



Price And Distribution Channels On 3 Kg LPG Customer Satisfaction at The Base Company in Bandung Regency

Ilham Triananda Solihin¹ Alvina Chandra Fadhilah² and Yenny Maya Dora³

¹Magister Management Universitas Widyatama Bandung-Indonesia
ilham.solihin@widyatama.ac.id¹ chandra.alvina@widyatama.ac.id² and
yenny.maya@widyatama.ac.id³

Abstract. In the rapidly evolving business environment and intense competition, including in the LPG distribution industry, companies distributing subsidized LPG must be prepared to compete. To remain competitive, businesses need to enhance customer satisfaction to ensure long-term sustainability. Price and distribution channels play a crucial role in this context. UD Gas Base H2S, which sells 3 kg LPG, prioritizes customer satisfaction through its pricing and distribution strategies but faces challenges such as missed sales targets and customer complaints. This study aims to analyze the impact of price and distribution channels on customer satisfaction using descriptive and quantitative methods. Through multiple linear regression analysis, the results show that price and distribution channels significantly influence customer satisfaction.

Keywords: Price, Distribution Channels, Consumer Satisfaction, LPG, Gas Base.

1 Introduction

1.1 Background

In Indonesia, the oil and gas sector play a crucial role in the national economy. Following the government's kerosene-to-gas conversion program from 2007-2012, fuel subsidies significantly decreased. The conversion to LPG has expanded across the country, with many popular distributors emerging.

In a rapidly changing business environment, intense competition, including in the LPG industry, requires sellers to understand consumer needs and preferences. Companies distributing subsidized LPG must navigate challenges to ensure operational efficiency and effectiveness. To remain competitive in the global market, they must improve customer satisfaction, which is influenced by how well the product meets consumer needs and expectations.

UD base. H2S is a supplier of subsidized 3 kg LPG gas. For two years, the store located Bandung Regency has maintained its sales. LPG 3 kg Gas Base UD. H2S always tries to see from the comparison of selling prices and also applies distribution channels that can increase 3 kg LPG gas customer satisfaction. As shown in table 1.1, a comparison of 3 kg LPG gas pricing with competitors:

© The Author(s) 2024

V. Mardiansyah and R. A. E. V. Targa Sapanji (eds.), *Proceedings of the 1st Widyatama International Conference on Management, Social Science and Humanities (ICMSSH 2024)*, Advances in Social Science, Education and Humanities Research 886,
https://doi.org/10.2991/978-94-6463-608-6_23

Table 1.1 Comparison of Selling Prices of 3 kg LPG Gas

Company	Selling Price
PT. Pertamina (Bandung Regency Area)	19.600 IDR/tube
Gas Base UD. H2S	20.000 IDR/tube
Other Gas Base (competitor)	19.000 IDR/tube

Source: Data processed by researchers

Based on table 1.1 above, it appears that PT. Pertamina sets the price at IDR 19,600/tube. However, when compared to its competitors, the 3 kg gas base UD. H2S sets a selling price that is quite a bit higher than its competitors. This comparison illustrates the significant difference in pricing between the two.

Meanwhile, the 3 kg LPG gas station UD. H2S often gets complaints from customers every week, this happens because of dissatisfaction with the services provided at the 3 kg gas base UD. H2S, the following are complaints from consumers of the 3 kg LPG gas base UD. H2S:

Table 1.2 Consumer Complaints of 3 kg LPG gas

Consumer Complaints	Average Number of Complaints Received
Delayed delivery of 3 kg LPG gas to consumers	25% of consumers complained about the late delivery of 3 kg LPG gas
Different in the total of 3 kg LPG gas deliveries received by consumers	75% of consumers complained about the mismatch in the total of 3 kg LPG gas deliveries received.

Source: Data processed by researchers

The decline is due to intense price competition and ineffective distribution channels, limiting access to 3 kg LPG Gas in urban and rural areas. A company's success depends on effective marketing, product appeal, and quality. To achieve research goals, the product must stay competitive and meet customer needs, as positive consumer responses drive success.

LITERATURE REVIEW

Price

According to Sunyoto (2020)¹, price is the cost set for a product, determined by upper management in smaller companies and by division or product managers in larger ones. Kotler and Armstrong (2018)² identify four key price indicators: affordability (prices aligned with consumer financial capability), compatibility with quality (price reflecting product quality), compatibility with benefits (price matching the value consumers receive), and competitive pricing (distinct pricing compared to competitors).

¹ Sunyoto, D. (2020). Dasar-Dasar Manajemen Pemasaran (Edisi Ketiga). CAPS (Center of Academic Publishing Service).

² Kotler, P., & Armstrong, G. (2018). Prinsip-Prinsip Pemasaran (Edisi Ketujuh). Penerbit Salemba Empat. Jakarta.

Distribution Channels

According to Abubakar (2018)³, distribution channels are essential for ensuring goods and services reach consumers efficiently. Heru Suciato Tjia & Suharno (2018)⁴ outline key indicators to evaluate these channels: availability of goods (product stock levels), ordering process (steps from manufacturer to customer), delivery speed (efficiency of delivery routes), and ease of obtaining goods (accessibility through the distribution system).

Customer Satisfaction

According to Fatihudin & Firmansyah (2019)⁵, customer satisfaction is measured by comparing customers' expectations with their actual experience. Indrasari (2019)⁶ identifies key indicators: expectation conformity (how well the company's performance meets expectations), interest in repeat purchases (customers' intent to buy again), and willingness to recommend the product or service to others.

RESEARCH METHOD

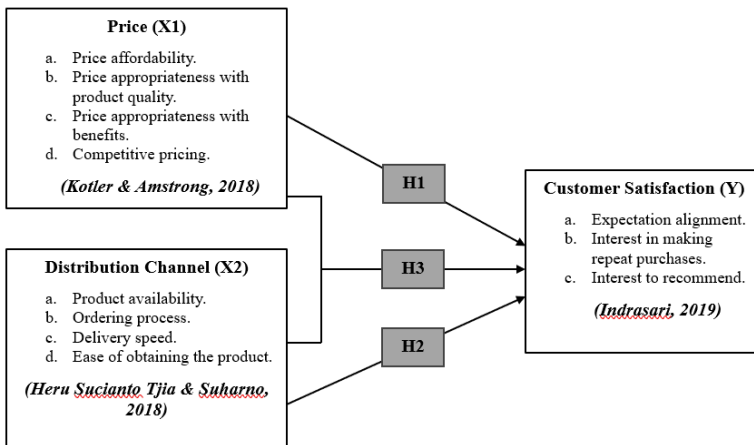


Figure 1.1

This is based on empirical facts collected through data gathering. With the theoretical foundation outlined, the resulting hypotheses are as follows:

H1: Price affects customer satisfaction of 3 kg LPG gas at UD. H2S gas base in Bandung Regency.

H2: Distribution channel affects customer satisfaction of 3 kg LPG gas at UD. H2S gas base in Bandung Regency.

H3: Price and distribution channel simultaneously affect customer satisfaction of 3 kg LPG gas at UD. H2S gas base in Bandung Regency.

³ Abubakar, R. (2018). Manajemen Pemasaran. Bandung: Alfabeta.

⁴ Heru Suciato Tjia, Suharno, M. A. K. (2018). Pengaruh harga kualitas produk dan distribusi terhadap keputusan pembelian. Kinerja, 14(2), 92.

⁵ Fatihudin, D., & Firmansyah, A. (2019). Pemasaran Jasa:(Strategi, Mengukur Kepuasan Dan Loyalitas Pelanggan).

⁶ Indrasari, M., & Press, U. (2019). Pemasaran Dan Kepuasan Pelanggan: pemasaran dan kepuasan pelanggan. Unitomo Press.

This study employs descriptive research to investigate identified situations, using a quantitative method focused on numerical data analysis to test hypotheses. According to (Suharsimi Arikunto, 2019)⁷, Descriptive research is a type of research that aims to investigate situations, conditions, or other factors that have been previously identified, with the results presented in the form of a research report. According to Sugiyono (2019)⁸, quantitative research is based on positivism, targeting a specific population or sample with data collected via research instruments. The study's population consists of 100 consumers of UD 3 kg LPG Gas Base H2S, and due to its small size, the census technique was used. Data was collected through direct observation and questionnaires. The analysis, using inferential statistics, was conducted with SPSS version 25 by IBM.

RESULT

Validity Test Analysis

This study connected the desired significance level with the required number of subjects (n). For instance, with $n = 100$ and a 5% error rate, the table value of r is 0.1966. The minimum validity requirement is that the calculated r must be ≥ 0.1966 ; otherwise, the item is invalid. The validity test results show that each statement in the questionnaire exceeds this threshold, confirming that all items are valid and suitable for assessing the study's focus variables.

Reliability Testing Analysis

The success of a set of statements in measuring variables is considered good and reliable if the reliability coefficient is greater than or at least equal to 0.6 (>0.60).

The results of the reliability test on all research items show that each item can be considered to have a sufficient level of reliability (the reliability coefficient exceeds 0.60). Therefore, all of these items can be used as reliable tools to assess the variables that are the focus of this study.

Multiple Linear Regression Analysis

Table 1.3 Multiple Linear Regression Coefficients^a

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	-.053	2.531		-.021	.983
	Price	.440	.076	.450	5.793	.000
	Distribution Channel	.339	.066	.399	5.133	.000

a. Dependent Variable: Customer Satisfaction

The constant value is -0.053, meaning if Price (X1) and Distribution Channels (X2) are zero, Customer Satisfaction decreases by 0.053. The Price coefficient (X1) is 0.440, indicating that a 1-unit price increase raises Customer Satisfaction (Y) by 0.440, while a decrease lowers it by the same amount. Competitive pricing boosts satisfaction. The Distribution Channel coefficient (X2) is 0.339, meaning a 1-unit improvement increases Customer Satisfaction by 0.339, while a decrease lowers it similarly. Efficient distribution enhances customer satisfaction.

⁷ Suharsimi Arikunto. (2019). *Prosedur Penelitian Suatu Pendekatan Praktik*.

⁸ Sugiyono. (2019). *Metode Penelitian Kuantitatif, Kualitatif, dan R&D (Edisi ke-2)*.

Test Coefficient of Determination (R²)

Table 1.4 Test Coefficient of Determination Model Summary^b

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.674 ^a	.454	.443	3.129

a. Predictors: (Constant), Distribution Channel, Price

b. Dependent Variable: Customer Satisfaction

Based on the results of the coefficient of determination test, the R value (correlation coefficient) is 0.443 or 44.3%, indicating that the Price variable (X1) and the Distribution Channel variable (X2) influence Customer Satisfaction (Y) by 44.3%. The remaining 55.7% is explained by other variables that are not included or considered in this research analysis.

Simultaneous Hypothesis Test (F Test)

Table 1.5 Simultaneous Hypothesis Test (F Test)

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	789.370	2	394.685	40.315	.000 ^b
Residual	949.630	97	9.790		
Total	1739.000	99			

a. Dependent Variable: Customer Satisfaction

b. Predictors: (Constant), Distribution Channel, Price

The F Table value is 3.09. The results show that F Count (40.315) is greater than F Table, indicating that the Price and Distribution Channel variables simultaneously influence Customer Satisfaction at UD Gas Base H2S. Thus, H1 is accepted and H0 is rejected, confirming the validity of the first hypothesis.

Partial Hypothesis Test (t Test)

Table 1.5 Partial Hypothesis Test (t Test)

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	-.053	2.531		-.021	.983
	Price	.440	.076	.450	5.793	.000
	Distribution Channel	.339	.066	.399	5.133	.000

a. Dependent Variable: Customer Satisfaction

The test results show that price significantly affects customer satisfaction with a significance value of 0.000 (<0.05) and t count (5.793) > t table (1.984). Similarly, distribution channels also have a significant positive effect on customer satisfaction, with a significance value of 0.000 and t count (5.133) > t table (1.984).

DISCUSSION

Description of Price and Distribution Channel Variables on UD Gas Base Customer Satisfaction Variables. H2S

The average respondent rating for the price of 3 kg LPG gas at UD Gas Base H2S is 4.19, indicating a generally good perception. However, continuous assessment of pricing strategies is needed to stay competitive. The distribution channel rating is 3.92, suggesting it is also good, but improvements in gas availability are necessary to boost customer satisfaction. Lastly, customer

satisfaction at UD Gas Base H2S has an average rating of 3.90, reflecting a positive perception, though improvements in delivery accuracy are needed to meet customer expectations.

The Effect of Price on Customer Satisfaction

According to the results of the partial hypothesis (t test), it is evident that t count (5.793) exceeds t table (1.984). Based on the hypothesis testing criteria, H₀ is rejected and H₁ is accepted, indicating a significant influence of Price on Customer Satisfaction for 3 kg LPG gas at UD Gas Base H2S. This suggests that competitive pricing can enhance customer satisfaction levels at UD Gas Base. However, these findings contrast with research conducted by Fitria and Andria Ningsih (2019)⁹, which showed that price has a negative and significant effect on customer satisfaction at PT. Tri Fa Jaya in Lima Puluh Kota Regency. Conversely, the findings align with the study by Fitriyana and Dharmawan (2018)¹⁰, which indicated a positive and significant influence of price on customer satisfaction at PT Bukitapit Bumi Persada.

The Effect of Distribution Channels on Customer Satisfaction

The partial hypothesis test (t test) shows that t count (5.133) exceeds t table (1.984), leading to the rejection of H₀ and acceptance of H₁. This indicates that the Distribution Channel significantly influences Customer Satisfaction for 3 kg LPG gas at UD Gas Base H2S, suggesting that an effective distribution channel can enhance customer satisfaction. These findings are consistent with research conducted by Achmad and Rifai (2019)¹¹, which examined the impact of price perceptions, product quality, and distribution channels on satisfaction at PT. Pelita Mekar Semesta, showing that distribution channels have a positive and significant influence.

The Effect of Price and Distribution Channels on Customer Satisfaction

The simultaneous hypothesis test (F test) shows that F count (40.315) exceeds F table (3.09), leading to the rejection of H₀ and acceptance of H₁. This indicates that Price and Distribution Channels significantly influence Customer Satisfaction at UD Gas Base H2S, suggesting that competitive pricing and effective distribution can enhance customer satisfaction. These findings align with research by Nurul and Mulyowahyudi (2019)¹², which analyzed the effect of product quality, price perception, distribution, and brand image on customer satisfaction of Quelle AMDK in Cilegon City. Their results demonstrated that these factors, when considered together, have a positive and significant effect on customer satisfaction.

CONCLUSIONS AND SUGGESTIONS

Conclusions

This study examined the impact of Price and Distribution Channels on customer satisfaction for 3 kg LPG gas at UD Gas Base H2S in Bandung Regency. Results revealed that price significantly affects satisfaction, with a score of 4.33 showing customers find it suitable for their purchasing power. Distribution channels also play a key role, scoring 4.05 for positive views on timely delivery. Together, these factors influence satisfaction, as indicated by a score of 4.17, suggesting satisfied customers are likely to recommend the product. However, this research is limited to price and distribution channels, highlighting the need for further studies to explore additional factors influencing customer satisfaction.

⁹ Ningsih, A. Pengaruh Harga Terhadap Kepuasan Pelanggan Lpg 3 Kg (Studi Kasus Pada PT. Tri Fa Jaya Di Kabupaten Lima Puluh Kota) Fitria Stie Has Bukittinggi. In Seminar Internasional & Call for Paper Tahun 2019 (P. 110).

¹⁰ Fitriyana, M., & Dharmawan, D. (2018) Pengaruh Kualitas Layanan Jasa Dan Harga Terhadap Kepuasan Pelanggan PT. Bukitapit Bumi Persada.

¹¹ Achmad, R. (2019). Pengaruh Presepsi Harga, Kualitas Produk, Dan Saluran Distribusi Terhadap Kepuasan (Studi Kasus Pada PT. Pelita Mekar Semesta).

¹² Nurul, A., & Mulyowahyudi, A. (2019). Analisis Pengaruh Kualitas Produk, Persepsi Harga, Distribusi, dan Citra Merek pada Kepuasan Pelanggan Air Minum Dalam Kemasan Quelle di Kota Cilegon. PERWIRA-Jurnal Pendidikan Kewirausahaan Indonesia, 2(1), 1-15.

Suggestions

Based on the study's findings, several recommendations are proposed for companies, readers, and future researchers. First, companies should adopt a competitive pricing strategy, aiming to match or undercut competitors to improve customer satisfaction at UD Gas Base H2S. Second, enhancing the availability of 3 kg LPG gas is crucial to retain customers who might otherwise choose competitors with more reliable stock. Third, companies should focus on timely deliveries by implementing an order management system that adheres to agreed timelines. Lastly, UD Gas Base H2S should assess its delivery process, ensuring employees accurately record orders to prevent errors and guarantee customers receive the correct amount of gas.

References

1. Sunyoto, D. (2020). *Dasar-Dasar Manajemen Pemasaran (Edisi Ketiga)*. CAPS (Center of Academic Publishing Service).
2. Kotler, P., & Armstrong, G. (2018). *Prinsip-Prinsip Pemasaran (Edisi Ketujuh)*. Penerbit Salemba Empat. Jakarta.
3. Abubakar, R. (2018). *Manajemen Pemasaran*. Bandung: Alfabeta.
4. Heru Sucianto Tjia, Suharno, M. A. K. (2018). Pengaruh harga kualitas produk dan distribusi terhadap keputusan pembelian. *Kinerja*, 14(2), 92. <https://doi.org/10.29264/jkin.v14i2.2484>
5. Fatihudin, D., & Firmansyah, A. (2019). *Pemasaran Jasa:(Strategi, Mengukur Kepuasan Dan Loyalitas Pelanggan)*. Deepublish.
6. Indrasari, M., & Press, U. (2019). *Pemasaran Dan Kepuasan Pelanggan: pemasaran dan kepuasan pelanggan*. Unitomo Press. <https://books.google.co.id/books?id=PYfCDwAAQBAJ>
7. Suharsimi Arikunto. (2019). *Prosedur Penelitian Suatu Pendekatan Praktik*.
8. Sugiyono. (2019). *Metode Penelitian Kuantitatif, Kualitatif, dan R&D (Edisi ke-2)*.
9. Ningsih, A. Pengaruh Harga Terhadap Kepuasan Pelanggan Lpg 3 Kg (Studi Kasus Pada PT. Tri Fa Jaya Di Kabupaten Lima Puluh Kota) Fitria Stie Has Bukittinggi. In *Seminar Internasional & Call for Paper Tahun 2019* (P. 110).
10. Fitriyana, M., & Dharmawan, D. (2018) Pengaruh Kualitas Layanan Jasa Dan Harga Terhadap Kepuasan Pelanggan PT. Bukitapit Bumi Persada.
11. Achmad, R. (2019). Pengaruh Presepsi Harga, Kualitas Produk, Dan Saluran Distribusi Terhadap Kepuasan (Studi Kasus Pada PT. Pelita Mekar Semesta).
12. Nurul, A., & Mulyowahyudi, A. (2019). Analisis Pengaruh Kualitas Produk, Persepsi Harga, Distribusi, dan Citra Merek pada Kepuasan Pelanggan Air Minum Dalam Kemasan Quelle di Kota Cilegon. *PERWIRA-Jurnal Pendidikan Kewirausahaan Indonesia*, 2(1), 1-15.

Open Access This chapter is licensed under the terms of the Creative Commons Attribution-NonCommercial 4.0 International License (<http://creativecommons.org/licenses/by-nc/4.0/>), which permits any noncommercial use, sharing, adaptation, distribution and reproduction in any medium or format, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons license and indicate if changes were made.

The images or other third party material in this chapter are included in the chapter's Creative Commons license, unless indicated otherwise in a credit line to the material. If material is not included in the chapter's Creative Commons license and your intended use is not permitted by statutory regulation or exceeds the permitted use, you will need to obtain permission directly from the copyright holder.

