RELIABILITY AND VALIDITY OF THE INDONESIAN VERSION OF THE DUAL FILIAL PIETY SCALE

Dicky Sugianto¹, Andrian Liem², & Nurtaty Sinaga³

¹ Independent Researcher, Tangerang 15710, Indonesia
² Fakultas Psikologi, Universitas Sebelas Maret, Jebres, Surakarta 57216
³ Fakultas Psikologi, Universitas Pelita Harapan, M.H. Thamrin Boulevard 1100, Lippo Karawaci, Tangerang 15811, Indonesia

Korespondensi: sugianto.ad@gmail.com

RELIABILITAS DAN VALIDITAS DUAL FILIAL PIETY SCALE VERSI BAHASA INDONESIA

Abstrak

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Kata Kunci: adaptasi skala, analisis faktor konfirmatori, bakti, dual filial piety model

Abstract
Filial piety (bakti) is a familiar concept within societies in the Chinese diaspora, including multicultural Indonesian society. This concept describes the relationship dynamics between parents and children. It includes obedience and affection that motivate a range of behaviours, including caring for elderly parents. Filial piety becomes an important construct to be studied in its relationship with the psychological process both in children and parents. A conceptual model commonly used to describe filial piety is the Dual Filial Piety Model, which has been operationalized in the Dual Filial Piety Scale (DFPS). This study aims to evaluate the psychometric properties of DFPS which have been translated into Bahasa Indonesia through forward and backward translation. Data was collected from 202 participants recruited using convenient sampling. The result suggests that the Indonesian version of DFPS shows adequate reliability and validity. The instrument was found to be consistent with its theoretical model. It can be used for further research on filial piety in Indonesian society.

Keywords: confirmatory factor analysis, dual filial piety model, filial piety, scale adaptation

Impacts and Implications in the Indigenous Context
Due to the salience of filial piety in Indonesian society, this research provides initial evidence of good psychometric properties of the Indonesian version of DFPS. Thus, the instrument can be used in further investigation of filial piety in the relationship dynamics between Indonesian parents and children. Such research may provide useful insights into the psychological process of children in their relationship with their parents and its implications for caregiving, life decision-making, and the well-being of Indonesians.

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INTRODUCTION

In a society with high family values, such as a collectivist society, there is a value of respect and keeping parents in the highest hierarchy within the family (Schwartz et al., 2010; Soenens et al., 2018; Sumari et al., 2019). This value results in rules that guide the children should behave to their parents. These cultural values, rules, and behavioral guidelines in the dynamics between the child to the parent are called filial piety (Bedford & Yeh, 2021).

Filial piety was initially conceptualized according to Confucianism values which hold high regard to parents and ancestors (Bedford & Yeh, 2019; Li et al., 2010). According to Confucianism values, children should respect and sacrifice for their parents as a reciprocity of parents’ merit in raising the children (Bedford & Yeh, 2019). Although the concept is conceptualized from Chinese culture and applied to describe the relationship between parent-child relationship in Chinese diaspora and East Asian society, similar parent-child relationship patterns are also found in other countries that tend towards collectivism. Countries in Asia, Africa, Latin America, and some parts of Europe with a collectivist identity embody the value of respect and esteem for parents, which is evident in everyday behaviour (Akosah-Twumasi et al., 2021; Kao et al., 2007). It suggests that filial piety is also a value that is important in cultures across the globe.

In Indonesia, filial piety is known by the term “bakti”. Bakti is defined as an attitude of respect, submission, and loyalty in Kamus Besar Bahasa Indonesia, which is synonymous with being a servant (Badan Pengembangan dan Pembinaan Bahasa, n.d.). According to this definition, being filial to parents (berbakti) involves behaviour, communication, and attitudes towards parents which show submission and obedience. This attitude is influenced by the religious teachings of some religions in Indonesia (Astuti, 2021; I’anah, 2017; Sumaryanto, 2021). Folklore stories with filial piety and its opposite, durhaka (unfilial), are also well-known in Indonesian society, such as Malin Kundang, Batu Menangis, and some others (Vidiarama et al., 2019). Therefore, bakti is also an important value in the daily life of Indonesian society, which is identified in many ethnic and cultural groups in Indonesia, and regulates the relationship pattern between parents and children.

Filial piety prescribes children to support their parents financially, emotionally, and to be obedient to what their parents ask (Chong & Liu, 2016; Pan et al., 2022). This support continues throughout life and even after the death of their parents, such as praying for deceased parents or ancestors (Bedford & Yeh, 2019). Filial piety also influences life decisions that the child must make as a form of support and obedience to their parents. For instance, the children need to live close to their parents, bear successors for the family lineage, and even choose a career or romantic partner.
(Bedford & Yeh, 2021; Ha et al., 2020; Kwan, 2000; Sringernyuang et al., 2020). Therefore, filial piety becomes a motivating factor for children to provide care for their elderly parents (He et al., 2021; Woo, 2020).

**Conceptualization and Measurement of Filial Piety**

Filial piety is an important construct for further study due to its role in the relationship dynamics between parents and children. Initially, Yeh and Bedford (2003) conceptualized filial piety as children’s attitudes toward their parents based on Confucianism values. They divided filial piety into reciprocal and authoritarian filial piety, known as the Dual Filial Piety Model (Yeh & Bradford, 2003). Reciprocal filial piety refers to the children’s attitude in returning their parents’ favor in raising them. Reciprocal filial piety includes an affective component in which children feel warmth, security, and intimacy towards their parents (Tsao & Yeh, 2019). Meanwhile, authoritarian filial piety refers to obedience and submission to parents as the authority figures. Authoritarian filial piety includes fear and respect in order to maintain social hierarchy (Tsao & Yeh, 2019; Yeh & Bedford, 2003). In this conceptualization of filial piety, Yeh and Bradford (2003) constructed the Dual Filial Piety Scale (DFPS).

The DFPS aims to measure the motivation behind the relationship pattern between children and parents, whether it is reciprocal affection or the maintenance of social hierarchy (Tsao & Yeh, 2019). The two motivations are not polar opposites but can exist simultaneously (Bedford & Yeh, 2021). The DFPS is found relevant across cultures, not only in the Chinese diaspora, but also in Malaysian, Mexican, Polish, Vietnamese, and even American societies as shown in the scale adaptation and studies utilizing the DFPS in these cultures (Ha et al., 2020; Lim et al., 2021; Tan et al., 2019; Różycka-Tran et al., 2021). DFPS is also unbounded by the societal norms which are constantly changing, but rather concerned with the underlaying motivation behind children’s attitudes towards their parents (Bedford & Yeh, 2021). The focus of DFPS on the motivation behind the attitude distinguishes it from other measures of filial piety, such as the Filial Piety Scale (Chen & Bond, 2007; Ho & Lee, 1974), which emphasizes on obedience to norms, or the Contemporary Filial Piety Scale (Lum et al., 2016), which emphasizes reciprocity of the parent-child relationship.

Another measure similar to the DFPS is the Three-Dimensional Filial Piety Scale (TDFS; Shi & Wang, 2019), which measures three opposing dimensions of filial piety: good affection (true-false), family normative roles (autonomy-heteronomy), and balance of interests (reasonable-unreasonable). TDFS was constructed to ameliorate the limitations of DFPS, that views authoritarian filial piety as irrelevant to contemporary Chinese society where parents and children are more egalitarian (Shi &
Wang, 2019). TDFS also measures motivation instead of normative commitment, which is similar to DFPS (Bedford & Yeh, 2021; Shi & Wang, 2019). However, Bedford and Yeh (2021) observed that the opposing dimensions in TDFS tend to narrow the measurement of filial piety where authoritarian and reciprocal filial piety cannot be measured simultaneously within an individual due to polarized groupings of each dimension.

Therefore, this current research aims to adapt and evaluate the reliability and validity of the Indonesian version of the DFPS. Currently, the DFPS is the most used instrument in studies of filial piety and has been adapted in many cultures outside China with confirmed two factor model and good reliability (e.g., Ha et al., 2020; Lim et al., 2021; Różycka-Tran, 2021; Tan, 2019). However, despite its importance in the dynamics of parent-child relationships in Indonesia, only a limited number of studies have been conducted on this construct. The adaptation of the DFPS may offer new opportunities for future studies exploring the parent-child relationship, especially around elder care.

**METHOD**

**Design**

This research employed a quantitative, cross-sectional design to obtain data and evaluate the psychometric properties of the adapted scale.

**Participants**

Indonesian citizens aged 18 and above who grew up in Indonesia were eligible for this research. Using convenience sampling, a total of 202 participants completed the online survey ($M_{age} = 22.69; SD_{age} = 5.76$). The demographic profile of participants is presented in Table 1.

**Procedure**

Approval from the developer of the DFPS was obtained prior to the translation to Bahasa Indonesia. The translation process used forward and backward translation to ensure construct and meaning equivalence with the original instrument, according to the International Test Commission guidelines (ITC, 2017; Ha et al., 2020). Forward translation was performed by the authors. Initial items from DFPS were translated by the first and second authors and synthesized by the first author. All the authors examined the translated items for understandability and cultural relevance. Upon reaching an agreement, backward translation was performed by an English-sworn translation to ensure the understandability of translated items by laypeople and compare the meaning equivalence of backward translated items to the original. An online questionnaire was constructed along with a
description of the study and informed consent. The link to the questionnaire was distributed on the authors’ social media channel and university network.

Participants were informed that their participation in this research may cause negative emotions from memories or fatigue due to screen time while completing the online questionnaire. The voluntary nature of this research allows participants to withdraw from this research without any consequences, either from anticipating research’s risks or from negative emotions arising from filling in the questionnaire. Information about psychological first aid to reduce the risk was also provided in the research description. They were also informed that their participation in this research may contribute to further research on parents-child relationship dynamics. Participants were also eligible for a raffle of Rp25,000 for 30 participants as time compensation for participating in this research.

This research was approved by the Ethics Committee of Konsorsium Psikologi Ilmiah Nusantara.

Tabel 1.
Participants’ Demographics (N = 202)

<table>
<thead>
<tr>
<th>Variables</th>
<th>f</th>
<th>%</th>
<th>RFP</th>
<th>AFP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gender</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>164</td>
<td>81.19</td>
<td>40.98</td>
<td>28.71</td>
</tr>
<tr>
<td>Male</td>
<td>33</td>
<td>16.34</td>
<td>41.52</td>
<td>30.27</td>
</tr>
<tr>
<td>Prefer not to answer</td>
<td>5</td>
<td>2.48</td>
<td>38.00</td>
<td>25.80</td>
</tr>
<tr>
<td>Religion</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Islam</td>
<td>38</td>
<td>18.81</td>
<td>41.40</td>
<td>28.66</td>
</tr>
<tr>
<td>Protestant Christian</td>
<td>123</td>
<td>60.89</td>
<td>41.70</td>
<td>29.70</td>
</tr>
<tr>
<td>Catholic</td>
<td>18</td>
<td>8.91</td>
<td>39.39</td>
<td>27.56</td>
</tr>
<tr>
<td>Buddha</td>
<td>16</td>
<td>7.92</td>
<td>41.06</td>
<td>29.06</td>
</tr>
<tr>
<td>Confucianism</td>
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<td>.49</td>
<td>43.00</td>
<td>29.00</td>
</tr>
<tr>
<td>Agnostic</td>
<td>6</td>
<td>2.97</td>
<td>28.33</td>
<td>17.33</td>
</tr>
<tr>
<td>Educational Attainment</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Secondary School</td>
<td>115</td>
<td>56.93</td>
<td>41.24</td>
<td>29.44</td>
</tr>
<tr>
<td>Diploma</td>
<td>7</td>
<td>3.46</td>
<td>38.00</td>
<td>26.57</td>
</tr>
<tr>
<td>Bachelor’s degree</td>
<td>66</td>
<td>32.67</td>
<td>40.59</td>
<td>28.03</td>
</tr>
<tr>
<td>Master’s degree</td>
<td>13</td>
<td>6.44</td>
<td>41.92</td>
<td>28.77</td>
</tr>
<tr>
<td>Doctoral degree</td>
<td>1</td>
<td>.49</td>
<td>48.00</td>
<td>41.00</td>
</tr>
<tr>
<td>Ethnic Identification</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ambon</td>
<td>2</td>
<td>.99</td>
<td>43.50</td>
<td>30.50</td>
</tr>
<tr>
<td>Batak</td>
<td>13</td>
<td>6.44</td>
<td>43.54</td>
<td>31.46</td>
</tr>
<tr>
<td>Javanese</td>
<td>32</td>
<td>15.84</td>
<td>37.97</td>
<td>25.41</td>
</tr>
<tr>
<td>Minahasa</td>
<td>4</td>
<td>1.98</td>
<td>43.25</td>
<td>29.00</td>
</tr>
<tr>
<td>Nias</td>
<td>2</td>
<td>.99</td>
<td>42.00</td>
<td>35.50</td>
</tr>
<tr>
<td>Palembang</td>
<td>2</td>
<td>.99</td>
<td>36.00</td>
<td>28.00</td>
</tr>
<tr>
<td>Sunda</td>
<td>11</td>
<td>5.45</td>
<td>41.91</td>
<td>30.82</td>
</tr>
<tr>
<td>Timor</td>
<td>2</td>
<td>.99</td>
<td>41.50</td>
<td>24.50</td>
</tr>
<tr>
<td>Chinese Indonesian</td>
<td>72</td>
<td>35.64</td>
<td>40.90</td>
<td>28.76</td>
</tr>
<tr>
<td>Toraja</td>
<td>12</td>
<td>5.94</td>
<td>42.75</td>
<td>32.50</td>
</tr>
<tr>
<td>Mixed ethnicity</td>
<td>38</td>
<td>18.81</td>
<td>41.79</td>
<td>29.17</td>
</tr>
<tr>
<td>Others (Bali, Bugis, Rote, etc.)</td>
<td>12</td>
<td>5.94</td>
<td>41.17</td>
<td>29.42</td>
</tr>
<tr>
<td>Expectations of male successor in ethnic group</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>98</td>
<td>45.51</td>
<td>40.92</td>
<td>29.18</td>
</tr>
<tr>
<td>No</td>
<td>104</td>
<td>51.48</td>
<td>41.07</td>
<td>28.61</td>
</tr>
<tr>
<td>Hometown</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rural</td>
<td>177</td>
<td>87.63</td>
<td>40.80</td>
<td>28.66</td>
</tr>
<tr>
<td>Urban</td>
<td>25</td>
<td>12.38</td>
<td>42.40</td>
<td>30.52</td>
</tr>
</tbody>
</table>
**Instruments**

This study used the DFPS (Yeh & Bedford, 2003) which was translated into Bahasa Indonesia. The 16-item DFPS consists of eight items measuring reciprocal filial piety and eight items measuring authoritarian filial piety. Each item in respective dimension was scored using a Likert scale ranging from 1 (Extremely Unimportant) to 6 (Extremely Important) and a total score was calculated for reciprocal and authoritarian filial piety. The DFPS showed a good reliability in its construction (Cronbach’s $\alpha = .90$ for reciprocal filial piety and .79 for authoritarian filial piety; Yeh & Bedford, 2003). Participants were also requested to complete a number of demographic questions such as age, gender identification, religious affiliation, ethnicity, expectations of male successors within the culture of their ethnic group, educational attainment, and hometown settings (urban or rural). These variables were assumed to be related to the manifestation of filial piety in Indonesian society.

**Analysis Strategies**

Data were analyzed using confirmatory factor analysis (CFA) to evaluate the construct congruence between the Bahasa Indonesia version of the DFPS and its conceptual model in the original construction. Reliability was analyzed by computing Cronbach’s $\alpha$ and McDonald’s $\omega$. Data was analyzed using JASP version 0.18.3 (JASP Team, 2024).

**RESULTS**

The CFA results suggested that the Bahasa Indonesia version of the DFPS showed good model fit with the two-dimensional model of DFPS (reciprocal and authoritarian filial piety). Analysis shows that indicators of model fit meet the minimum value (RMSEA < .80; CFI, GFI, IFI, NFI, TLI > .90, $\chi^2/df$ ratio < 2; Brown, 2006; Cangur & Erkan, 2015; Schumaker & Lomax, 2010). Second-order CFA of DFPS were conducted due to high correlation between the two dimensions of DFPS ($r = .82$). Second-order CFA shows better fit than two-dimensional model, but poorer factor loadings for each item in each dimension (factor loadings for authoritarian filial piety = .14–.34; reciprocal filial piety = .28–.34). Hence, the items in DFPS tend to have weak association to the higher order factor. Table 2 describes the CFA result from the data.
The items indicated reciprocal and authoritarian filial piety through good factor loadings (factor loading > .30; p < .01; Brown, 2006). Therefore, each item represents their own dimension. Reliability analysis showed that both dimensions have good internal consistency. Cronbach’s α for reciprocal filial piety was .865 and McDonald’s ω was .870, with item-total correlation ranging from .465 to .723. Meanwhile, Cronbach’s α for authoritarian filial piety was .794 and McDonald’s ω was .791, with item-total correlation ranging from .353 to .620. Table 3 presents the final items of the DFPS in Bahasa Indonesia along with factor loadings for each item, Cronbach’s α if the item is deleted, and item-rest correlation score.

Table 2.
Results from Confirmatory Factor Analysis

<table>
<thead>
<tr>
<th>Model</th>
<th>X²/df</th>
<th>RMSEA</th>
<th>CFI</th>
<th>GFI</th>
<th>IFI</th>
<th>NFI</th>
<th>TLI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Two factor</td>
<td>1.85</td>
<td>.065</td>
<td>.997</td>
<td>.970</td>
<td>.970</td>
<td>.937</td>
<td>.965</td>
</tr>
<tr>
<td>Second-order factor</td>
<td>.035</td>
<td>.996</td>
<td>.990</td>
<td>.996</td>
<td>.982</td>
<td>.995</td>
<td>.996</td>
</tr>
</tbody>
</table>

Note: RMSEA = Root mean square error of approximation; CFI = Comparative fit index; GFI = Goodness of fit index; IFI = Bollen’s incremental fit index; NFI = Bentler-Bonett normed fit index; TLI = Tucker-Lewis index.
<table>
<thead>
<tr>
<th>No.</th>
<th>Item Description</th>
<th>Factor Loading</th>
<th>Std. Error</th>
<th>Cronbach’s α if item dropped</th>
<th>r</th>
</tr>
</thead>
<tbody>
<tr>
<td>8</td>
<td>Mengubur keinginan saya demi memenuhi harapan orang tua saya.</td>
<td>.657</td>
<td>.025</td>
<td>.752</td>
<td>.619</td>
</tr>
<tr>
<td>10</td>
<td>Melakukan apapun yang diminta orang tua saya dengan segera.</td>
<td>.813</td>
<td>.024</td>
<td>.760</td>
<td>.599</td>
</tr>
<tr>
<td>12</td>
<td>Menghindari menikah dengan seseorang yang tidak disukai orang tua saya.</td>
<td>.585</td>
<td>.025</td>
<td>.777</td>
<td>.467</td>
</tr>
<tr>
<td>14</td>
<td>Memiliki setidaknya satu anak lelaki untuk melanjutkan garis keturunan keluarga.</td>
<td>.468</td>
<td>.027</td>
<td>.785</td>
<td>.447</td>
</tr>
<tr>
<td>16</td>
<td>Hidup dengan orang tua (atau mertua) ketika menikah.</td>
<td>.334</td>
<td>.029</td>
<td>.795</td>
<td>.356</td>
</tr>
</tbody>
</table>

*Note: r = item-rest correlation*

**Figure 1. Model and Factor Loadings of DFPS Bahasa Indonesia Version**

Note: AFP = Authoritarian filial piety; RFP = Reciprocal filial piety
DISCUSSION

The result of CFA suggests that the Bahasa Indonesia version of DFPS is congruent with its two-dimensional theoretical model (Yeh & Bedford, 2003). The translated instrument also shows good reliability. The results of CFA and reliability analysis of the two-dimensional model of DFPS are similar to other instrument adaptation studies in other cultures, such as Poland, Vietnam, Malaysia, and the United States (Ha et al., 2020; Lim et al., 2021; Różycka-Tran, 2021; Tan, 2019).

Another finding of this study is high correlation between the two dimensions of DFPS. The result of second-order CFA shows a better model fit than the first-order CFA. However, each item has weak factor loadings in the second-order CFA, suggesting shared variances between the items observing both dimensions. In practical terms, it could mean that the concept of filial piety in Indonesians might live as a synthesis between reciprocal with authoritarian filial piety, which is not the focus of this study. Therefore, this finding invites further examination of the concept of filial piety in Indonesian society; whether Indonesians perceive or possess distinct dynamics of reciprocal and authoritarian filial piety than other cultures.

The demographic data presents a consistent pattern between scores of reciprocal and authoritarian filial piety, where the reciprocal filial piety score was higher than the score of authoritarian filial piety. It suggests that across demographics, manifestations of the two dimensions of filial piety tend to be uniform. The distribution of reciprocal and authoritarian filial piety scores across demographics serves as initial evidence of external validity for the Bahasa Indonesia version of DFPS to be used in Indonesian sample. However, the evaluation of validity and reliability in a more representative sample of Indonesian society will be beneficial to the development of this instrument.

Apart from the limitations mentioned above, the Bahasa Indonesia version of DFPS possesses initial evidence of factorial validity (Azwar, 2013), thus can be used to explore the relationship between filial piety and other variables related to parent-child relationship dynamics. Previous studies have shown the role of reciprocal and authoritarian filial piety in elderly parents’ caregiving, such as caregiving motivation or burden (e.g., Pan et al., 2022; Zarzycki et al., 2022). Parental caregiving is a common practice in Indonesian society, where adult children live with their parents or in-laws after marriage. Therefore, studies that examine how filial piety influences parent-child relationship dynamics may yield interesting results. These studies could contribute to the policy of providing care from family members to elderly parents (Lestari et al., 2023). Furthermore, these studies could also
serve as a further evaluation of the validity and reliability of the Bahasa Indonesia version of the DFPS version.

CONCLUSION AND RECOMMENDATIONS

This study provided empirical support for the validity and reliability of the Bahasa Indonesia version of the DFPS. Further studies examining filial piety models in Indonesian citizens may benefit from the use of this instrument. Moreover, future research can be conducted to examine the psychometric properties of this instrument by recruiting a larger size from more diverse cultural samples in Indonesia. Studies using different approaches of construct validity, such as conducting exploratory factor analysis, predictive or concurrent validity, can also provide more psychometric evaluation of this instrument. Nevertheless, the results of this study provide a valid and reliable instrument for parent-child dynamics and its relationship with mental health or personality. Such studies can contribute to policymaking regarding the manifestations of filial piety (i.e., understanding the experiences of sandwich generation from the lens of reciprocal and authoritarian filial piety), which is embedded in the daily lives of Indonesian people.

ACKNOWLEDGEMENT

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FUNDING

This research received no specific funding from any institution.

COMPLIANCE WITH ETHICAL STANDARD

Ethical Statement

All procedures performed in this study were in accordance with the 1964 Helsinki Declaration and its amendments or with comparable ethical standards. The ethical aspect of this study has been reviewed and approved by Ethics Committee of Konsorsium Psikologi Ilmiah Nusantara (Approval number: 074/2022 Etik/KPIN). Informed consent has been obtained from all participants in this study.

Conflict of Interest

The authors pronounce no conflict of interest in this research.

Data Availability

The datasets used in this study are available from the corresponding author through email.
REFERENCES


JASP Team (2024). JASP (Version 0.18.3) [Computer software].


