powell & Pepper, 2015). A significant amount of research has been conducted on life satisfaction; however, fewer studies have explored the relationship between life satisfaction and faith maturity. Hawkins, Tan, and Turk (1999) compared a secular inpatient cognitive-behavioral therapy program to a Christian inpatient cognitive-behavioral therapy program and discovered that there was a negative correlation between spiritual well-being and depression, but little has been done beyond this study to examine this relationship. Alessandri, Caprara, and Tisak (2012) also showed that there is a relationship between life orientation and life satisfaction, as well as self-esteem and life satisfaction.

Methods

A survey was sent to the entire student body of 2,900 students at a Christian liberal arts university in the Midwest, and 717 responses were received. The survey included questions from Benson, Donahue, and Erickson's Faith Maturity Scale (1993), Diener, Emmons, Larsen, and Griffin's Satisfaction with Life Scale (1985), Scheier, Carver, and Bridges' Revised Life Orientation Test (1994), Rosenberg's Self Esteem Scale (1965), and demographic questions.

Results

There was a statistically significant correlation between faith maturity and life satisfaction, although less variability in life satisfaction could be predicted from faith maturity than from self-esteem and life orientation. Using an independent samples t-test, it was found that the life satisfaction of participants in this study was greater than the participants in Diener, et al.'s (1985) study on life satisfaction.

Conclusion

A significant positive correlation was found between faith maturity and life satisfaction, although this correlation was slightly smaller than the other correlations that were assessed. It was also found that 18% of variability in life satisfaction could be predicted by faith maturity.

Keywords: faith maturity, life satisfaction, life orientation, self-esteem

INTRODUCTION

Satisfaction with life, a major component of subjective well-being, has been the focus of an increasing amount of research since the 1980s (Diener, Oishi, & Lucas, 2011). As the popularity of life satisfaction, subjective well-being, and other related measures of quality of life have continued to grow, there have been more and more scales being successfully written to further delve into the relationships between these characteristics and other life experiences. Relationships between life satisfaction and Facebook usage (Blachnio, Przepiorka, & Pantic, 2016), genetics (Caprara, et al., 2009), and even income redistribution (Cheung, 2018) and cultural perceptions of happiness (Bastian,

Kuppens, De Roover, & Diener, 2014) have been found. But what really contributes to life satisfaction? Studies have shown that life orientation (positivity and outlook on life) and self-esteem are positively correlated to life satisfaction (Alessandri, Caprara, & Tisak, 2012), but are there other factors that are linked to life satisfaction?

One area that has been explored in previous research is the relationship between intrinsic religious faith and psychological well-being. According to Laurencelle, Abell, and Schwartz (2002), when compared to people who indicated lower intrinsic faith scores, people with higher intrinsic faith reported significantly lower scores of depression and anxiety and were also less likely to show signs of character pathology and showed stronger ego strength; however, these relationships were moderate and there was significant variation within each of the groups being correlated. Another more recent study by Leonardi and Gialamis (2009) examined the relationship between religiosity and psychological well-being further in a sample of Greek Orthodox Christians. The researchers found a statistically significant positive correlation between life satisfaction and church attendance, as well as between interest in church and life satisfaction. Conversely, they also found that individuals that prayed more were also more anxious.

The Christians Scriptures claims, “God will supply every need of yours according to his riches in glory in Christ Jesus” (Philippians 4:19, English Standard Version). This verse can be interpreted as meaning that God will provide for the needs of people who believe in him. For those who identify themselves as Christians, therefore, living a satisfying life is found in God and the Christian faith. Some studies have found that having a greater level of religiosity does, in fact, relate to a greater subjective well-being (Ivtzan, et al., 2013; Powell & Pepper, 2015), of which a major component is life satisfaction (Diener, et al., 1985). Does this link hold true for life satisfaction specifically? If so, what is the magnitude of this correlation? Is it significant and how does it compare with other indicators of life satisfaction? On the other hand, research has also shown that the importance of religion to an individual is associated with poor mental health (Ivtzan, et al. 2013), so how do these positive and negative results relate to life satisfaction?

Psychological context

Although scholars and philosophers have reasoned about the meaning of life and happiness for centuries, the first empirical studies of subjective well-being began to take shape in 1925, and the study of subjective well-being has since gained in popularity. Since the 1980s, however, the study of subjective well-being has exploded due to the increase in valid and reliable scales to measure subjective well-being and its components (Diener, Oishi, & Lucas, 2011). During this time, Diener, Emmons, Larsen, and Griffin (1985) attempted to develop a new life satisfaction scale that was more complete than any that had previously been created. This new scale measures general life satisfaction and quality of life in addition to feelings and emotions and considers the theory that other biological and environmental factors may contribute to life satisfaction, rather than just personality or mental health. Cultural perceptions are also a contributing factor to life satisfaction. Diener, Napa Scollon, Oishi, Dzokoto, and Suh (2000) found in their study of people from forty-one different countries that

in countries that emphasize positivity and value positive emotion and happiness, people tended to say that they were more satisfied with their life and had an overall higher subjective well-being. This well-being was measured by asking participants about their satisfaction with both general and specific aspects of their life and society. Because some countries are more religious than others, religion could be a part of this difference in life satisfaction between countries and, therefore, the differences in life satisfaction and subjective well-being.

In 2009, Caprara et al. investigated the genetic underpinnings of life satisfaction, self-esteem, and optimism. The results showed that all three of these are significantly impacted by genetics but that the environment had a substantial impact as well. Other researchers have studied the correlations between positive orientation and self-esteem, life satisfaction, and optimism. Positive orientation is self-confidence or the way that a person views oneself and is positively correlated to self-esteem, life satisfaction, and optimism (Alessandri, Caprara, & Tisak, 2012). So, what other factors contribute to the non-genetic portion of life satisfaction? Aspects of life such as relationship quality, optimism, social self-efficacy, and regulation of negative emotions are predictors of positive orientation, but there may be other factors that account for differences in life satisfaction (Caprara & Steca, 2005).

Religious context

Since 1985, there have been many studies that have focused on the correlation between religiosity and subjective well-being (the overall quality of life); however, there have been no studies that have specifically explored the link between faith maturity and life satisfaction. One study that examined the connection between religiosity and subjective well-being is Leonardi and Gialamas (2009). The researchers focused on the importance of religion and the frequency that participants attended church and prayed. They then looked at the correlation between this and psychological well-being, life satisfaction, and mental health. While they only saw small correlations between these, this could partly be due to the fact that participants' actions did not always seem to match their beliefs. Though 78% of people reported that religion is either important or very important to them, only about 14% of participants reported that they attend church once per week or more, whereas 60% of participants reported attending church only a few times per year (Leonardi & Gialamis, 2009). This means that at least 64% of people who reported that their religion is important or very important to them do not attend church regularly. This discrepancy raises the question of whether results would be different if participants' perception of the importance of religion matched their actions.

Research has indicated that there is a link between spiritual well-being and lower rates of depression (Hawkins, Tan, & Turk, 1999). There is a statistically significant difference between participants that are involved in church-related activities and participants that are not, supporting further research on this subject. A related study was conducted that found a positive correlation between the belief in a kind, caring God and healthy emotional well-being among participants aged 18 to 86. A negative correlation between the belief in a kind, caring God and substance abuse was also found (Ciarrochi & Brelsford, 2009). This shows that both emotional health and addictive tendencies are important aspects of overall life satisfaction and contribute to overall well-being.

Yet another study indicated that there is a positive correlation between intrinsic religious faith and psychological well-being (Laurencelle, et al., 2002). The researchers focused on ego strength, superego strength, anxiety, depression, and character pathology and found that participants with moderate to high religious faith scored significantly better in each of these categories than participants with low levels of religious faith. These results show that there is a link between religious faith and psychological well-being (Laurencelle, et al., 2002). Other studies have shown that there is a relationship between religiosity and positive psychological well-being (Hawkins, Tan, & Turk, 1999). But does this relationship extend to life satisfaction, and if so, how much? A good deal of research has been done to support the link between faith and psychology, but there is a lack of research examining the link specifically between faith maturity and life satisfaction.

If there is a statistically significant correlation between faith maturity and life satisfaction, this could open doors for deeper research into the subject. Further investigation could be done to find what the significant components of faith maturity are that contribute to life satisfaction, as compared to overall faith maturity. For example, is it the community, meditation, or hopefulness that contribute most to life satisfaction? Because there have already been several links found between religion and subjective well-being, this could be further evidence to support the inclusion of faith maturity as a valid measure of life satisfaction.

RESEARCH QUESTIONS AND HYPOTHESES

- 1. Does faith maturity positively correlate with life satisfaction?*
- 2. How does the correlation between life satisfaction and faith maturity compare to the correlation between self-esteem and life satisfaction and the correlation between life orientation and life satisfaction?*
- 3. How much of the variability of faith maturity is predicted by life satisfaction and how does this compare to other known indicators of life satisfaction?*

I hypothesized that participants who scored high on faith maturity would also score high on life satisfaction. It was also hypothesized that the correlation coefficient between faith maturity and satisfaction with life would be significant and equal to or greater than the correlation coefficients between self-esteem and life satisfaction and between life orientation and life satisfaction. The final hypothesis was that faith maturity would predict life satisfaction as much as other known indicators of life satisfaction would.

METHODS

Participants

Undergraduate students from a small, denominationally-affiliated university in the Midwest were asked to participate. An email with a link to the survey was sent to approximately 2,900 students. Seven hundred and seventeen students responded; however, not every participant answered all the questions. Out of the 717 students, six chose not to participate in the survey. Another 62 participants did not answer all the

questions, so their responses were excluded from the data. Six hundred and forty-nine of the students' responses were complete and kept for data analysis. Students between the ages of 17 and 22 made up 88.7% of the participants, and the other 11.3% were between the ages of 23 and 46, with the average age being 20.75 years old. Three hundred eighty-seven of the participants were female, 176 were male, and 86 did not specify their sex. Of the participants, six identified as agnostic, one identified as atheist, 586 as Christian, 16 as non-religious, and 40 did not specify their religious affiliation. Five hundred and sixteen of the participants identified as White, 33 as Hispanic, Latino, or Spanish Origin, 22 as African American, 13 as Asian, four as American Indian or Alaska Native, one Middle Eastern or North African, 10 answered "other," and 14 preferred not to answer.

Materials

Life satisfaction

Life satisfaction was measured using the Satisfaction with Life Scale (Diener, et al., 1985). The five-item-self-report scale used a seven-point Likert scale with endpoints that ranged from 1 (Strongly Disagree) to 7 (Strongly Agree) to measure general life satisfaction. The higher the score, the more satisfied the participant is with his life. The internal consistency for this test was .84.

Faith maturity

The Faith Maturity Scale (Benson, Donahue, & Erickson, 1993) was used to measure faith maturity. The Faith Maturity Scale utilized a seven-point Likert scale ranging from 1 (Never True) to 7 (Always True) to assess indicators of faith rather than faith itself. The "eight core dimensions" that the researchers determined account for indicators of faith and faith maturity are "trusts and believes" in God and Jesus Christ, "experiences of the fruits of faith," "integrates faith and life," "seeks spiritual growth," "experiences and nurtures faith in community," "holds life-affirming values," "advocates social change," and "acts and serves." Four to six questions were then written by the scale's authors for each of these eight dimensions, leading to a 38-item inventory, with five of these items being reverse scored. A higher score meant that the participant had a greater level of faith maturity. Based on Cronbach's alpha, we decided to not reverse score one of the five items that was reverse scored in the original scale, and reverse score two other items that were not originally reverse scored. After these changes, the internal consistency for this scale was .92.

Life orientation

Optimism was measured using the Revised Life Orientation Test (Scheier, Carver, & Bridges, 1994). This test consisted of 10 statements scored on a five-point Likert scale ranging from 0 (Strongly Disagree) to 4 (Strongly Agree). Three of the 10 statements were reverse-coded, and four of the 10 statements were filler items, meaning that the Likert scores of six of the 10 statements (including the three reverse-coded statements) were summed to find an overall life orientation score, with a higher score showing a greater level of optimism. The internal consistency for this test was .77.

Self-esteem

The final scale used was the Rosenberg Self-Esteem Scale (1965) to measure "global self-worth by measuring both positive and negative feelings about the self." The scale

consisted of 10 statements measured on a four-point Likert scale with endpoints that ranged from 1 (Strongly Disagree) to 4 (Strongly Agree) with five of the 10 statements being reverse-scored. After reverse scoring five of the items, an overall score was obtained by summing responses to each of these items, with higher scores representing greater levels of self-esteem. The internal consistency for this was .87.

Demographics

Questions pertaining to age, gender, ethnicity, and religious affiliation were also included.

Procedures

A 67-question survey was emailed to approximately 2,900 undergraduate students. The email contained a brief description of the study, as well as the link leading to the study. The link led participants to an informed consent page where the participants had the option to continue with the survey or not participate with the survey following their consent. The survey included questions from the Satisfaction with Life Scale (Diener, et al., 1985), the Faith Maturity Scale (Benson, Donahue, & Erickson, 1993), the Revised Life-Orientation Test (Scheier, Carver, & Bridges, 1994), the Rosenberg Self-Esteem Scale (Rosenberg, 1965), and four demographic questions. The survey was open for three weeks, with follow-up emails sent at the beginning of the second and third week. SNAP Survey Software was used to house the survey and collect the data.

RESULTS

Table 1 shows the correlations of the Faith Maturity Scale to each of the other three scales (Satisfaction with Life Scale, Revised Life Orientation Test, and Rosenberg Self-Esteem Scale) and the correlations of the Satisfaction with Life Scale to the Rosenberg Self-Esteem Scale and Revised Life Orientation Test. Each of these correlations were positive and statistically significant. These results answered the first research question, that faith maturity is positively correlated with life satisfaction and that this is a medium effect size. These results also answered the second research question, that the correlation between life satisfaction and faith maturity was smaller than both the correlation between self-esteem and life satisfaction and the correlation between life orientation and life satisfaction.

TABLE 1

Intercorrelations and descriptive statistics of the Faith Maturity Scale, Satisfaction with Life Scale, Revised Life Orientation Test, and Rosenberg Self-Esteem Scale.

Variable	Mean	SD	Alpha	1	2	3	4
1. Faith Maturity	185.61	28.73	.92	–			
2. Life Satisfaction	25.66	5.60	.84	.42*	–		
3. Life Orientation	14.73	3.64	.77	.45*	.53**	–	
4. Self-Esteem	28.69	4.82	.87	.39*	.59**	.66**	–

Note. Ns = 584 – 705. All correlations are significant ($p < .01$). *Medium effect size. **Large effect size

To answer research question 3, coefficients of determination were found for life satisfaction. According to the data, 18% of the variability in life satisfaction could be predicted from faith maturity, compared to 28% of the variation in life satisfaction predicted by life orientation and 35% of variation in life satisfaction predicted by self-esteem. Results also showed that 21% of the variability in life orientation could be predicted by faith maturity.

An independent samples t-test was conducted to compare life satisfaction in this study (undergraduate students from a small, denominationally-affiliated university in the Midwest) and life satisfaction in Diener, et al.'s (1985) study (undergraduate students from a large, public university in the Midwest). There was a significant difference in the scores from this study ($M = 25.66$, $SD = 5.60$) and the scores from Diener, et al.'s study ($M = 23.50$, $SD = 6.43$); $t(859) = 4.42$, $p < .01$, $d = 0.37$. This is a medium effect size.

Further analysis of the data showed a significant difference in faith maturity between Protestant Christian participants and Catholic Christian participants. Protestant Christian participants ($M = 188.79$, $SD = 26.25$) had a significantly higher faith maturity than Catholic Christian participants ($M = 175.41$, $SD = 26.41$); $t(617) = 2.88$, $p = .004$, $d = 0.52$. This is a large effect size. There was no significant difference in life satisfaction between Protestant Christians ($M = 25.77$, $SD = 5.55$) and Catholic Christians ($M = 26.03$, $SD = 5.62$); $t(649) = -.63$, $p = 0.79$.

In addition, a multiple regression analysis was carried out to predict life satisfaction based on self-esteem, faith maturity, and life orientation. It was concluded that all the variables together were statistically significant indicators of life satisfaction, $F(3,560) = 131.12$, $p < .001$, $R^2 = .41$. Specifically, faith maturity ($\beta = .13$, $t(1) = 3.53$, $p < .01$, $\eta_p^2 = .02$), self-esteem ($\beta = .42$, $t(1) = 9.51$, $p < .01$, $\eta_p^2 = .14$), and life orientation ($\beta = .20$, $t(1) = 4.57$, $p < .01$, $\eta_p^2 = .04$) were all positively correlated to life satisfaction. According to this, all three variables were significant predictors of life satisfaction. Because each scale used had different maximum point values, the standardized β coefficients are used. When the variables were standardized, for every point that faith maturity increased, life satisfaction increased .13 points. For every point that life orientation increased, life satisfaction increased .20 points. For every point that self-esteem increased, life satisfaction increased .42 points. According to the multiple regression, self-esteem was the greatest predictor of life satisfaction for the participants, followed by life orientation and then faith maturity.

TABLE 2

Multiple regression predicting life satisfaction from faith maturity, life orientation, and self-esteem.

Variable	B	Std. Error	Std. Coefficients β	df	t	Significance	Partial Eta Squared
Faith Maturity	.03	.01	.13	1	3.53	.00	.02*
Life Orientation	.30	.07	.20	1	4.57	.00	.04*
Self-Esteem	.47	.05	.42	1	9.51	.00	.14**
(Constant)	3.12	1.34	—	—	2.33	.02	—

Note. All correlations are significant ($p < .05$). *Medium effect size. **Large effect size.

DISCUSSION

The purpose of this project was to assess the correlation between life satisfaction and faith maturity and to compare that correlation to other known correlates of life satisfaction, namely self-esteem and life orientation. It was found that as faith maturity increases, life satisfaction also increases and as faith maturity decreases, life satisfaction also decreases. This relationship is statistically significant. It was also found that as self-esteem increases, life satisfaction increases and as life orientation increases, life satisfaction increases. The relationship between faith maturity and life satisfaction is smaller than both the relationship between life satisfaction and self-esteem and the relationship between life satisfaction and life orientation; however, it is still statistically significant, meaning that it is unlikely that these results are due to chance. The data showed that life satisfaction could be better predicted by life orientation and self-esteem than faith maturity. The data also showed that faith maturity was a better predictor of life orientation than life satisfaction. This is consistent with Alessandri, Caprara, and Tisak's (2012) study that found a link between positive orientation, life satisfaction, self-esteem, and optimism. This is also in line with studies examining the relationship between intrinsic religious faith and psychological well-being (Laurencelle et al., 2002). Laurencelle et al. (2002) also found that, while high-faith participants had significantly higher psychological well-being than moderate-faith individuals, there was quite a bit of variability within each group. While these studies focused on psychological well-being and health, it is interesting to note that actual satisfaction with life is linked to faith maturity. Psychological well-being, often measured by physical or psychological health (Hill & Pargament, 2003; Pearce et al., 2015), can be a somewhat objective factor, but the results of this study showed that people with a more mature faith also subjectively viewed their life as more satisfying. This study has also indicated that faith maturity is a significant predictor of life satisfaction specifically among Christian college students compared with all adults of different ages (Leonardi & Gialamis, 2009) and religious beliefs and backgrounds (Laurencelle et al., 2002).

Additional analyses showed that the life satisfaction of participants in this study was greater than the life satisfaction of participants in Diener, et al.'s (1985) study of life satisfaction. We also found that, although Protestant Christians have an average greater faith maturity than Catholic Christians, both groups have very similar life satisfaction scores. This is an interesting finding, especially because there is a lack of research examining the faith maturity of Christian denominations and Roman Catholics. While Benson et al. (1993) examined the results of the faith maturity scale given to several denominations, including the Christian Church, Disciples of Christ; Evangelical Lutheran Church in America; Presbyterian Church; United Church of Christ; United Methodist Church and Southern Baptist Convention, the Roman Catholic Church was not included.

Limitations

Some possible limitations with this study are the extensive use of self-report data. Self-report data is a very efficient way of collecting large amounts of data; however, it may not be completely reliable if participants do not have a solid understanding of themselves. Also, these results cannot be generalized to the entire population because of this study's limited participant demographics. The participant demographics were undergraduate students and the ethnicities of the participants did not reflect the general population. In this

study, the Caucasian ethnic group (84% of participants) was greater than the percentage of Caucasians that make up the United States population (76.6%) while the other ethnicities represented in the study made up a smaller proportion of the participant population than their proportion of the population of the United States. Further, neither the Faith Maturity Scale nor the Satisfaction with Life Scale measure actual activity that shows faith maturity or life satisfaction. Rather, they ask about thoughts and feelings associated with these variables. These scales may become a more reliable reflection of true faith maturity and life satisfaction if activity and behavior are studied in addition to self-report data.

Future research

Future research might seek to further examine the relationship between faith maturity and life satisfaction; exploring which components of faith maturity specifically point to life satisfaction or further exploring the link between these two variables and life orientation. Another useful possibility to examine this relationship would be an experimental study that compares a group of participants who spend a certain amount of time each week doing faith-related activities such as going to church, reading a Bible, or attending a small group bible study to a group that does not participate in any faith-based activities and examining their life satisfaction. The results from the comparison between this study and Diener et al.'s (1985) study brings into question the cause of this difference in life satisfaction and opens the door to research that could explore life satisfaction on different college campuses, among different faith denominations and traditions, and among other age groups.

REFERENCES

- Alessandri, G., Caprara, G. V., & Tisak, J. (2012). The unique contributions of positive orientation to optimal functioning: further explanations. *European Psychologist*, 17(1), 44-54. doi:10.1027/1016-9040/a000070
- Bastian, B., Kuppens, P., De Roover, K., & Diener, E. (2014). Is valuing positive emotion associated with life satisfaction? *Emotion*, 14(4), 639-645. doi:10.1037/a0036466
- Benson, P. L., Donahue, M. J., & Erickson, J. A. (1993). The faith maturity scale: conceptualization, measurement, and empirical validity. *Research in the Social Scientific Study of Religion*, 5(1), 1-26.
- Blachnio, A., Przepiorka, A., & Pantic, I. (2016). Association between Facebook addiction, self-esteem and life satisfaction: A cross-sectional study. *Computers in Human Behavior*, 55, 701-705. doi:10.1016/j.chb.2015.10.026
- Caprara, G. V., Fagnani, C., Alessandri, G., Steca, P., Gigantesco, A., Sforza, L. C., & Stazi, M. A. (2009). Human optimal functioning: the genetics of positive orientation towards self, life, and the future. *Behavior Genetics*, 39(3), 277-284. doi:10.1007/s10519-009-9267-y

Caprara, G. V., & Steca, P. (2005). Affective and social self-regulatory efficacy beliefs as determinants of positive thinking and happiness. *European Psychologist*, 10(4), 275-286. doi:10.1027/1016-9040.10.4.275

Cheung, F. (2018). Income redistribution predicts greater life satisfaction across individual, national, and cultural characteristics. *Journal of Personality and Social Psychology*, 115(5), 867–882. <https://doi.org/10.1037/pspp0000164.supp>

Ciarrochi, J.W., & Brelsford, G. M. (2009). Spirituality, religion, and substance coping as regulators of emotions and meaning making: Different effects on pain and joy. *Journal of Addictions & Offender Counseling*, 30(1), 24-36. doi:10.1002/j.2161-1874.2009tb00054.x

Diener, E., Emmons, R. A., Larsen, R. J., & Griffin, S. (1985). The satisfaction with life scale. *Journal of Personality Assessment*, 49(1), 71-75.

Diener, E., Napa Scollon, C. K., Oishi, S., Dzokoto, V., & Suh, E. M. (2000). Positivity and the construction of life satisfaction judgments: global happiness is not the sum of its parts. *Journal of Happiness Studies*, 1(2), 159-176. doi:10.1023/A:1010031813405

Diener, E., Oishi, S., & Lucas, R.E. (2011). Subjective well-being: The science of happiness and life satisfaction. In S.J. Lopez & C.R. Snyder, *The Oxford Handbook of Positive Psychology* (2nd ed.) (187-194). New York: Oxford University Press.

Hawkins, R. S., Tan, S., & Turk, A.A. (1999). Secular versus Christian inpatient cognitive-behavioral therapy programs: impact on depression and spiritual well-being. *Journal of Psychology & Theology*, 274(4), 309-318.

Hill, P. C., & Pargament, K. I. (2003). Advances in the conceptualization and measurement of religion and spirituality: implications for physical and mental health research. *American Psychologist*, 58, 64–74. doi:10.1037/0003-066X.58.1.64

Ivtzan, I., Chan, C. P. L., Gardner, H. E., & Prashar, K. (2013). Linking religion and spirituality with psychological well-being: Examining self-actualisation, meaning in life, and personal growth initiative. *Journal of Religion and Health*, 52(3), 915–929. <https://doi-org.proxy.olivet.edu/10.1007/s10943-011-9540-2>

Laurencelle, R. M., Abell, S. C., & Schwartz, D. J. (2002). The relation between intrinsic religious faith and psychological well-being. *International Journal for the Psychology of Religion*, 12(2), 109-123. doi:10.1207/S15327582IJRP1202_03

Leonardi, A. & Gialamas, V. (2009). Religiosity and psychological well-being. *International Journal of Psychology*, 44(4), 241-248. doi:10.1080/00207590701700529

Okun, M. A. & Stock, W. A. (1987). Correlates and components of subjective well-being among the elderly. *The Journal of Applied Gerontology*, 6(1).

Pearce, M. J., Koenig, H. G., Robins, C. J., Nelson, B., Shaw, S. F., Cohen, H. J., & King, M. B. (2015). Religiously integrated cognitive behavioral therapy: a new method of treatment for major depression in patients with chronic mental illness. *Psychotherapy*, 52(1), 56-66. doi:10.1037/a0036448

Powell, R., & Pepper, M. (2015). Subjective well-being, religious involvement, and psychological type among Australian churchgoers. *Mental Health, Religion & Culture*, 18(1), 33-46. doi:10.1080/13674676.2014.1003170

Rosenberg, M. (1965). *Society and Adolescent Self-image*. Princeton University Press.

Scheier, M. F., Carver, C. S., & Bridges, M. W. (1994). Distinguishing optimism from neuroticism (and trait anxiety, self-mastery, and self-esteem): A reevaluation of the Life Orientation Test. *Journal Of Personality And Social Psychology*, 67(6), 1063-1078. doi:10.1037/0022-3514.67.6.1063