

Causal Factors Affecting the Purchase Decision of Sukjai Farm's Dates: A Study to Strengthen the Local Community of Ratchaburi

Ntapat Worapongpat^{1*}

ORCID ID: <https://orcid.org/0009-0008-3071-5249>

¹ Eastern Institute of Technology Suvarnabhumi (EIT), Samut Prakan 10540

² Faculty of Humanities and Social Sciences, Maharakham Rajabhat University, Maharakham 44150

*Corresponding Author: dr.thiwat@gmail.com Tel 095 5426414

Received: October 5, 2025; **Revised:** December 3, 2025; **Accepted:** December 24, 2025

Abstract

This study aims to: (1) examine the causal factors influencing consumer purchase decisions for dates produced by a community-based agricultural project; (2) compare the effects of product, price, place, promotion, community value, and socio-personal influences on purchase decisions between consumers in Ratchaburi Province and its adjacent areas; and (3) conduct an Exploratory Factor Analysis (EFA) to explore the underlying structure of these influencing factors. The research employed a quantitative method using a structured self-administered questionnaire. Data were collected from 318 consumers who had the potential to purchase dates, both within Ratchaburi Province and nearby provinces. Descriptive statistics and EFA were applied to analyze the dataset. The findings reveal that factors such as product quality, taste, pricing appropriateness, distribution convenience, and perceived community value significantly shape consumer purchase decisions. The comparative analysis indicates differing levels of influence across the two consumer groups. Furthermore, EFA identifies key latent constructs that summarize the underlying dimensions of consumer perceptions toward date products from community-based agricultural initiatives.

The results of this study contribute valuable insights for improving marketing strategies, enhancing product positioning, and supporting sustainable local economic development within agricultural communities.

Keywords: Dates, Purchase decision, Causal factors, Exploratory factor analysis, Community-based agriculture

Introduction

Driving grassroots economic development and strengthening local communities have become key national strategies in Thailand, particularly within the agricultural sector. The Ministry of Agriculture and Cooperatives (2023) reported that agricultural policies increasingly emphasize value creation, product diversification, and income enhancement for local farmers. One notable example is the rapid rise of date palm cultivation. According to the Office of Agricultural Economics (2023), the cultivated area of date palms in Thailand has increased continuously over the past five years, reflecting both growing consumer demand and strong market potential for processed date products. Dates are recognized for their health benefits and high economic value, making them an emerging economic crop in several regions.

Previous research on dates has largely focused on consumer behavior in general market settings. For instance, Worapongpat (2024b) examined the influence of product quality and distribution channels on consumers' purchasing decisions, while Worapongpat (2024c) studied consumer attitudes toward organic dates. Although these studies contribute to the broader understanding of consumer behavior, they do not address purchasing decisions within community-based agricultural enterprises, which operate within unique social, cultural, and economic contexts. This gap is particularly significant, as community enterprises often rely on localized value creation, trust, and community identity factors that may influence consumer perceptions differently from commercial markets.

The "Sukjai Farm at Baan Hao" project, located in Don Tako Subdistrict, Mueang Ratchaburi District, Ratchaburi Province, is a community-based agricultural initiative with strong potential for date cultivation and local economic development. The project, formed by a collaboration of local farmers, aims to enhance the value of agricultural produce through collective effort (Zhi Chao, Wongkumchai, & Worapongpat, 2023). Despite producing high-quality dates, the project continues to face challenges in expanding its customer base and increasing market visibility (Worapongpat, 2025). Observations during field visits revealed that the project lacks data-driven insights into consumer purchasing behavior, which are essential for developing effective marketing strategies and building long-term customer engagement.

Although research on date consumption has expanded in recent years, no study has specifically examined the factors influencing consumer purchase decisions for dates produced by a community-based agricultural project within this geographical area (Worapongpat & Bhasabutr, 2024). Existing literature also lacks empirical investigations using Exploratory Factor Analysis (EFA) to identify latent factors underlying consumer perceptions in this context a methodological gap that limits strategic planning for community enterprises.

To address these gaps, this research aims to identify the causal factors influencing consumer purchase decisions for dates produced by a community-based agricultural enterprise in Ratchaburi Province and to examine the underlying factor structures using EFA. Through quantitative analysis of consumer perceptions, this study provides essential insights that can enhance strategic marketing, strengthen consumer engagement, and support the sustainable economic development of Sukjai Farm and the local community.

Research Objectives

1. To examine the causal factors influencing consumer purchase decisions for dates produced under the Rai Sukjai Na Ban Hao community-based agricultural project.
2. To compare the influences of six key factors product, price, distribution channels, marketing promotion, community value and local support, and socio-personal influences on consumer purchase decisions between respondents in Ratchaburi Province and those in adjacent provinces.
3. To perform an Exploratory Factor Analysis (EFA) to identify the underlying latent structures of these influencing factors among consumers in Ratchaburi Province and its neighboring provinces.

Literature Review/ Conceptual Framework

1. Factors Influencing Consumer Purchase Decisions Consumer purchasing behavior is a multidimensional process influenced by marketing stimuli and external environmental factors. Worapongpat and Somchob (2024) explain that purchase decisions stem from interactions among marketing mix components and external social-cultural forces, which consumers evaluate cognitively before making choices. Based on prior research, six major factor groups related to date purchasing behavior can be identified: Product Factors Latent Variable Observed variables commonly include: quality and freshness, taste and size, packaging and labeling, organic or chemical-free certification Worapongpat, Thanyaphongphat, and Rasri (2024) found that physical attributes and certification information significantly influence consumers' date selection. Price Factors Latent Variable Observed variables include: perceived value for money, fairness of pricing price comparison with alternative products Perceived price value relationships strongly affect purchasing decisions (Worapongpat & Brorewongtrakhul, 2024). Distribution Channels (Place) Latent Variable Observed variables include: availability at purchase points, online accessibility, delivery convenience Worapongpat et al. (2024) note that accessible distribution channels increase sales probability. Promotion Latent Variable Observed variables include: advertising, communication clarity, promotional campaigns Yanga, Wongkumchai, and Worapongpat (2023) found that effective promotion enhances consumer awareness and stimulates interest. Community Value & Local Support– Latent Variable Observed variables include: community identity and storytelling, support for local farmers, perceived contribution to local development These factors reflect community connection, which can strengthen customer loyalty in rural products markets. Socio–Personal Influences Latent Variable Observed variables include: family recommendations, health consciousness, trust in product origin Yukai, Wongkumchai, and Worapongpat (2023) reported that health awareness strongly drives purchase intention.

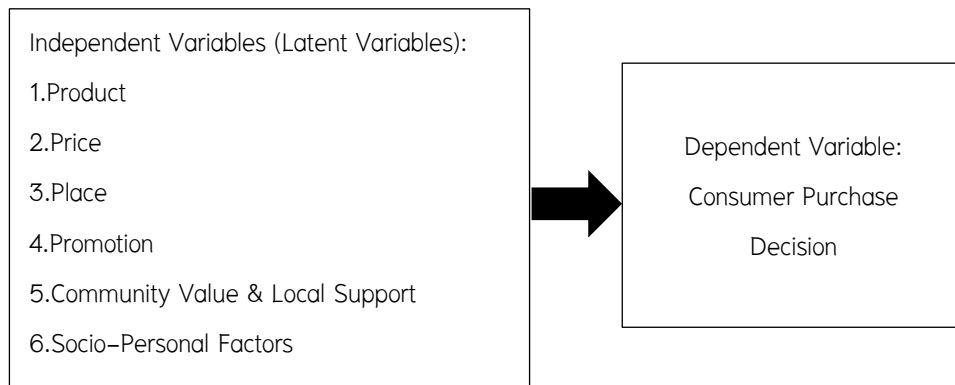
2. Role of Community–Based Agricultural Projects

Community-based agricultural projects contribute to local employment, income generation, and the strengthening of social capital. Such initiatives integrate economic benefits with cultural identity and local narratives, which enhance consumer attachment to community-produced goods. Recent empirical evidence shows that consumers increasingly pay premiums for products supporting local sustainability and community welfare. Marketing community-based products therefore extends beyond attributes such as quality and price; it involves communicating place-based values and community stories that shape consumer trust and behavioral responses.

3. Knowledge Gap

Although previous studies have analyzed factors affecting consumer purchasing behavior for agricultural products, research specifically focused on dates produced by community-based agricultural enterprises remains limited. Existing studies emphasize broad market contexts, with insufficient attention to underlying latent structures that shape purchasing decisions. No empirical research has applied Exploratory Factor Analysis (EFA) to examine the dimensions of consumer perceptions related to community products, such as: credibility of community enterprises, perceived community support, embedded cultural narratives

Conceptual Framework



Marketing mix factors (4Ps), community value, and socio–personal influences interact to shape consumer purchase decisions. EFA is used to uncover latent structures among the six predictor variable groups, followed by a comparative analysis between consumers in Ratchaburi and adjacent provinces.

Research Hypotheses

- H1: Product factors have a significant influence on consumer purchase decisions.
- H2: Price factors have a significant influence on consumer purchase decisions.
- H3: Distribution channel factors have a significant influence on consumer purchase decisions.
- H4: Promotion factors have a significant influence on consumer purchase decisions.
- H5: Community value and local support have a significant influence on consumer purchase decisions.
- H6: Socio–personal factors have a significant influence on consumer purchase decisions.
- H7: There are significant differences in the influence of the six factor groups on purchase .

Research Methods

This study employed a quantitative research design to identify and analyze the causal factors influencing consumer purchase decisions regarding dates produced by the Rai Sukjai Na Ban Hao community–based agricultural project in Don Tako Subdistrict, Mueang Ratchaburi District, Ratchaburi Province. The research methodology is presented as follows:

1. Population and Sample

The population of this research consisted of consumers who were interested in, or had the potential to make, purchase decisions for date products. This included individuals with direct purchase experience as well as those expressing interest in community–based agricultural goods or health–related products.

A purposive sampling technique was adopted to ensure alignment with the research objectives. Inclusion criteria required respondents to (1) have the ability to make or influence purchasing decisions, and (2) be familiar with community–based or agricultural products.

The sample size was determined based on guidelines for Exploratory Factor Analysis (EFA), which recommend 5–10 respondents per observed variable (Hair et al., 2019). Given the number of observed variables used in the study, the target sample size was approximately 300 respondents.

Although the targeted sample size was 300, the data collection process yielded 318 valid responses. This number exceeds the minimum requirement for EFA and enhances the stability and reliability of factor extraction. Therefore, all 318 responses were retained for analysis.

2. Research Variables

This study included six groups of latent variables and corresponding observed variables:

- Product – quality, freshness, taste, size, packaging, certification
- Price – fairness, value for money, price–quality comparison
- Distribution Channels (Place) – accessibility, availability, online channels
- Promotion – advertising, communication clarity, promotional activities
- Community Value and Local Support – community identity, local support, perceived community benefit
- Socio–Personal Influences – family recommendations, health consciousness, trust in origin
- The dependent variable was consumer purchase decision.

3. Research Instrument

The primary instrument was a structured questionnaire composed of two sections:

Section 1: General Information of Respondents

Collected demographic and behavioral data such as gender, age, educational level, occupation, income, and experience or interest in date consumption.

Section 2: Factors Influencing Purchase Decisions

Items measured the six latent factors derived from the conceptual framework. A five–point Likert scale was used (1 = Strongly Disagree, 5 = Strongly Agree).

Instrument Validation

Content Validity: Assessed by three experts to ensure relevance and coverage of the research objectives.

Reliability: Cronbach’s alpha coefficients were calculated, requiring $\alpha \geq 0.70$ as an acceptable threshold (Field, 2018).

Construct Adequacy: Prior to EFA, sampling adequacy was tested using

Kaiser–Meyer–Olkin (KMO) measure, with $KMO \geq 0.60$ indicating suitability, and

Bartlett’s Test of Sphericity, requiring statistical significance ($p < .05$).

These tests ensured that the dataset was appropriate for factor extraction.

4. Data Collection Procedures

Data were collected through both offline and online channels to maximize coverage:

- community markets and agricultural fairs in Ratchaburi Province
- consumer groups and online platforms related to community-based products
- direct distribution of self-administered questionnaires by the research team
- online survey distribution via social media networks

Respondents took approximately 10–15 minutes to complete the questionnaire. All completed responses were checked for completeness before inclusion in the analysis.

5. Data Analysis

Data were analyzed in two stages:

5.1 Descriptive Statistics

Used to summarize demographic characteristics and consumer attitudes. Measures included: frequency, percentage, mean, standard deviation

5.2 Exploratory Factor Analysis (EFA)

EFA was conducted to uncover the underlying structure of factors influencing purchase decisions. The analysis followed standard procedures:

1. Sampling adequacy: KMO and Bartlett's Test
2. Factor extraction: Principal Component Analysis using the Eigenvalue > 1 rule
3. Factor rotation: Varimax rotation to obtain clear and interpretable factor loadings
4. Factor loading threshold: Items with loadings ≥ 0.50 were retained
5. Factor naming: Latent factors were labeled based on item clusters

The EFA results provided insight into the latent dimensions shaping consumer decision-making and supported the development of practical implications for strengthening the Rai Sukjai Na Ban Hao community project.

Findings

1. General Characteristics of Respondents

Table 1 presents the demographic characteristics of the 318 respondents.

Demographic Characteristic	Category	Percentage (%)
Gender	Female	57.2
	Male	42.8
Occupation	Student	29.2
	Employee	20.8
	Self-employed	18.7

Demographic Characteristic	Category	Percentage (%)
Place of Residence	Others	31.3
	Ratchaburi Province	61.2
	Adjacent Provinces	38.8
Generation	Generation Z	43.5
	Generation Y	43.3
	Other Generations	13.2

A majority of respondents were female (57.2%). The most common occupation was students (29.2%), followed by employees (20.8%) and self-employed individuals (18.7%). Most respondents resided in Ratchaburi Province (61.2%), with the remaining 38.8% from adjacent provinces. Regarding age, the two largest segments were Generation Z (43.5%) and Generation Y (43.3%), indicating that younger consumers represented the primary target group.

Interpretation: Findings indicate a predominantly young consumer base with sufficient diversity in province of residence, supporting the comparative analysis required in Objective 2.

2. Comparison of Consumer Attitudes Between Groups (Objective 2)

Table 2 compares the mean scores for the six influencing factors between respondents in Ratchaburi and adjacent provinces using independent-sample t-tests.

Factor	Group	N	M	SD	t-value	df	p
Product	Ratchaburi	256	4.26	0.367	7.397	254.218	.000***
	Adjacent provinces	162	3.91	0.542			
Price	Ratchaburi	256	4.22	0.513	6.794	275.737	.000***
	Adjacent provinces	162	3.80	0.678			
Place	Ratchaburi	256	4.18	0.508	3.033	217.065	.003***
	Adjacent provinces	162	3.93	0.974			
Promotion	Ratchaburi	256	4.20	0.479	5.583	260.507	.000***
	Adjacent provinces	162	3.86	0.684			
Community Value & Local Support	Ratchaburi	256	4.35	0.421	6.123	248.115	.000***
	Adjacent provinces	162	3.98	0.587			
Personal & Social Influence	Ratchaburi	256	4.15	0.556	4.876	230.762	.000***
	Adjacent provinces	162	3.82	0.712			

Key findings: Respondents in Ratchaburi Province rated all six factors significantly higher than those in adjacent provinces ($p < .001$).

The largest differences were found in: Product ($t = 7.397$), Community Value & Local Support ($t = 6.123$), Price ($t = 6.794$)

3. Exploratory Factor Analysis of Influencing Factors (Objective 3)

To address Objective 3, EFA was conducted separately for respondents in Ratchaburi ($n = 256$) and adjacent provinces ($n = 162$). KMO values ranged from 0.741 to 0.809, and Bartlett's tests were significant at $p < .001$, indicating suitability for factor analysis.

3.1 Product Attributes

Table 3 Ratchaburi Province Four factors emerged: Branding and Packaging Appeal, Convenience and Communication, Quality Assurance and Innovation, Local Uniqueness

Factor	Item	Loadings
Factor 1: Branding and Packaging Appeal	Product brand	.805
	Attractive and appealing packaging	.625
Factor 2: Convenience and Communication	Ease of transport and handling	.765
	Effective communication of product meaning	.651
Factor 3: Quality Assurance and Innovation	Certified product quality standards	.650
	Innovative product design	.750
Factor 4: Local Uniqueness	Distinctive local identity	.728

Interpretation: Consumers in Ratchaburi emphasized brand identity and local uniqueness, reflecting strong cultural connection to community-produced dates.

Table 4 Adjacent Provinces Three factors emerged: Branding and Visual Appeal Quality, Sustainability, and Cultural Identity, Innovation and Variety

Factor	Item	Loadings
Factor 1: Branding and Visual Appeal	Product brand	.802
	Product appearance	.721
	Attractive and appealing packaging	.714
Factor 2: Quality, Sustainability, and Cultural Identity	Product quality	.733
	Ease of transportation	.731
	Distinctive local identity	.733

Factor	Item	Loadings
Factor 3: Innovation and Variety	Effective communication of product meaning	.637
	Environmental friendliness	.621
	Shelf life	.660
	Innovative product design	.776
	Product variety	.609

Interpretation: Consumers outside Ratchaburi placed heavier weight on sustainability and environmental friendliness, suggesting a more market-oriented perception.

3.2 Price Attributes

Table 5 Ratchaburi Province One factor extracted: Pricing Appropriateness and Flexibility

Factor	Item	Loadings
Factor 1: Pricing Appropriateness and Flexibility	Reasonable product pricing	.627
	Price comparability with similar products	.670
	Availability of price information	.718
	Multiple payment methods	.628
	Price range diversity	.627

Interpretation: Local consumers valued transparency, fairness, and variety of payment options.

Table 6 Adjacent Provinces One factor extracted: Pricing Accessibility and Variety

Factor	Item	Loadings
Factor 1: Pricing Accessibility and Variety	Price comparability with similar products	.706
	Availability of price information	.694
	Multiple payment methods	.692
	Price range diversity	.765

Interpretation: Adjacent consumers emphasized diverse price options, indicating sensitivity to pricing tiers.

3.3 Distribution Channels (Place)

Table 7 Ratchaburi Province One factor extracted: Convenience and Store Presentation

Factor	Item	Loadings
Factor 1: Convenience and Store Presentation		
Item 1: Convenience of purchase	.642	
Item 2: Clean and aesthetically pleasing retail outlet	.689	
Item 3: Products are consistently available	.716	
Item 4: Ease of travel and parking at the point of purchase	.627	
Item 6: Product display for customer viewing	.634	

Interpretation: Clean store environments and consistent product availability were important to local consumers.

Table 8 Adjacent Provinces Two factors extracted: Convenience and Product Availability, Delivery Accessibility

Factor	Item	Loadings
Factor 1: Convenience and Product Availability		
Item 1: Convenience of purchase	.719	
Item 2: Clean and aesthetically pleasing retail outlet	.773	
Item 3: Products are consistently available	.762	
Factor 2: Delivery Accessibility		
Item 5: Availability of delivery services	.885	

Interpretation: Non-local consumers valued delivery services, suggesting an opportunity for logistic expansion.

3.4 Promotion (Marketing Communication)

Table 9 Ratchaburi Province Two factors extracted: Promotional Influence, Customer Assurance and Service

Factor	Item	Loadings
Factor 1: Promotional Influence		
Item 3: Persuasion by sellers	.906	
Item 4: Advertising and publicity through various media	.648	
Factor 2: Customer Assurance and Service		
Item 5: Sales staff product knowledge	.676	
Item 6: Product warranty	.806	
Item 7: Service quality and staff courtesy	.659	

Interpretation: Local consumers responded strongly to interpersonal persuasion and knowledgeable staff.

Table 10 Adjacent Provinces Two factors extracted: Promotional Influence, Customer-Focused Staff

Factor	Item	Loadings
Factor 1: Promotional Influence		
	Item 3: Persuasion by sellers	.853
	Item 4: Advertising and publicity through various media	.871
Factor 2: Customer-Focused Staff		
	Item 5: Sales staff product knowledge	.773
	Item 7: Service quality and staff courtesy	.877

Interpretation: Adjacent consumers valued advertising and staff courtesy, indicating preference for formal communication.

Discussion and Conclusion

Discussion

Objective 1: To examine the causal factors influencing purchase decisions of dates from the Sookjai Farm Project at Baan Hao Findings indicate that consumer purchase decisions were affected by six major groups of causal factors: product, price, distribution channels, promotional activities, community value and local support, and socio-personal influences. This demonstrates that purchasing behavior is multidimensional and shaped by both marketing stimuli and social-psychological considerations. This aligns with Chetioui, Butt, and Lebdaoui (2021), who assert that modern consumers evaluate products not solely by functional quality but through broader symbolic, psychological, and social meanings. Similarly, the prominence of community value among local consumers reflects principles of social marketing, which emphasize the co-creation of both social and economic value within community contexts. The centrality of community support among Ratchaburi consumers further suggests that local identity, cultural familiarity, and pride in community-based enterprises play important roles in influencing buying decisions. These findings support theories indicating that community-rooted value creation enhances emotional attachment and drives purchasing behavior.

Objective 2: To compare purchase decision factors between consumers in Ratchaburi Province and adjacent provinces Results revealed that consumers in Ratchaburi consistently held significantly more favorable attitudes across all six factors. This can be explained by several contextual conditions: Proximity and direct exposure Living near the community project increases opportunities for product experience, community engagement, and trust-building. Stronger community attachment Local consumers possess deeper familiarity with the farm's mission, production process, and social contribution. Information access – Word-of-mouth communication and community events expose locals to more accurate and meaningful information. These findings align with Erlangga et al. (2021), who argued that brand perception and loyalty intensify when consumers engage directly with products. They also echo Obilor et al.'s (2023) concept of local advantage, which suggests that consumers are more supportive of community-based

enterprises due to shared identity and social embeddedness. In contrast, nonlocal consumers showed moderately positive attitudes but placed higher emphasis on sustainability, convenience, and delivery reflecting a more market-driven rather than community-driven perspective.

Objective 3: To analyze the exploratory factor structures of the 4Ps influencing purchase decisions Product in Ratchaburi, four subdimensions emerged: (1) branding and packaging appeal, (2) convenience and value communication, (3) quality certification and innovation, and (4) local uniqueness. These reflect an expectation for products that simultaneously demonstrate quality, creativity, and strong community identity. This is consistent with Pham et al. (2025), who propose that value creation integrates both functional and symbolic attributes. In adjacent provinces, three components brand aesthetics, quality with sustainability and cultural identity, and product innovation were identified. The emergence of sustainability as an implicit quality dimension aligns with Wilmoth et al. (2024), who suggest that environmentally responsible practices significantly shape consumer evaluation. Price. For both consumer groups, price emerged as a single factor, though with different emphases: Ratchaburi consumers highlighted fairness and pricing transparency. Adjacent provinces emphasized accessible price points and flexible payment options. These results correspond with the theory of perceived price value (Worapongpat, 2024a), which conceptualizes price as a cognitive trade-off between quality and affordability. Place (Distribution Channels) Ratchaburi consumers identified convenience and store atmosphere as key components. The importance of physical accessibility aligns with prior research emphasizing the impact of store environment on consumer purchase behavior. Nonlocal consumers, however, extracted two factors: retail availability and delivery services. This suggests that nonlocal consumers rely heavily on omnichannel distribution systems, highlighting the need for expanded logistic services to reach broader markets. Promotion. Local consumers emphasized interpersonal persuasion and service assurance, which underscores the role of relationship marketing in community-driven markets. Nonlocal consumers emphasized advertising and staff professionalism, supporting the service quality model that highlights the importance of knowledgeable and friendly staff, especially when consumers rely on mediated (not direct) product experience.

Conclusion

This study examined the factors influencing consumer purchase decisions for dates produced by the Rai Sukjai Na Ban Hao community-based agricultural enterprise and compared perceptions between consumers in Ratchaburi Province and adjacent provinces. The findings revealed that six major factor groups product, price, place, promotion, community value and local support, and socio-personal influences significantly shaped consumer decision-making. Consumers in Ratchaburi demonstrated more favorable attitudes across all factors, likely due to stronger community attachment, greater exposure to product experiences, and enhanced access to local information. Additionally, the exploratory factor analysis identified distinct latent dimensions within each factor group for both consumer groups, highlighting differences in product expectations, distribution preferences, and promotional influences. Overall, the results underscore the importance of integrating marketing strategies with community values, emphasizing both functional attributes and socio-cultural dimensions. This approach supports the development of sustainable community enterprises by aligning consumer perceptions with local identity, trust, and economic participation.

Suggestions

1. Marketing Strategy Development

1.1 Integrate product, price, place, and promotion (4Ps) with community value to build a holistic marketing strategy that highlights authenticity, local identity, and social impact.

1.2 Strengthen transparent communication about product quality, certifications, and community benefits to reinforce consumer trust.

2. Strategies for Local Consumers

2.1 Reinforce community identity, storytelling, and cultural value to maintain high loyalty among local consumers in Ratchaburi.

2.2 Promote local engagement activities—such as farm visits, community fairs, and local promotions to strengthen emotional connection.

3. Strategies for Nonlocal Consumers

3.1 Prioritize sustainability messaging, consistent product quality, and environmental friendliness, which were valued more by nonlocal consumers.

3.2 Improve distribution channels by expanding delivery services, online purchasing systems, and logistics reliability.

3.3 Enhance customer service through professional and knowledgeable staff to compensate for the lack of direct product experience.

4. Product & Promotion Development

4.1 Use packaging, branding, and visual identity that reflect local uniqueness while meeting modern aesthetic expectations.

4.2 Invest in social media advertising and multi-channel communication to reach broader consumer groups.

References

- Chetioui, Y., Butt, I., & Lebdaoui, H. (2021). Facebook advertising, eWOM and consumer purchase intention: Evidence from a collectivistic emerging market. **Journal of Global Marketing**, 34(3), 220–237. Form <https://doi.org/10.1080/08911762.2020.1866642>.
- Erlangga, H., Sunarsi, D., Pratama, A., Sintesa, N., & Hindarsah, I. (2021). Effect of digital marketing and social media on purchase intention of SMEs food products. **Turkish Journal of Computer and Mathematics Education**, 12(3), 3672–3677.
- Obilor, H. N., Weisz, T., Botros, M., Wilson, R., Tranmer, J., & Woo, K. (2023). A qualitative-based evaluation of the impact of participating in a social media-based foot self-management program among people with diabetes. **Collegian**, 30(6), 812–820. Form <https://doi.org/10.1016/j.colegn.2023.03.007>.

- Pham, S., Churruca, K., Ellis, L. A., & Braithwaite, J. (2025). Utilisation of the internet and support communities on Facebook for gestational diabetes mellitus self-management and empowerment: A cross-sectional online survey study. **Information, Communication & Society**, 1–19. Form <https://doi.org/10.1080/1369118X.2025>.
- Wilmoth, S. R., Carrillo-McCracken, L. L., Wilhite, B., Pan, M., Parra-Medina, D., Sosa, E. T., & He, M. (2024). Impacts of diabetes self-management education and support programs in Hispanic church settings: A cluster-randomized trial comparing faith-based and faith-placed approaches. **Nutrients**, 17(1), 69. Form <https://doi.org/10.3390/nu17010069>.
- Worapongpat, N. (2024a). Marketing management and digital marketing of Jasmine rice: Nong Hin Housewives Group, Ratchaburi Province. **International Journal of Multidisciplinary in Educational & Cultures Studies (SITER)**, 2(1), 1–14. Form <https://so04.tci-thaijo.org/index.php/ijec/article/view/270721>.
- Worapongpat, N. (2024b). Digital market management for community enterprise group of herbal processing and organic agriculture products: Khlong Yong, Phutthamonthon, Nakhon Pathom. **Journal of Innovative Management and Business Administration**, 1(1), 10–22. Form https://so15.tci-thaijo.org/index.php/jimba_journal/article/view/216.
- Worapongpat, N. (2024c). Participatory research practices for community enterprise digital marketing development: Krua Kanong curry paste Songkanong professional groups, Song Kanong Subdistrict, Sam Phran District, Nakhon Pathom Province. **Journal of Management Science and Accounting**, 3(1), 65–86. Form https://so07.tci-thaijo.org/index.php/JMSA_FMS_URU/article/view/4231.
- Worapongpat, N. (2025). Enhancing competitiveness of Riceberry rice and rice bran oil through digital marketing: A case study of Huai Phra Subdistrict Community Enterprise. **Asian Journal of Humanities and Social Innovation**, 2(3), 1–11. Form <https://so14.tci-thaijo.org/index.php/AJHSI/article/view/1692>.
- Worapongpat, N., & Bhasabutr, P. (2024). Community learning for marketing management and digital marketing of Jasmine rice: Nong Hin Housewives Group, Ratchaburi Province. **Journal of Education and Learning Reviews**, 1(5), 57–70. Form <https://doi.org/10.60027/jelr.2024.848>.
- Worapongpat, N., & Somchob, P. (2024). Participatory community learning to develop a digital market management system for community enterprises and stable occupation groups: Nam Phrik Kaeng Krua Khanong, Song Kanong Subdistrict, Sam Phran District, Nakhon Pathom Province. **Journal of Education and Learning Reviews**, 1(6), 61–74. Form <https://doi.org/10.60027/jelr.2024.847>.
- Worapongpat, N., Thanyaphongphat, J., & Rasri, W. (2024). Logo and packaging development and digital media development of beaded products: Nakhon Pathom Province. **Journal of Management Science Sakon Nakhon Rajabhat University**, 4(2), 411–424. Form <https://so08.tci-thaijo.org/index.php/JMSSNRU/article/view/1492>.

- Worapongpat, N., & Brorewongtrakhul, S. (2024). The development of online social media technology for agricultural tourism: Rai Khing Rice Mill Community Enterprise Group. **Journal of Management Science Udon Thani Rajabhat University**, 4(4), 1–9. Form <https://so08.tci-thaijo.org/index.php/MSJournal/article/view/2827>.
- Worapongpat, N., Dookarn, S., Sun, Q., Somchob, P., Bunnag, C., & Thanyaphongphat, J. (2024). Digital marketing management of herbal products in the community context of Ban Nong Thiam, Nakhon Pathom Province: Guidelines for developing marketing strategies in the digital age. **Journal of Dhammasuksa Research**, 7(2), 61–79. Form <https://so07.tci-thaijo.org/index.php/dsr/article/view/2323>.
- Yanga, L., Wongkumchai, T., & Worapongpat, N. (2023). The impact of online word-of-mouth from multi-platforms on product sales. **UBRU International Journal**, 3(3), 55–70. Form <https://so04.tci-thaijo.org/index.php/ubruij/article/view/269847>.
- Yukai, S., Wongkumchai, T., & Worapongpat, N. (2023). The marketing strategy of a financial holding company in the digital era on customer satisfaction: A case study of a Chinese financial holding company. **International Journal of Multidisciplinary in Educational & Cultures Studies**, 1(3), 21–34. Form <https://so04.tci-thaijo.org/index.php/ijec/article/view/267554>.
- Zhi Chao, H., Wongkumchai, T., & Worapongpat, N. (2023). Rural digital model for upgrading rural areas to an efficient digital society: A case study of SMEs in Urumqi, China. **International Journal of Multidisciplinary in Educational & Cultures Studies**, 1(3), 35–55. Form <https://so04.tci-thaijo.org/index.php/ijec/article/view/268211>.