



## Validation of happiness scale convergence in santri through Multi-trait Multi-method Analysis

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**Abstract:** Happiness is a concept that is difficult to understand to this date. Differences in individual perspectives in interpreting happiness also affect the processing construct of the measurement. This study aims to conduct convergent validation of the existing happiness scale. Convergent validation can test how good the happiness scale is by comparing the externally to another scale that is considered to have a relationship. The happiness convergent-scale validation adapted the Multi-trait Multi-method (MTMM) analysis. Respondents involved in this study were 185 students from traditional Muslim schools or Santri who were selected according to the specified characteristics and studied at UIN Sunan Gunung Djati Bandung. The three measuring instruments used are the Oxford Happiness Questionnaire (OHQ), the Indigenous Happiness Scale (IHS), and the World Health Organization Quality of Life-Bref (WHOQOL-Bref). The correlation coefficient ( $r$ ) shows values of 0.52 (OHQ-IHS), 0.53 (OHQ-WHOQOL-Bref), and 0.45 (IHS-WHOQOL-Bref). The result indicated that the correlation of the three scales tested has a statistically high relationship so that the three measuring instruments used have convergent validity and can be used to measure the construct of happiness.

**Keywords:** convergent validation; culture; happiness; religion; santri

**Abstrak:** Kebahagiaan merupakan konsep yang sulit untuk dipahami sampai sekarang. Perbedaan cara pandang individu dalam memaknai kebahagiaan akan berpengaruh pula terhadap proses pengukuran konstruk tersebut. Penelitian ini bertujuan untuk melakukan validasi konvergen dari skala kebahagiaan yang telah ada. Validasi konvergen dapat menguji seberapa baik skala kebahagiaan dengan membandingkannya secara eksternal dengan skala lain yang dianggap memiliki hubungan. Validasi konvergen skala kebahagiaan mengadaptasi analisis *Multi-trait Multi-method* (MTMM). Responden yang terlibat dalam penelitian ini berjumlah 185 santri yang dipilih sesuai dengan karakteristik yang ditentukan dan berkuliah di UIN Sunan Gunung Djati Bandung. Tiga alat ukur yang digunakan adalah *Oxford Happiness Questionnaire* (OHQ), *Skala Kebahagiaan Indigenous* (IHS), dan *World Health Organization Quality of Life-Bref* (WHOQOL-Bref). Koefisien korelasi ( $r$ ) menunjukkan nilai sebesar 0.52 (OHQ-IHS), 0.53 (OHQ-WHOQOL-Bref), dan 0.45 (IHS-WHOQOL-Bref). Hasil ini menunjukkan bahwa korelasi ketiga skala yang diujikan mempunyai hubungan yang tinggi secara statistik sehingga ketiga alat ukur yang digunakan mempunyai validitas konvergen dan dapat digunakan untuk mengukur konstruk kebahagiaan.

**Kata Kunci:** agama; budaya; kebahagiaan; santri; validasi konvergen

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## Introduction

Happiness is a precisely broad concept. Many studies have addressed the topic of happiness, especially after the emergence of studies on positive psychology (Seligman, 2002). However, the concept of happiness is still difficult to understand (Akhtar, 2018; Oishi, Graham, Kesebir, & Galinha, 2013). This happens because of cultural and historical factors. Oishi et al. (2012) explained that in various cultures and times, happiness is defined differently, happiness as good fortune or happiness as an externally sought condition.

Happiness can be defined in various contexts, such as ethics, religion, politics, economics, and psychology (Lu, Gilmour, & Kao, 2001). But in a broad sense, happiness is all terms that refer to a good quality of life (Veenhoven, 2012). This definition is based on the fact that happiness is in line with the three contents of quality of life, such as the quality of the environment, the quality of actions, and the pleasure of subjective life (Veenhoven, 2001). Also, Medvedev & Landhuis (2018) in his research showed that quality of life can define 75% happiness and 66% well-being.

The development of science and research result brings up several terms or concepts that have in common or are often exchanged for happiness because they have a closeness of meaning (E. Diener, 2006), such as quality of life, positive feelings, and subjective well-being. The existence of these terms is also supported by research that explained the relationship between these terms (Medvedev & Landhuis, 2018).

Psychology explains happiness through two different approaches, the achievement of subjective life satisfaction and the achievement of a meaningful quality of life (Ramdani & Prakoso, 2019). Both approaches emerge from two major models or philosophies that underlie them.

Although there are many philosophies in defining happiness (Oishi et al., 2013), in the development of studies on happiness only the hedonic and eudemonic models are often used (Joshnloo, 2013).

The hedonic model is stated that happiness or pleasure is the highest goal to be achieved by humans (Joshnloo, 2013; Mayasari, 2014). The concept of happiness in hedonist measures the degree to which people are satisfied with their achievements in life, have pleasant experiences, and are free from stressful thoughts (Mayasari, 2014). In its development, happiness in the hedonic model has risen to the concept of subjective well-being (SWB). Subjective well-being measures three aspects in human beings, namely the evaluation of the whole of life and the two hedonic sides of happiness, the presence of positive feelings and the absence of negative emotions (Diener, 1984).

Meanwhile, the eudaemonist concept is explained that people are stated to be happy and prosperous when filling their lives with things that are meaningful, purposeful, useful for the welfare of others and self-development (Mayasari, 2014). To be happy, eudaemonists is explained that people must rely on ethical values (Joshnloo, 2013). Eudaemonist happiness has resulted in the concept of psychological well-being (Ryff & Keyes, 1995). There are six dimensions measured in Psychological well-being (PWB), namely autonomy, mastering the surrounding environment, self-development, being able to establish good relationships with others, being able to accept yourself, and have a purpose in life.

Besides being described differently through the two models above, happiness can also be defined differently in various religions and cultures (Joshnloo, 2014; Nasr, 2014). Each religion and culture has a different definition of explaining

happiness (Lu & Shih, 1997; Nasr, 2014). For Muslims, happiness is achieved in the present (world realm) and the future after death or the afterlife (Nasr, 2014). Happiness in the world is artificial happiness. Meanwhile, real happiness will be achieved when humans have entered heaven. In Christianity, the vision of happiness is to harmonize moral values, transcendental happiness, and world enjoyment (Jefferts Schori, 2014). Meanwhile, Buddhism uses mind training or meditation to achieve happiness (Dalai Lama, 2014). Different opinions were found in Judaism and Hinduism.

Some studies discuss the relationship between religion and happiness. Hossain, Ahsan, & Rizvi (2017) in their research stated that there is a positive relationship between happiness and religiosity. Transcendent factors and social factors are considered as factors that bridge the gap between religiosity and happiness (Argyle, 2000).

Besides religion, culture also influences the concept of happiness. Every culture has similarities and differences in understanding the concept of happiness (Oishi et al., 2013). There are different concepts or theories of happiness between Westerners and Easterners (Akhtar, 2018; Uchida, Norasakkunkit, & Kitayama, 2004). Western (American-European) theory emphasizes individuality and autonomy which are concerned with personal achievement, whereas Easterners consider it interdependent to achieve happiness (E. F. Diener & Suh, 2000). These differences are based on religious and historical ideologies (Salsabila, Rofifah, Natanael, & Ramdani, 2019). The difference in values held also affects the level of achievement of happiness (Lu et al., 2001). Besides, the meaning of the words used to express happiness is different in various cultures (Oishi et al., 2013).

Islam has a special view of happiness (Abde & Salih, 2015). Al-Quran as a guide for Muslims in the world to mention the word happy in the Al-Quran in different words (Saadati, Amin, & Salimi, 2015). The word *sa'adah* is a word that can represent happiness in Islam (Abde & Salih, 2015; Nasr, 2014). The word *Sa'adah* represents happiness in the world and also happiness in the afterlife. Ibn Miskawaih in his book entitled "*Tahdzibu Ahlak*" stated that happiness is the most perfect goodness. According to him, the human being will not be able to achieve true happiness when they are still in the world and are still at one with the material nature (Miskawaih, 1994).

Islam concentrates on achieving true happiness (happiness in the hereafter) compared to temporary happiness such as hedonic culture (Nasr, 2014). To achieve happiness, in Al-Quran Surat An-Nahl verse 97 it is stated that happiness will be given to anyone who does good deeds. Islam also teaches that true happiness will be achieved when humans can fill their lives with meaning and purpose (Abde & Salih, 2015). Differences in defining happiness which is motivated by cultural and religious differences influence the measurement of happiness (Akhtar, 2018). Therefore, it is important to know how well the measuring instrument used in measuring happiness.

One of the requirements for a measuring tool in good psychology is to have validity (Azwar, 2012). Validity refers to the accuracy of measuring instruments that measure what is being revealed. Construct validity is one of the various types of psychological validation measuring important instruments, in addition to content validity, concurrent validity, and predictive validity (Cronbach & Meehl, 1955). The current concept of validation refers to a holistic

definition, in which validity is a unified whole in which there are various stages or proofs that researchers must undertake to obtain comprehensive validation result (Pitts & Naumenko, 2016). According to Cronbach and Meehl (1955), construct validity is important in various forms of psychological tests. It aims to find empirical evidence about the truth of the psychological construct used. Also, by specifying the psychological construct used will provide more valid information about the scale obtained in research. (Flake, Pek, & Hehman, 2017)

One form of proof of the validity of a scale is to look at evidence of convergent validation (Flake et al., 2017). Convergent validation is a test of construct validity by finding out the relationship between constructs which theoretically measure the same construct (Pitts & Naumenko, 2016). Because convergent validity is a form of external validity (Flake et al., 2017), convergent validation can determine whether the measuring device that has been prepared has measured the intended trait by comparing it with other measuring devices (Prakosa, 1995).

Studies with the theme of happiness so far more often examine the relationships, influences, and factors between happiness and concepts that are thought to have links to happiness, such as quality of life, religiosity, income levels, and values. Research that addresses the construct of happiness is specifically conducted by Medvedev & Landhuis, (2018). Their research is shown that there is a relationship between happiness, personal well-being (subjective-well-being), and quality of life. But in their conclusion, they stated that the three expressions (happiness, welfare, and quality of life) were interchangeable. They did not discuss and not conclude about how well the measuring instrument they used in measuring the three constructs. Based on cultural considera-

tions, religion, and evaluation of previous studies, this study aims to determine the convergent validity of the happiness scale.

## Method

This study uses a correlational survey method that aims to see a relationship between the variables tested (Azwar, 2017). The survey method used in the form of a psychological scale that measures the attitudes, perceptions, and tendencies of respondents related to the construct of happiness. Statistical analysis in the study aims to find out whether the scale of happiness used can prove that the relationship established by the three scales can produce convergent evidence of the scale or not. To determine the convergent validity of the happiness scale, this study adopted the analysis of the multi-trait multi-method correlation matrix (MTMM) (Campbell & Fiske, 1959). The ease of interpretation and simplicity in the foundation of his theory make the MTMM method so impressive.

In making MTMM correlation matrices, there must be at least two constructs (trait) and two methods used. From these two traits and methods, 4 parts will be formed which have different strengths. The four parts are heterotrait-heteromethod correlation, heterotrait-monomethod correlation, monotrait-heteromethod correlation, and monotrait-monomethod correlation. The relationship built by the same construct and method has a stronger relationship than the relationship between the construct and the different methods. Hence, the monotrait-monomethod correlation has the strongest relationship and heterotrait-heteromethod correlation has the weakest relationship. Meanwhile, the other two parts, monotrait-heteromethod correlation and heterotrait-monomethod correla-

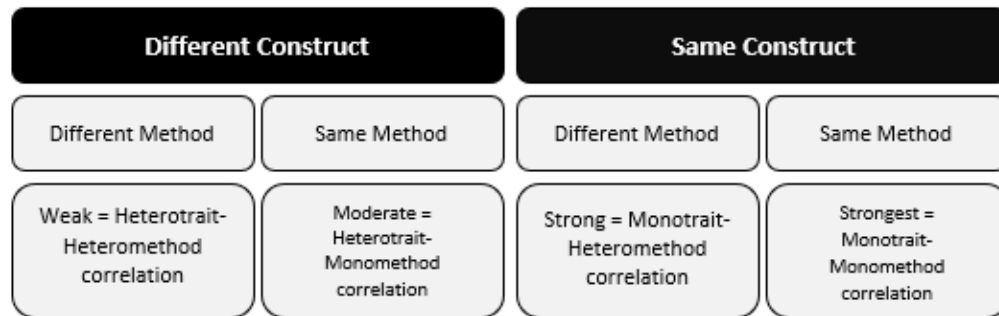


Figure 1.  
Hierarchy diagram of relationship strength based on the method and trait used by Campbell and Fiske, (1959)

-tion where monotrait-heteromethod correlation have a stronger relationship than heterotrait-monomethod correlation (see Figure 1.)

This study uses three measuring devices that measure the construct of happiness. The happiness scale used in this study is the Oxford Happiness Questionnaire (Argyle & Hills, 2002), the Indigenous Happiness Scale (Anggoro & Widhiarso, 2010), and the World Health Organization Quality of Life-Bref (WHOQOL Group, 1998).

The Oxford Happiness Questionnaire (OHQ) is a happiness scale developed from the Oxford Happiness Inventory (OHI) (Argyle & Hills, 2002). OHI is an inventory created as an alternative scale for non-clinical populations with a focus on the manifestation of positive feelings rather than anxiety. OHQ has 29 items, a total of 20 items are items adapted from OHI and 9 items of which OHQ measures nine aspects, namely social interest, kindness, entertainment, awareness of life goals, beauty, independence, self-efficacy, physical health, and self-esteem (Kashdan, 2004). This research uses OHQ which has been adapted into Indonesian (Rahmawati, Irmayanti Saragih, & Adeline, 2017). Previously, after exploratory factor analysis was conducted on 450 subjects

(male = 193 and female = 257), a KMO value of 0.90 was obtained and Barlett's test of Sphericity with a p-value of 0.001. The two results met the eligibility criteria with the KMO criteria that must be greater than 0.5 and Barlett's test of Sphericity criteria must be less than 0.01. The scale format used in this scale is the Likert scale with options 1-6 (strongly disagree to strongly agree). Item parameter estimates made for 29 items have a discriminatory power of more than 0.5. This means that items have a high discrimination power (Iedliany, Fahmie, & Kusriani, 2018). So it can be concluded that the Indonesian version of the OHQ scale is feasible to use.

The Indigenous happiness scale (IHS) is a measure of happiness based on Indonesian contextual aspects that are down to earth and are expected to photograph social phenomena according to their contextual frames (Anggoro & Widhiarso, 2010). IHS measures four human dimensions, namely family ties or feelings, personal achievements or achievements, social relations, and spiritual needs (Anggoro & Widhiarso, 2010). Each aspect accounts for 10 items for this scale, so this scale has 40 items. Likert scale format used in this study with 5

answer choices ranging from very inappropriate to very appropriate. After a psychometric test, the Alpha-Cronbach reliability value was 0.90. This value meets the reliability requirements of Azwar (2012) which stated that the reliability coefficient of a measuring instrument is mentioned to be satisfactory if it has a value above 0.7. The validity test also showed a satisfying result. The IHS scale has good validity, where the convergent validity value of the IHS scale was tested on 111 respondents with 3 other scales (Rosenberg Self-esteem Scale, PGC Morale Scale, and Self-Esteem Inventory Coopersmith) having correlations above 0.3. This means that the scale of indigenous psychology happiness is feasible to be used to measure the construct of happiness.

WHO Quality of Life (WHOQOL) is made to measure the quality of life that can be used in various cultures. Quality of life can be interpreted as a person's assessment or evaluation of his situation in the context of culture and value systems that have to do with expectations, expectations, criteria, and concepts (WHOQOL Group, 1998). This definition showed that quality of life refers to subjective evaluations that are inherent in the cultural, social, and environmental context (WHOQOL Group, 1998). The quality of life scale used in this study is a scale in the short version of WHOQOL or called WHOQOL-Bref. WHOQOL-Bref consists of 26 items that measure psychological aspects (6 items), social relations (3 items), physical health (7 items), environment (8 items), and general happiness (2 items). The scale format used is Likert by focusing on the frequency of individuals feeling happiness with five answer choices that span from 1-5. WHOQOL-Bref used previously has been adapted into Indonesian (Purba et al., 2018). The reliability coefficient value for 1046 respondents has a value of 0.7 to 0.79 for all dimensions in it.

The sample in this study were the students who studied at UIN Sunan Gunung Djati Bandung. The sampling technique used is a non-probability technique. The non-probability method aims to take a certain number of samples that are considered to reflect the characteristics of the population (Azwar, 2017). More specifically convenience sampling is used to get samples that match the characteristics that have been determined by researchers. Santri deliberately was chosen as a subject of research because students are considered capable of representing happiness (Anggraeni, 2011) and Islamic religious culture (Ramdani, Supriyatin, & Susanti, 2018). Non-probability sample selection is conducted on boarding students living around the campus of UIN Sunan Gunung Djati Bandung because the activities of boarding students are strictly guarded by Islamic boarding schools so that they are always above Islamic values and social values. All respondents obtained informed consent as a form of their agreement to be involved in this study. More details about the demographics of respondents can be shown in Table 4.

Data that has been collected by the author, then carried out screening to see whether there is data missing or not. After that, the data is tabulated based on conformity with the construct used. The author tests the normality and tests the Pearson correlation to see the relationship between constructs that are validated. Whether or not the convergent value of a scale can be seen from the correlation value obtained by comparing the three scales.

## Result

The Kolmogorov-Smirnov normality test showed that data from all three scales, OHQ, SKI, and WHOQOL-Bref are normally distributed because the significance level of the three scales is more than 0.05 (OHQ = 0.805, SKI = 0.324, &

WHOQOL-Bref = 0.659). The full normality test is as in Table 1. This is in line with what was delivered by Widhiarso, (2008) that the data are normally distributed when the significance level is more than 0.05. The three scales that are normally distributed indicate that the scale has good data distribution and no data is the outlier. After the normality test is done, the next step is to look at the reliability values for each scale used. The result of the reliability test for each scale can be shown in table 2.

The reliability test uses Alpha-Cronbach because the nature of the measurement in this study is to find the internal consistency of each scale. The

reliability coefficient of the three measuring instruments has very good value because the third is more than 0.7 (Ramdani, 2018). The scale with the highest reliability coefficient is the IHS scale, then WHOQOL-Bref and the smallest is OHQ. Next, the authors conducted a correlation test to obtain the convergence results from the three scales used (see table 3)

The correlation matrix of the three scales (table 3) showed that the correlation value is greater than the validity value so that the three scales meet the requirements to be tested for convergent validity criteria (Prakosa, 1995). All

Table 1.  
Normality Test

		One-Sample Kolmogorov-Smirnov Test		
		OHQ	IHS	WHOQOL-Bref
N		185	185	185
Normal Parameters	Mean	122.16	165.07	90.81
	Std. Deviation	13.21	13.32	10.23
Most Extreme Differences	Absolute	.047	.070	.054
	Positive	.040	.039	.054
	Negative	-.047	-.070	-.048
Test Statistic		.642	.953	.731
Asymp. Sig. (2-tailed)		.805	.324	.659

Table 2.  
Reliability Coefficient

	OHQ	IHS	WHOQOL-Bref
Alpha	0.719	0.883	0.858

Tabel 3.  
Matrix Correlation of Happiness Scal

	OHQ	IHS	WHOQOL-Bref
OHQ	(1)		
IHS	0,52	(1)	
WHOQOL-Bref	0,53	0,45	(1)

Table 4.  
Descriptive Analysis of OHQ, IHS, and WHOQOL-Bref Scale

Demography	N	%	OHQ				IHS				WHOQOL-Bref			
			Min	Max	Mean	SD	Min	Max	Mean	SD	Min	Max	Mean	SD
<b>Gender</b>														
Male	77	41.6	82	150	123.7	13.6	106	192	163.7	16.2	49	116	90.8	11.8
Female	108	58.4	87	155	120.6	12.3	141	190	166	10.7	65	119	90.8	8.9
<b>Age</b>														
>19 years old	43	23.2	97	147	121.8	12.2	144	186	165.2	9.7	69	108	90.5	8.5
19-20 years old	99	53.6	87	155	121.3	12.8	130	192	165.8	13.7	65	116	90.1	10
>20 years old	43	23.2	82	148	123.4	13.9	106	191	163.3	15.4	49	119	92.8	12.1
<b>Status</b>														
Married	10	5.4	87	145	112.3	16.8	146	182	166.8	12.7	70	108	90.9	14.8
Single	175	94.6	82	155	122.4	14.5	106	192	164.9	13.4	49	119	90.8	9.9
<b>Faculty</b>														
Faculty of Ushuludin	46	24.9	87	150	119.8	12.9	106	191	163.6	17.8	65	119	90.7	11.9
Faculty of Tarbiyah and Teacher Training	33	17.8	100	145	123.6	11.9	137	180	164.6	10.6	72	108	92.1	8.3
Faculty of Sharia Law	26	14.1	82	147	120.9	14.4	129	190	166.5	13.1	49	110	90.3	11.9
Faculty of Da'wah and Communication	28	15.1	100	146	122.6	13.3	144	187	165.1	11.8	70	107	89.9	9.2
Faculty of Adab and Humanities	9	4.9	101	155	114.2	17.7	144	176	158	11.1	79	98	86.5	6.4
Faculty of Psychology	17	9.2	99	138	124.8	11.8	146	182	167.3	10.7	69	111	91.5	10.2
Faculty of Science and Technology	11	5.9	110	142	126.5	8.9	152	192	169.8	11.3	76	108	90.5	10
Faculty of Social and Political Sciences	15	8.1	111	148	122.9	11.2	149	181	166.2	10.3	79	116	92.6	10.5
<b>Total</b>	<b>185</b>	<b>100</b>	<b>82</b>	<b>162</b>	<b>122,2</b>	<b>13,2</b>	<b>106</b>	<b>192</b>	<b>165,1</b>	<b>13,3</b>	<b>49</b>	<b>119</b>	<b>90,8</b>	<b>10,2</b>

Note. Min (Minimum values of the subject), Max (Highest value of the subject), Mean (Average in the group), and SD (Standard Deviation).

three scales have a significance level ( $p < 0.05$ ). This means that all three scales have met the criteria for convergent validity (Prakosa, 1995). That is, there is a relationship or correlation between the three scales. The correlation strengths between the three scales have various values, OHQ-IHS correlates by 0.52; OHQ-WHOQOL-Bref correlates by 0.53, and the correlation between IHS-WHOQOL-Bref is 0.45. The result is consistent with what was revealed by Campbell & Fiske (1959) that when two variables which in theory measure the same construct, then the relationship between the two will be obtained. This also means that the three measuring devices can measure the construct of the theory that underlies its preparation (Prakosa, 1995).

### Discussion

Based on the result of the study, although all three scales have convergent validity, the strength of the relationship between scales is at the

moderate correlation level when analyzed using the MTMM correlation matrix interpretation data base. The basics are: (1) tests planned to measure the same construct will have a high correlation, and (2) tests planned to measure different constructs have a low correlation (Prakosa, 1995). The MTMM correlation matrix is shown that four correlations are formed according to the intersection between traits and the method used. The four correlations have a hierarchy of correlation strengths as shown in Figure 1. This study also included the relationship between the 3 scales that have different constructs of happiness measured by the same method will produce a moderate correlation so that it is included in the heterotrait-monomethod correlation (see Figure 1).

From the result of the correlation test of the three scales, it is known that sequentially the relationship between scales of the largest is OHQ-WHOQOLBref (0.53), OHQ-IHS (0.52), and IHS-WHOQOL-Bref (0.45). This sequence is not



Table 5.

Comparison of the order of the strength of the relationship between Campbell's theory with the results of the study

Campbell's Matrix	Results of the Study
1 OHQ-SKI	1 OHQ-WHOQOLBref
2 SKI-WHOQOLBref	2 OHQ-SKI
3 OHQ-WHOQOLBref	3 SKI-WHOQOLBref

following the hierarchy of correlation forces proposed by Campbell (see table 5). When compared with Figure 1, the OHQ-WHOQOLBref relationship should be under the OHQ-IHS and IHS-WHOQOL-Bref relationship. The relationship between OHQ and IHS should be at the highest level of correlation because the two scales are arranged to measure the same construct (proxies), namely happiness. It should also be noted that the result of a moderate correlation between OHQ and IHS, because the result of a small correlation (proxies) can affect the results of other studies (Carlson & Herdman, 2012).

The relationship between IHS and WHOQOL-Bref based on trait and the method used should occupy the second position because although both scales are arranged to measure different constructs, namely happiness and quality of life, both use the same method, the 5 choice methods. If sorted, according to Campbell's power matrix theory and the result of the study can be shown in table 5.

Although there is a relationship between happiness and quality of life, some researchers claim that there are some differences between the quality of life and happiness (Veenhoven, 2001). But other researchers put WHOQOL on the happiness scale (Rizvi & Hossain, 2017).

When compared with previous studies, the relationship between OHQ and WHOQOL-Bref in this study is smaller (Medvedev & Landhuis 2018). In the study they both did, the correlation

value between OHQ and the WHOQOL-Bref dimension showed a higher value (general QOL = 0.60, social QOL = 0.51, psychological QOL = 0.83, environmental QOL = 0.58 and health QOL = 0.69). Meanwhile, Medvedev and Landhuis (2018) explained that the correlation of OHQ with WHOQOL-Bref dimensions was lower (general QOL = 0.50, social QOL = 0.59, psychological QOL = 0.33, environmental QOL = 0.33 and health QOL = 0.60). Only on the environmental dimension that is stated to have a greater relationship when compared with research Medvedev & Landhuis, (2018).

Meanwhile, for the relationship between IHS with OHQ and WHOQOL-Bref, there are no studies that discuss it. But the results of a study conducted by Amalia (2016) showed a strong relationship (0.70) between OHQ and another happiness scale, namely Ryff's Psychological Well-Being (RPWB). Based on previous research and this study is shown that the OHQ happiness scale does have good construct validity.

Meanwhile, there are some criticisms aimed at OHQ and IHS. According to Kashdan (2004) OHQ has failed to distinguish measurements in subjective well-being (SWB). The definition of happiness in OHQ is not based on relevant definitions and theories, and the items contained in OHQ measure the causes, relationships, and consequences of SWB. So OHQ is doubtful whether it can measure happiness (Akhtar, 2018). However, OHQ is still used in studies that

discuss happiness (Abdel-khalek & Lester, 2010; Medvedev & Landhuis, 2018).

Criticism also emerged against IHS. According to Akhtar (2018), items in IHS are considered not to directly measure the construct of happiness itself, but to measure the events that are caused by happiness. Even so, IHS needs to be appreciated because the IHS happiness scale is based on cultural and contextual considerations.

In addition to criticism of the three scales, criticism also appears on the method used. Although the MTMM technique is practical and easy to use in determining convergent validity, the MTMM technique has several limitations. Jackson (1969) explains in detail the limitations of the MTMM method. The first limitation is that often the correlation result from the MTMM matrix is not following the relationship strength hierarchy as in table 4, so researchers often use other variables that are less relevant but show higher values. As a result, researchers are often not objective towards their research (Jackson, 1969; Schmitt, Coyle, & Saari, 1977). This also happened in this study, where the OHQ happiness scale relationship with the WHOQOL-Bref quality of life scale is greater than the correlation between the two happiness scales, OHQ and IHS. Also, there are four statistical problems in the MTMM matrix method (Jackson, 1969).

The limitations of the MTMM method in exploring construct validity, especially convergent validity, will cause the confidence in the quality of the happiness scale to be affected. Therefore, it is important to conduct a comprehensive psychometric test to determine the goodness of a psychological scale. Determining convergent validity in evaluating construct validity is only one method out of several methods in determining construct validity (E. Diener, 2006). Therefore, it is important to pay attention to other

psychological construct measurement methods in determining how well the psychological scale.

In addition to paying attention to some of the criticisms above, the process of measuring happiness also needs to be considered. According to E. Diener (1984) there are three things to consider in measuring happiness. First, the measurement of happiness needs to pay attention to the influence of mood when filling the scale. Mood defines happiness as a temporary pleasure. This temporary condition is what often makes people define happiness (Seligman, 2002). The second thing to note in measuring happiness is the understanding of happiness that is true and consistent. Some people often feel confused with happiness in themselves. This confusion can cause distortion (distortion) which makes the subject wrong inferring their happiness. Third, consideration of the desirability effect. Desirability effect makes the subject answer not under his internal statement, but rather caused by encouragement from outside. As a result, the measurement result does not match the actual state of the subject (E. Diener, 1984).

The data collection technique used was using a questionnaire directly. The number of items presented on all three scales is 95 items. A large number of items need attention. Too many items can cause respondents to be bored when filling out the questionnaires.

## Conclusion

Convergent validity tests conducted on all three scales indicate that OHI, IHS, and WHOQOL-Bref have convergent validity. The three scales can measure the theoretical construct that is the basis of its preparation so that it can be concluded that the three scales are feasible to use.

## *Suggestion*

Nevertheless, some things need to be considered regarding the shortcomings or obstacles that exist in this study. Weaknesses of the MTMM method, comparison of research results with previous research, the number of respondents involved in the study, and the measurement process need to be considered. Suggestions for the next are expected to be able to consider the deficiencies in this study, both in

terms of methods, procedures, and the result of the study.

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