A Causal Model of Organic Food Buying Behaviours of Consumers in Thailand

Supawadee Pattweekongka a*, Kulkanya Napompech b, Wornchanok Chaiyasoonthorn c, a,b,c King Mongkut’s Institute of Technology Ladkrabang, Bangkok, Thailand, Email: a*supawadee.pa@kmitl.ac.th

This quantitative study aims to understand the causal factors of food buying behaviour in the current Thai market for organic food as differentiated by brand marketing. A comprehensive model of consumer decision-making was developed with four latent factors, including trust in brand, buying intention, brand loyalty and buying behaviour. This model demonstrated high reliably measurements as a basic requirement of structural equation modelling (SEM) statistics. Questionnaires were collected from a sample of organic food consumers in Thailand between April and June 2018; 386 data records were obtained and analysed using SEM. A significant correlation was found between the observed data and the conceptual model. The model demonstrated that the effect of brand trust on brand loyalty influenced buying intention, which played a key role in driving buying behaviour. Findings show that “loyalty” was the most important factor to affect “intention,” which directly impacted on buying behaviour. Further, the model achieved predictive power at 94%. Results indicate that Thai consumers perceive organic food marketing as distinct, which is reflected in their purchasing behaviours. These findings should benefit organic food entrepreneurs, farmers and sellers who must devise strategies for organic food-related branding.

Key words: Organic food, organic buying behaviour, trust in brand, brand loyalty, consumer trust.
Introduction

The customer is an essential component of any service business establishment (Kotler & Armstrong, 2014; Jermsittiparsert, Sriyakul, & Sangperm, 2019). Success is contingent on the company’s fulfilment of customer needs and its capability not only to satisfy consumers, but also to exceed consumers’ initial expectations (Yang et al., 2009; Chienwattanasook & Jermsittiparsert, 2019; Jermsittiparsert, Sutduean, Sriyakul, & Khumboon, 2019). To achieve this goal, consumer behaviour and the buying decision-making process must be examined and understood (Evans, Jamal, & Foxall, 2006). Research into consumer behaviour has examined methods of customer buying and business disposal of goods, services, ideas, and experiences to satisfy market desires (Perner, 2018). The consumer buying decision process involves five steps: awareness of a need, information search, evaluation of alternatives, purchase and post-purchase (Kotler & Armstrong, 2014). Many factors may affect consumer behaviour, including marketing ventures, cultural factors and psychological tools (Kotler & Armstrong, 2014). Prior research suggests that these components directly influence a customer’s buying and consumption decisions (Peter & Donnelly, 2007; Karnreungsiri & Praditsuwan, 2017). Appropriately understanding these factors in terms of consumer behaviour and the purchase decision procedure are therefore critical for successful marketing and profitable company returns (Kotler & Armstrong, 2014).

Health concerns arising from the use of pesticides, genetically modified organisms, and other chemical elements has fostered organic food creation and consumption worldwide (Hughner et al., 2007). The global sales level of organic food in 2017 was valued at $97 billion US (Helga & Julia, 2018). As in other countries, Thai consumers have displayed rising concerns regarding their health and food quality. Roitner-Schobesberger, Darnhofer, Somsook, & Vogl (2008) suggest that Thai consumers are extremely averse to pesticide residue found in food. At present, chemical usage in agriculture is widespread throughout Thailand, an issue also perpetuated across other countries in Europe and Asia (Aungudornpukdee, 2019). The Office of Agricultural Economics (2018) reported that in 2017, Thailand imported 198,317 tonnes of hazardous agricultural chemicals at an approximate cost of 27,922 million baht. Although organic food consumption is increasing in Thailand, the market share for organic products remains relatively small (Sriwaranun et al., 2015; Nuttavuthisit & Thøgersen, 2017).

Similar to Lyons, Lockie, and Lawrence (2001), this study defines organic food as a product of organic farming or agriculture. The farming of such food must be managed using a systemic approach and must comply with verifiable standards from an authoritative body. These measures should be based on international, national and local volunteer or community standards. Organic food also includes natural foods, for which farmers and producers establish the standards employed. In the present market, the appearance of organic food and non-organic food cannot be distinguished either before or after purchase (Bech-Larsen, 2001;
Roitner-Schobesberger et al., 2008; Fernqvist & Ekelund, 2014; Anisimova & Sultan, 2014). Trust therefore plays a vital role in consumers’ selection of organic products, leading individuals to rely on a company’s labelling and marketing for verifiable organic products (Hamzaoui-Essoussi et al., 2013; Vehapi & Dolićanin, 2016; Nuttavuthisit & Thøgersen, 2017; Misra & Singh, 2016; Anisimova, 2016). Organic food is considered a credence good; consumers must trust the producer, seller and involved third parties regarding the food’s quality (Cerjak, 2010; Perrini, 2010). In the Thai market, organic food may carry a price almost three times higher than the commodity price (Pattweekongka, 2010; Nuttavuthisit, 2017). Previous research shows that consumers of organic products obtained higher satisfaction than those of non-organic products, and were therefore willing to pay higher prices (Sriwaranun et al., 2015). This willingness to spend more on premium products is also directly linked to consumer trust and subsequent brand loyalty (Perrini et al., 2010). Trust is therefore paramount in the organic product industry and can either positively or negatively influence consumer decision-making processes (Hamzaoui-Essoussi et al., 2013).

The relationship between consumers’ trust in a brand and the product purchasing decisions surrounding organic foods has received scarce research consideration. Specifically, few studies have been conducted on whether trust in a brand affects consumer decision-making and behaviour in buying organic foods. Understanding the factors that influence organic purchase behaviours will therefore assist with the development of marketing strategies to encourage higher organic food consumption in Thailand.

This study explores the factors that influence buying decisions of Thai organic goods consumers. The objective of this research is to determine the direct, indirect and total influence of such factors and thereby better understand the buying behaviours of Thai organic food consumers.

Thailand is a primary exporter of rice (Jermsittiparsert, Sriyakul, & Rodoonsong, 2013; Sriyakul & Jermsittiparsert, 2017) and a significant producer of other agricultural products such as vegetables, fruits and dairy products (Pamornmast, Jermsittiparsert, & Sriyakul, 2013). Most of Thailand’s organic agricultural land is located in the central region. According to the Ministry of Agriculture and Cooperatives, of the 26 provinces in the central region, only 18 employed sound organic agricultural practices (Pongquan, 2017). Agriculture is a major contributor to the economy and almost half of all Thai labourers are employed in the agriculture industry. Thai consumers are therefore intimately connected with organic food production and thus serve as appropriate samples in assessing consumer trust in organic food. This research contributes to understanding the causal factors involved in organic buying behaviours; it embeds the understanding of differentiated markets in a comprehensive process of consumer decision-making in relation to the latent factor of brand trust, buying intention, brand loyalty and buying behaviour.
Literature Review and Hypothesis Development

The developed model was constructed from a variety of factors associated with three key concepts: 1) the theory of reasoned action (TRA) as introduced by Ajzen and Fishbein in 1975 (Bech-Larsen et al., 2001), 2) consumer decision-making processes (Kotler & Armstrong, 2014) and 3) a comprehensive review of “brand trust” in organic food buying behavior.

Theory of reasoned action

The theory of reasoned action (TRA) is a social psychology concept which aims to predict how individuals will behave based on their pre-existing attitudes and behavioural intentions. TRA was applied to this study to explain the influence of “trust,” “loyalty,” “intention” and “buying behaviour” on consumers’ views on organic brands and their subsequent buying behaviours of such brands.

Consumer decision-making

A previous study on habitual organic food buying customers reported that decision-making in product purchases involves five steps: 1) recognition; 2) information search; 3) evaluation of alternatives; 4) purchase and 5) post-purchase evaluation or experience. These steps do not necessarily occur in a fixed order, and may instead depend on whether the transaction is a first time or subsequent purchase (Perner, 2018). The procedures of consumer decision-making are as follows:

Step 1–Need recognition: The organic food consumer has an inherent interest in organic food, its brand and the marketplace in general.

Step 2–Information search: Product information is sought using all five human senses from the consumer perspective via personal recommendations or reviewers (or both) and through experience. As benefits of organic food are associated with a belief, trust in a product’s integrity and quality is essential for successful purchasing (Daugbjerg & Sønderskov, 2012; Nuttavuthisit & Thøgersen, 2017). Brand trust is measured by four observed factors, including brand competence, brand credibility, perceived brand and brand benevolence.

Step 3–Evaluation of alternatives: A customer attempts to make a good decision by analysing the risk assessment and benefits involved in a purchase. The buyer puts effort into the search, which depends on the number of competitive paradigms in the market structure. TRA claims that behavioural intention mediates behavioural manifestation, meaning that understanding behavioural intention is a prerequisite for predicting individual behaviour. In this study, consumer intention was a latent factor (i.e., “organic buying intention”). This intention is
estimated based on four observed factors, including repurchasing, effort, willingness to buy and the probability of attending an organic food festival or event.

Step 4–Purchase: At this stage in the process, a customer has either (a) assessed all gathered facts and arrived at a logical conclusion based on emotional connections or experiences, or (b) yielded to advertising, marketing campaigns, or, most likely, a combination of these elements. Following empirical reports (Chokenukul et al., 2019; Praditsuwan, 2017; Lassoued et al., 2015), consumer behaviour is represented by the latent factor of “organic buying behaviour.” This behaviour was estimated from four observed factors, including frequency of organic food buying, proportion of organic food buying, variety of organic food buying and determination to buy organic food.

Step 5–Post-purchase evaluation or experience: The review stage is key for both the production company and customer, who may question whether the product delivered sufficiently and in line with marketing campaigns and whether the product matched or exceeded expectations. Customer trust in and loyalty to the purchased product and brand are heavily reliant on these factors and can indicate future product buying behaviours. Other recent reviews (Wongsuphasawat & Buatama, 2019, Kaur et al., 2018; Lassoued & Hobbs, 2015), suggest “organic brand loyalty” as a latent factor and is assessed from four observed elements, including commitment, style, place and price.

**Related literature and hypothesis development**

Brand trust is defined as a consumer’s willingness to believe that a brand will fulfil its function or produce favourable results (Chaudhuri & Holbrook, 2001). Brand trust can therefore be seen as a customer’s belief that a brand will perform as promised (Won-Moo Hur et al., 2011). This trust can in turn reduce the time, effort and transaction cost of finding other options offered in the market, increasing the ease and efficiency of customers’ decision-making processes (Kramer & Roderick, 1999; Chiles & McMackin, 1996). Brand trust can be assessed through a customer’s attitudes toward a brand, including views on its competence, perceived performance, credibility and benevolence (Edward Shih-Tse & Bi-Kun, 2014; Ha, 2004; Hernandez & Santos, 2010; Jarvenpaa, Tractinsky & Saarinen, 1999; Perry & Mankin, 2007; Wongsuphasawat & Buatama, 2019; Lassoued, 2015).

Oliver (1999) defines brand loyalty as a profound commitment to repurchase or re-patronise favourite products or services of the same brand regardless of situational influences or marketing efforts that encourage brand switching. In contrast, Assael (1993) defines brand loyalty as repeated purchase behaviours resulting from consumers’ satisfaction with their experiences of purchasing the same brand. Previous research has confirmed that brand trust invariably leads to brand loyalty. Lassoued and Hobbs (2015) tested a conceptual framework on this matter using surveyed data of Canadian consumers of fresh chicken and found that
brand trust positively influenced brand loyalty. Further, Chaudhuri and Holbrook (2001) analysed information on 107 brands of many product types (e.g., potato chips, bacon, vegetable cooking oil) and discovered that brand trust determines brand loyalty. Empirical evidence has revealed many kinds of products that associate loyalty and buying behaviours (Kaur et al., 2018; Sarwar et al., 2012). Previous research (Anisimova, 2016) indicates positive effects of trust on consumer purchase intention. Moreover, Liu, Hoefkens & Verbeke’s (2015) study found that brand trust affected consumers’ willingness to pay for pork meat. Many other studies in the organic food industry have reported a significant and positive relationship between consumers’ intentions to purchase and their actual purchase behaviours (Tarkiainen & Sundqvist, 2005; Hung, Lin & Chen, 2013). Prior studies (Pomsanam, Napompech & Suwanmaneepong, 2014; Teng & Wang, 2015) have also confirmed that consumer trust has a significant positive effect on buying a product. Based on these insights, the following hypotheses are formulated:

Hypothesis H1 (BT⇒BL): Organic food brand trust positively influences consumer brand loyalty.
Hypothesis H2 (BL⇒BI): Brand loyalty of organic food consumers positively influences their organic food buying intentions.
Hypothesis H3 (BI⇒BB): Organic food buying intentions positively influence consumers’ buying behaviours.
Hypothesis H4 (BT⇒BI): Organic food brand trust positively influences consumers’ buying intentions.
Hypothesis H5 (BT⇒BB): Organic food brand positively influences organic food buying behaviours.
Hypothesis H6 (BL⇒BB): Consumers’ loyalty to an organic food brand positively influences their buying behaviours.

Conceptual framework

Consumer decision-making and TRA were integrated to synthesise a cause-related marketing model, as represented in Figure 1. This model establishes four latent factors, each estimated from four observed factors that were constructs of a latent factor.
Research Methodology

Data collection and sample

The sample was collected from consumers of organic products at hypermarkets, supermarkets, community markets and organic-only shops in seven provinces throughout central Thailand between April and June 2018. These provinces included Bangkok; Nakon Pathom; Nontaburi; Samutsakorn; Samutprakarn; Chacherngsao, and Patumthan. The total number of respondents was 386 and was calculated according to Cohen’s formula (Kerlinger & Lee, 2000).

The questionnaire was divided into three parts with questions and statements adjusted from previous studies. The first section collected consumer demographic characteristics; the second section addressed organic buying behaviours, and the third dealt with brand trust, brand loyalty and buying intentions of organic foods.

All constructs in the conceptual framework were based on existing literature. This study adopted and modified nine items developed by Lassoued and Hobbs (2015) and Li et al. (2008) to measure brand trust. Brand loyalty was assessed from 12 items developed by Lassoued and Hobbs (2015) and Leckie et al. (2016). Purchase intention was analysed through 12 modified items from Shih-Jui (2012), Teng & Wang (2015), and Anisimova (2016). Lastly, consumer behaviour assessment applied 24 items from Tarkiainen & Sundqvist (2005). All items were measured with a 7-point Likert scale (DeCastellarnau, 2018) to investigate the degree of agreement or disagreement with an item. Items were rated from never true; rarely true; sometimes but infrequently true; neutral; sometimes true, and usually true to always true.
The questionnaire achieved a Cronbach’s alpha coefficient of 0.971. This passed the reliability criterion (accepted Cronbach’s alpha $\geq 0.7$) and was therefore suitable for use as a data collection tool (Hair et al., 2010).

**Statistical analysis**

The proposed research model was analysed via SEM using the AMOS version 21.0.0 software. Two SEMs were developed, including a measurement model and a structural model (Hair et al., 2010). The measurement model was constructed from the observed data and tested for validity and reliability by exploratory factor analysis (EFA). The structural model was designed based on information gained from the literature review and tested for model fit and hypothesis support (Figure 1).

**Results**

Table 1 below shows that most Thai organic food consumers are female, possess a bachelor’s degree, and earn a monthly income greater than 30,000 baht. These consumers practice a health-conscious lifestyle. Organic foods are purchased for the whole family, usually daily, and in the following order: organic vegetables and fruits; organic rice and meat; eggs, and milk. 29.3% of respondents purchased organic foods at a rate of approximately 40% of total food bought.

**Table 1:** Demographic and consumer behaviour information of respondents (N =386).

<table>
<thead>
<tr>
<th>Factor</th>
<th>Frequency</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Gender</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>290</td>
<td>75.1</td>
</tr>
<tr>
<td>Male</td>
<td>96</td>
<td>24.9</td>
</tr>
<tr>
<td><strong>Education</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than bachelor’s degree</td>
<td>80</td>
<td>20.7</td>
</tr>
<tr>
<td>Bachelor’s degree</td>
<td>205</td>
<td>53.1</td>
</tr>
<tr>
<td>Master or above</td>
<td>101</td>
<td>26.2</td>
</tr>
<tr>
<td><strong>Income</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>&lt;10,000฿</td>
<td>69</td>
<td>17.9</td>
</tr>
<tr>
<td>10,000-20,000฿</td>
<td>75</td>
<td>19.4</td>
</tr>
<tr>
<td>20,001-30,000฿</td>
<td>66</td>
<td>17.1</td>
</tr>
<tr>
<td>&gt;30,000฿</td>
<td>176</td>
<td>45.6</td>
</tr>
<tr>
<td><strong>Lifestyle</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Elderly family</td>
<td>75</td>
<td>19.4</td>
</tr>
<tr>
<td>Family with little babies</td>
<td>78</td>
<td>20.2</td>
</tr>
<tr>
<td>Health-conscious family</td>
<td>233</td>
<td>60.4</td>
</tr>
<tr>
<td>Buy for</td>
<td>Oneself</td>
<td>146</td>
</tr>
<tr>
<td>----------</td>
<td>---------</td>
<td>-----</td>
</tr>
<tr>
<td>Family</td>
<td>240</td>
<td>62.2</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Frequency of organic buying vegetables and fruits</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than 10 times per year</td>
<td>93</td>
</tr>
<tr>
<td>Once a month</td>
<td>60</td>
</tr>
<tr>
<td>2-3 times or more per month</td>
<td>98</td>
</tr>
<tr>
<td>Once a week</td>
<td>53</td>
</tr>
<tr>
<td>2-3 times per week or more</td>
<td>82</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Categories of organic food consumed (can provide more than one answer)</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Vegetables and fruits</td>
<td>324</td>
</tr>
<tr>
<td>Rice</td>
<td>208</td>
</tr>
<tr>
<td>Meat, eggs, milk</td>
<td>135</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Proportion of organic food bought compared to total food</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Less than or equal to 20%</td>
<td>165</td>
</tr>
<tr>
<td>21%-30%</td>
<td>73</td>
</tr>
<tr>
<td>31%-40%</td>
<td>35</td>
</tr>
<tr>
<td>More than 40%</td>
<td>113</td>
</tr>
</tbody>
</table>

Notes: Exchange rate: 1 Thai baht equals 0.033 United States dollar.

Table 2 below depicts results of an exploratory factor analysis of the four measurement models, including details on the reliability and convergent validity test indexes. The measurement models provided quantitative measures of the validity and reliability of the latent factor constructs. The internal consistency among the observed data was measured using Cronbach's alpha, with the value ranging from 0.86 to 0.91, or higher than 0.7 (Kerlinger & Lee, 2000; Schumacker & Lomax, 2010; Yadav & Pathak, 2016). Convergent validity was measured in terms of three components: factor loading, composite reliability (CR) and square value multiple correlations (SMC). The factor loading value ranged from 0.74 to 0.92, well above the recommended level of 0.6 (Chin, Gopal, & Salisbury, 1997). The CR value ranged from 0.85 to 0.91, implying that all the constructs met the recommended criterion of CR>0.6 (Hair et al., 2009). The obtained value of SMC ranged from 0.54 to 0.85, also within the acceptable limit of 0.5 (Hair et al., 2009).
Table 2: Factor loading, reliability and validity of the measurement models.

<table>
<thead>
<tr>
<th>Construct</th>
<th>Variables</th>
<th>Std. Factor Loading</th>
<th>SMC</th>
<th>Cronbach’s α</th>
<th>CR</th>
</tr>
</thead>
<tbody>
<tr>
<td>BT</td>
<td>BTcompe</td>
<td>0.92</td>
<td>0.85</td>
<td>0.91</td>
<td>0.91</td>
</tr>
<tr>
<td>BT</td>
<td>BTcredi</td>
<td>0.87</td>
<td>0.75</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BT</td>
<td>BTbene</td>
<td>0.84</td>
<td>0.70</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BT</td>
<td>BTperce</td>
<td>0.76</td>
<td>0.58</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BI</td>
<td>Birepu</td>
<td>0.82</td>
<td>0.68</td>
<td>0.89</td>
<td>0.88</td>
</tr>
<tr>
<td>BI</td>
<td>BLEffo</td>
<td>0.81</td>
<td>0.65</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BI</td>
<td>BIwiltb</td>
<td>0.76</td>
<td>0.58</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BI</td>
<td>Bprop</td>
<td>0.85</td>
<td>0.71</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BL</td>
<td>BLcomm</td>
<td>0.87</td>
<td>0.76</td>
<td>0.88</td>
<td>0.88</td>
</tr>
<tr>
<td>BL</td>
<td>BLstyl</td>
<td>0.83</td>
<td>0.69</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BL</td>
<td>BLplac</td>
<td>0.77</td>
<td>0.60</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BL</td>
<td>BLpric</td>
<td>0.75</td>
<td>0.56</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BB</td>
<td>BBfreq</td>
<td>0.74</td>
<td>0.54</td>
<td>0.86</td>
<td>0.85</td>
</tr>
<tr>
<td>BB</td>
<td>BBprop</td>
<td>0.82</td>
<td>0.68</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BB</td>
<td>BBvari</td>
<td>0.76</td>
<td>0.58</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BB</td>
<td>BBdete</td>
<td>0.75</td>
<td>0.56</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Notes: SMC = squared multiple correlation; CR = composite reliability.

Table 3 shows results of the correlation analysis of the model’s variables. Significant relationships exist between several constructs of the latent factors at \( p < 0.01 \). Overall, the theoretical model has adequate validity (convergent and discriminant) and sound reliability. Details of the discriminant validity and descriptive statistics are listed in Table 3 below. The reliability of the exploratory factor measurement was sufficiently high enough for SEM statistical analysis.

Table 3: Correlations among the constructs.

<table>
<thead>
<tr>
<th>Code</th>
<th>Construct</th>
<th>BB</th>
<th>BL</th>
<th>BI</th>
<th>BT</th>
</tr>
</thead>
<tbody>
<tr>
<td>BB</td>
<td>Organic buying behavior</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BL</td>
<td>Organic brand loyalty</td>
<td>0.85**</td>
<td>1.00</td>
<td></td>
<td></td>
</tr>
<tr>
<td>BI</td>
<td>Organic buying intention</td>
<td>0.83*</td>
<td>0.97**</td>
<td>1.00</td>
<td></td>
</tr>
<tr>
<td>BT</td>
<td>Trust in brand</td>
<td>0.67</td>
<td>0.83**</td>
<td>0.87</td>
<td>1.00</td>
</tr>
</tbody>
</table>

Notes: ** Correlation was significant at the 0.01 level (2-tailed).

* Correlation was significant at the 0.05 level (2-tailed).

Table 4 demonstrates results of the consistency check in the overall structural equation model. These results suggest that the fit index rates achieve acceptable criteria as established by Hu & Bentler (1999), thereby indicating that the hypothesised model is a good fit for the observed data.
Table 4: Appropriate fit indexes for the final measurement model and the structural model.

<table>
<thead>
<tr>
<th>Index</th>
<th>Criterion/Level of Acceptance (Hu &amp; Bentler, 1999)</th>
<th>Structural Model</th>
<th>Measurement Model</th>
<th>Interpretation</th>
</tr>
</thead>
<tbody>
<tr>
<td>$\chi^2$/df *</td>
<td>*Adjusted for sample size $n&gt;250$&lt; 0.05 to 3.00, good fit 3.00 to 5.00, sometimes permissible</td>
<td>4.136 (df = 98)</td>
<td>1.910 (df = 81)</td>
<td>GF</td>
</tr>
<tr>
<td>CFI: Comparative fit index</td>
<td>$\geq 0.95$ reflects good fit 0.90-0.95 reflects traditional fit 0.80 to 0.90, sometimes permissible</td>
<td>0.939</td>
<td>0.985</td>
<td>GF</td>
</tr>
<tr>
<td>GFI: Goodness of fit</td>
<td>$&gt; 0.95$ reflects good fit</td>
<td>0.884</td>
<td>0.953</td>
<td>GF</td>
</tr>
<tr>
<td>NFI: Normed fit index</td>
<td>$&gt; 0.90$ reflects good fit (Bollen, 1989)</td>
<td>0.921</td>
<td>0.970</td>
<td>GF</td>
</tr>
<tr>
<td>AGFI: Adjusted-</td>
<td>$&gt; 0.80$ good fit</td>
<td>0.839</td>
<td>0.922</td>
<td>GF</td>
</tr>
<tr>
<td>goodness-of-fit index</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCLOSE: Test of close fit</td>
<td>$&gt; 0.05$ good fit</td>
<td>0.000</td>
<td>0.562</td>
<td>GF</td>
</tr>
<tr>
<td>TLI: Tucker-Lewis coefficient</td>
<td>$&gt; 0.95$ good fit</td>
<td>0.925</td>
<td>0.978</td>
<td>GF</td>
</tr>
<tr>
<td>RMSEA: Root mean square error of approximation</td>
<td>$&lt; 0.05$ outstanding fit</td>
<td>0.090</td>
<td>0.049</td>
<td>GF</td>
</tr>
</tbody>
</table>

Notes: GF = Good fit; $n = 386$.

Analyses of direct and indirect influences of brand trust, brand loyalty, purchase intention and buying behaviour of organic foods are presented in Table 5 below, and a causal model of organic food buying behaviour of consumers in Thailand is shown in Figure 2.
Figure 2. Key factors in the causal model of organic food buying behaviour of Thai consumers (see the Amos model in the Appendix).

Table 5: R² and coefficients of the SEM.

<table>
<thead>
<tr>
<th>Causal Factor</th>
<th>Effective Factor</th>
<th>(Path Coefficients)</th>
<th>R²</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>DE</td>
<td>IE</td>
</tr>
<tr>
<td>Trust in brand (BT)</td>
<td>Organic brand loyalty (BL)</td>
<td>0.85</td>
<td>0.00</td>
</tr>
<tr>
<td>Organic brand loyalty (BL)</td>
<td>Organic buying intention (BI)</td>
<td>0.96</td>
<td>0.00</td>
</tr>
<tr>
<td>Organic buying intention (BI)</td>
<td>Organic buying behaviour (BB)</td>
<td>1.10</td>
<td>0.00</td>
</tr>
</tbody>
</table>

Notes: β = TE = total effect; DE = direct effect; IE = indirect effect.

Analysis of the model of Thailand consumers’ organic food buying behaviours provided several values for standardised covariances (β) and three values for predictive powers (R²), as shown in Table 5. Brand loyalty (BL) was directly influenced by brand trust at 72% (β=0.85, p<0.01), thus substantiating Hypothesis H1. Organic buying intention (BI) was directly influenced by brand loyalty (BL) at 94% (β=0.96, p<0.01), which supports Hypothesis H2. Organic buying behaviour (BB) was directly influenced by organic buying intention (BI) at 77% (β=1.10, p<0.05), supporting Hypothesis H3. Trust in brand did not directly influence organic buying intention (BI), however, leading to a rejection of Hypothesis H4. Similarly, trust in brand did not directly influence organic buying behaviour (BB) which also rejected Hypothesis H5 was. Finally, brand loyalty (BL) did not directly influence organic buying behaviour (BB), thus discounting Hypothesis H6.

Discussion and Conclusion

This research aims to expand previous literature on brand trust in the Thai organic food industry by investigating links between brand trust, loyalty, buying intention and actual buying behaviours. Prior studies have primarily examined the brand trust and brand loyalty links within non-food contexts, or non-organic food contexts in developing countries. This research contributes a causal model of organic food buying behaviours of Thai consumers.
which is able to identify factors that explain purchasing behaviours, important factors which were not found in previous studies. The model clearly demonstrated that the effect of brand trust on brand loyalty subsequently dictated buying intention, which played a key role in consumers’ observed purchase behaviours. The final research model confirms that Thai consumers perceive organic foods differing by brand, and can therefore view organic foods as heterogeneous goods that belong to a distinct marketing paradigm.

In line with previous studies, most organic product consumers in this study were female (Sangkumchaliang & Huang, 2012; Sriwaranun et al., 2015; Xie et al., 2015), with substantially high educations and high incomes (Sriwaranun et al., 2015; Xie et al., 2015). Findings suggest that “intention” and “loyalty” are mediator factors which lead to and dictate buying behaviours. A significant relationship exists between brand trust and brand loyalty, consistent with previous studies (Wongsuphasawat & Buatama, 2019; Lassoued & Hobbs, 2015; Chaudhuri & Holbrook, 2001). Results indicate that brand loyalty influences buying intentions with a predictive power of 94%, meaning that that 94% of consumer “intention” was driven by the organic brand loyalty. The investigation further revealed that “loyalty” to be the most important factor affecting “intention.” Data also confirmed findings from previous research (Tarkiainen & Sundqvist, 2005; Hung et al., 2013) into organic foods demonstrating a positive relationship between intention to purchase and customers’ actual purchase behaviour. Therefore, the findings indicate “intention” and “loyalty” to be mediator factors which lead to buying behaviour.

The outcome of this study indicates that none of the trust variables had any direct influence on buying intentions. This finding is consistent with Nuttavuthisit and Thøgersen (2017), though contrasting from Gunaratne et al. (2019) and Teng & Wang, 2015 who suggest that the latent variable “trust” is related to organic buying intentions.

Trust in a brand did not directly influence behaviour in this study, a result consistent with previous evidence reporting (Chen & Lobo, 2012; Nuttavuthisit & Thøgersen, 2017; Yadav & Pathak, 2016). Ajzen (1991) also posits that any psychological effects on behaviour are mediated through behavioural intentions.

From the presented findings and discussion, it can be concluded that creating brand trust and brand loyalty is essential for optimal marketing and business performance. Brand owners should use marketing strategies to enhance consumer knowledge about the benefits and safety of organic foods. Brand owners could, for example, offer workshops or events at schools, hospitals and food festivals, perhaps with free tasting samples. Brand owners should provide clear information about the safety of their brand and invite customers into the production process by touring an organic farm, for instance (as also mentioned by Hsu, Chang, & Lin, 2016; Napompech, 2019). Doing so will provide consumers with better knowledge of
products being offered and subsequently higher trust in the brand. Because individuals perceive organic products as safe food produced in safe environments, brand owners can undertake corporate social responsibility (CSR) efforts to contribute to environmental causes which reflect the brand’s commitment to healthy living. Previous research (e.g., Jermsittiparsert et al., 2019) has indicated that this will result in higher customer satisfaction. Evidence from Thongplew, Koppen, & Spaargaren (2016) confirms that CSR strategies enrich collaboration among policy, social causes and economics and promote organic dairy consumption.

A limitation of this study was brand trust affecting inclinations to buy organic food, which involved a combination of trust in the organic institution (i.e. the certifier) and trust in producers or sellers (i.e. personal trust). The study’s conceptual framework, based on trust in organic brands, can readily be adapted to cause-related marketing. As trust is a multidimensional concept, however, utilising a single definition of trust may be unsuitable for generalisation and lead to loss of wealth in other industries or broader concepts (Hernandez & Santos, 2010).

Findings from this study may benefit organic food entrepreneurs, farmers, producers and sellers who must devise strategies for organic food-related branding. Effective branding strategies should ideally build consumer trust, thus leading to loyalty and repeated buying behaviours. Proactive marketing of organic food can be reflected through a higher net sales volume. The impact of consumer behaviour on society is also highly relevant, as proactive marketing of organic food can have positive repercussions for national health and the economy.
Appendix

Figure 3. Causal Model of Thai Consumers’ Organic Food Buying Behaviour

standardized estimates  Chi-square = 154.702 (81 df)
REFERENCE


Perner, L. 2018. Information Search and Decision Making: Copyright (c) Lars Perner.


