

**DISCOUNTED CASH FLOW VALUATION OF  
THAI PRESIDENT FOODS**

The image features a large, faint watermark of the Mahidol University logo in the background. The logo is circular, containing a central emblem with a crown and two lions, surrounded by Thai script and the English text 'MAHIDOL UNIVERSITY'.

**SAOWALAK WATCHARAWONGCHAI**

**A THEMATIC PAPER SUBMITTED IN PARTIAL  
FULFILLMENT OF THE REQUIREMENTS FOR  
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**DISCOUNTED CASH FLOW VALUATION OF THAI PRESIDENT  
FOODS PUBLIC COMPANY LIMITED**

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Saowalak Watcharawongchai

**DISCOUNTED CASH FLOW VALUATION OF THAI PRESIDENT FOODS**

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M.M. (CORPORATE FINANCE)

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**ABSTRACT**

This thematic paper was established with the purpose to assess the stock price of Thai President Foods (symbol TFMAMA) by utilizing the discounted cash flow valuation approach in order to issue the recommendation for the investors.

Thai President Foods produces and distributes food items including instant noodles under the well-known brand “MAMA”, semi-finished foods, biscuits, bakery, fruit juice, and packaging. The top line sales were forecasted based on the growth of nominal GDP both in Thailand and foreign countries that the company exports to, together with the perpetual growth rate of 2.59% from the weighted historical performance from 2017 through 2022. According to the DCF model, the intrinsic value is projected to be 214 baht per share, indicating a 6% upside from the stock price at 202 baht per share, as of 3 March 2023. Thereupon, since the difference is not greater than 20%, the investment recommendation for TFMAMA is to “HOLD”.

**KEYWORDS:** TFMAMA/ Valuation/ Discounted Cash Flow

55 pages

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## CHAPTER I

Thai President Foods Public Company Limited (abbreviated as "TF") is a manufacturer and distributor of food products, primarily the instant noodles and semi-finished food that take place at 58.9% in the company total sales at the latest year (2022). While the rest are from bakery, biscuit, fruit juice, packaging, and others and account for 28.4%, 3%, 4%, 4.5%, and 1.2%, respectively. Whereas the proportion of domestic sales and foreign sales are 77.2:22.8.

Currently, TFMAMA is the main player in the instant noodle market in Thailand with the market share of more than 50%, thereupon, the company strategies are to release new flavor for the existing products to capture the new generation customers together with focus to expand in the overseas market.

Undoubtedly, in the last two years the company has faced the challenge of raw material price strengthening, especially the wheat, palm oil, and rice, indicating the lower net profit of the company. However, the company enter the future contracts to mitigate the risk of fluctuation in the raw materials price.

According to the discount cash flow model, the forecasted sales from the year 2023 through 2027 are based mostly on the growth rate of the nominal GDP whilst after the year 2027, the terminal growth is projected to be 2.59% from the historical CAGR from 2017 to 2020. TFMAMA's target price is 214 baht per share as of 3 Mar 2023, representing 6% upside from the market price at 202 baht per share. Leading to the "HOLD" recommendation as the upside is not exceed 20%.

## **CHAPTER II COMPANY DESCRIPTION**

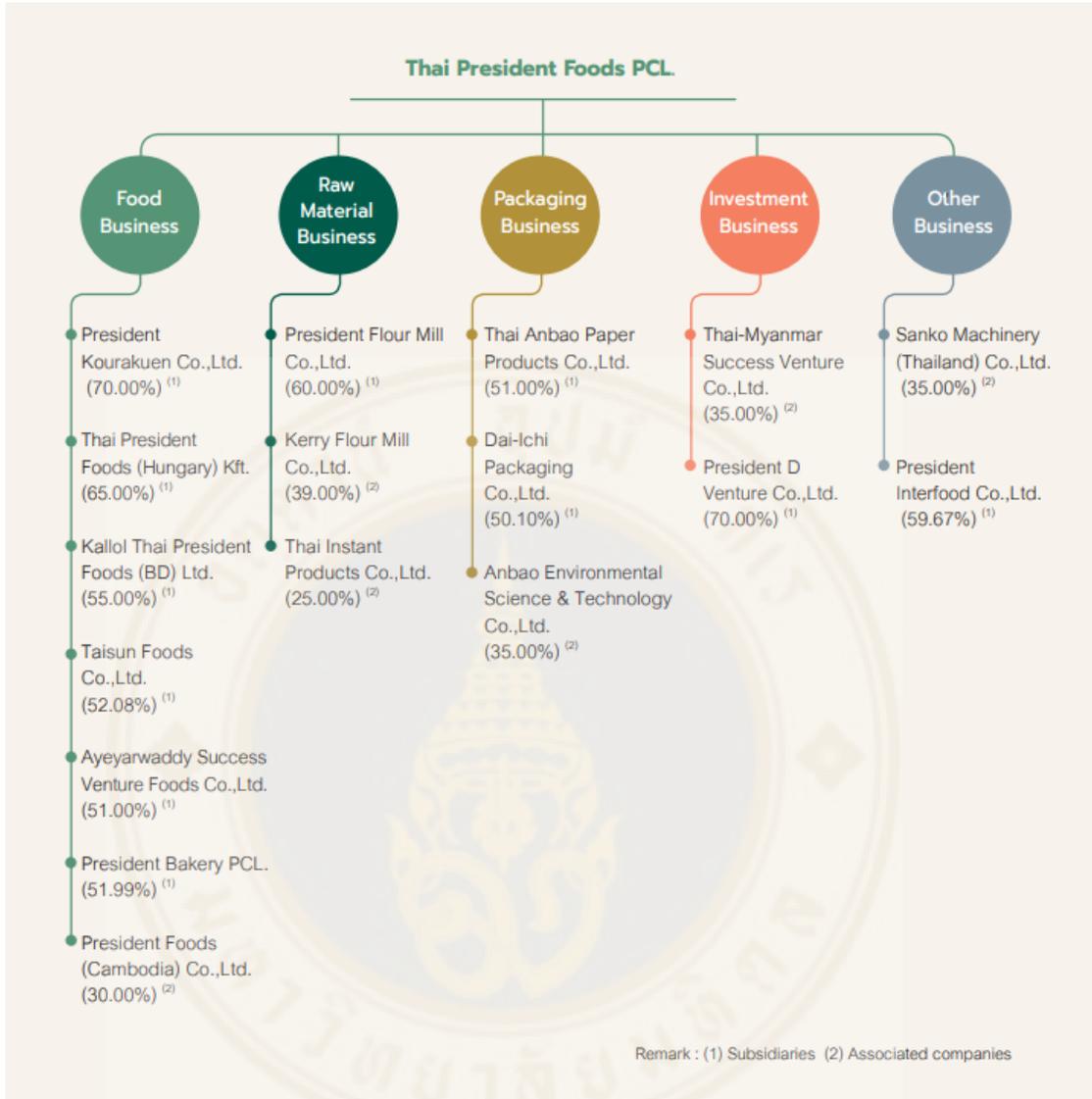
Thai President Foods Public Company Limited (abbreviated as "TF") was founded on February 15th, 1972, the company initially was a partnership between two companies, Sahapatanaphibul Company Limited which oversaw the marketing and sales, and President Enterprise Company Limited, a production technology specialist from Taiwan, under the purpose of producing instant noodles called "MAMA".

On October 16, 2017, there was a merger between Thai President Foods Public Company Limited ("TF") and President Rice Products Public Company Limited ("PR"), becoming a new company with the initial name "TF." And on that day, the business was listed on the Security Exchange of Thailand with the ticker symbol "TFMAMA."

### **2.1 Company Structure and Operation**

The business produces and distributes food items including instant noodles, semi-finished foods, biscuits, bakery, fruit juice, and packaging, with the vision "To be a world-leading food producer and brand name that are well-accepted and recognized by consumers of all household for our safe and international standard products under creative and innovative management with responsibilities to social and environment for the long-term sustainability" (TFMAMA Annual report 2021, p. 16). Additionally, there are a variety of products that are operated by several companies (11 Subsidiaries and 6 Associated Companies) and a percentage of shareholding of each as follows.

#### **Figure 2.1: Shareholding Structure of TFMAMA**

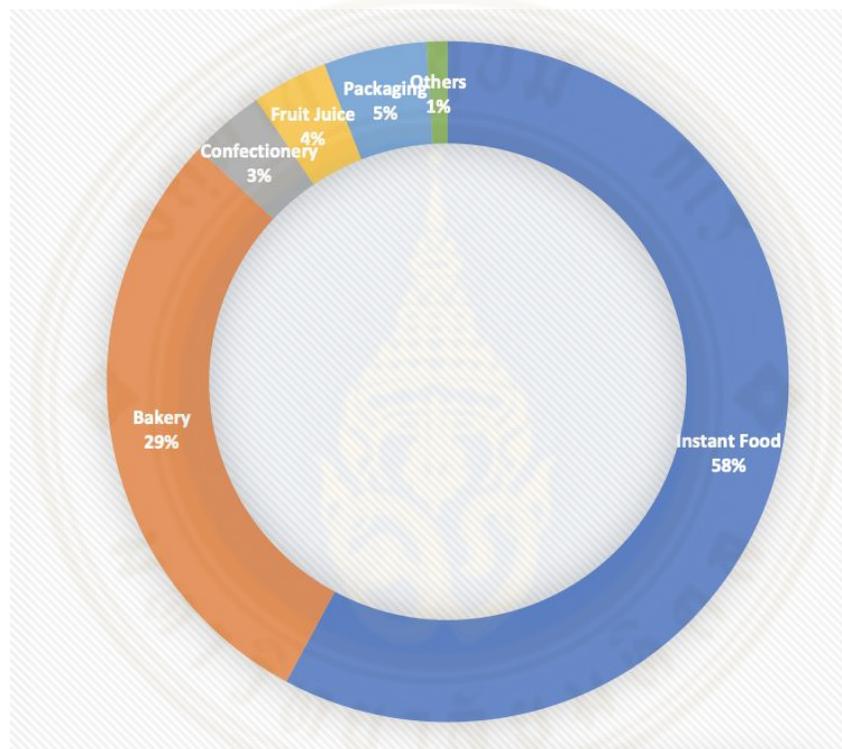


**Source: TFMAMA Annual report 2021**

## 2.2 Product and Service

Thai President Foods Public Company Limited operates 13 companies, which operate in five different Business Groups: Food, Packaging, Raw Material, Investing, and Agent, and there are six different Product Lines under its operation, as follows:

**Figure 2.2: Sales Revenue Proportion of Thai President Foods Public Company Limited by Product Lines as of 31 December 2021**



**Source: Team analysis**

### 2.2.1 Instant Noodles and Semi-finished food

The Product line is further classified into three different types; Semi-finished products manufactured from wheat flour as major raw material, Semi-finished products manufactured from rice as major raw material and Semi-finished products manufactured

from other raw materials. As of December 31, 2021, this Product line accounts for 58% of total sales revenue.

This product line's products are sold, distributed, and exported worldwide. The highlight example product for this category is "Mama," a well-known brand for instant noodles with a market share of over 47% in the domestic market. According to the company's 2021 Annual report, its production capacity for this specific product is 6 million packs per day.

As of December 31, 2021, the company also produces for international brands in Europe (proportioning 25%), the United States (proportioning 15%), Australia (proportioning 4%), and Canada (proportioning 4%). President Kourakuen Co.,Ltd, Thai President Food (Hungary) Kft., Kallol Thai President Foods (BD) Ltd., Ayeyarwaddy Success Ventrue Foods Co., Ltd., and Thai President Foods Plc (TFMAMA) operate the Instant Noodles and Semi-finished food Product line, and TFMAMA holds 70%, 65%, 55%, 51%, and N/A of each company, respectively.

### **2.2.2 Bakery**

The Bakery Product line is divided into three categories: Wholesale Bakery Products, Retail Bakery Products, and Fast Food & Catering Products. As of December 31, 2021, the Product line accounted for 29.28% of total sales revenue.

Thai President Foods Public Company Limited, President Bakery PCL., operates the product line, which produces and distributes bakery products in the local market. Thai President Food owns 51.99% of the total shares of President Bakery PCL.

### **2.2.3 Biscuit**

Thai President Foods Public Company Limited operates the Biscuit Product Line, which accounts for 3.44% of total sales revenue as of December 31, 2021.

"Bissin" and "Homey" are two brands from this product line.

#### **2.2.4 Fruit Juice**

As of December 31, 2021, this product line accounted for 3.47% of total sales revenue. Taisun Foods Co., Ltd. operates it and TFMAMA holds a 52.08% stake in this product line.

“Green Mate”, “Kelly”, and “Thai Sun” are examples of brands in this product line.

#### **2.2.5 Packaging**

As of December 31, 2021, this product line accounts for 4.20% of total sales revenue. It is run by two businesses: Thai Anbao Paper Products Co., Ltd. and Dai-Ichi Packaging Co., Ltd. The companies' shareholding proportions in these subsidiaries are 51% and 50.1%, respectively.

#### **2.2.6 Others**

This Product line has three sub-categories: Wheat flour manufacturing, Real estate investment and Exporting Agent. As of December 31, 2021, this product line accounted for 0.98% of total sales revenue.

Different parties operate the three categories mentioned above. President Flour Mill Co., Ltd., which is owned 60% by TFMAMA, manufactures wheat flour and is also classified as a raw material business group. The Real estate investment is managed by President D Venture Co.Ltd., which is owned 70% by TFMAMA. The Exporting Agent is President Interfood Co., Ltd., of which TFMAMA owns 59.67% of the shares.

## **2.3 Marketing and Business Strategy**

TFMAMA and the affiliated groups continue to strive towards the goals by creating new items that enhance nutrition, creating a production process that secures the product's quality in accordance with global benchmarks, and improving quality employees will be the driving force in propelling the company towards its objectives, TFMAMA expects its 30 billion Baht in sales to generate earnings. (TFMAMA Annual report 2021)

Amid the ongoing COVID-19 viral mutation and the current pandemic crisis towards the year 2021, the organization has made adjustments and developed business strategies in response to the environment, complying with the good corporate governance policy, social and environmental responsibility, anti-corruption policy, and recognizing the value and ability of staff in addition to consistently producing a good operational performance to become sustainable and stable.

Apart from that, the company divided the market into two main sections which are the Domestic market and the international market as follows:

### **2.3.1 Domestic market**

For the year 2021, in the marketing strategy for Mama's instant noodle products, the company has created unique tastes for the OK Series, a high-end market that has earned positive responses from clients, and the modern trade association is where most sales take place. Thereupon, to reach all its target markets, the company then decided to develop more products under the OK Series with a range of flavors, which will boost the revenues of the Mama brand.

Furthermore, the company took various marketing and PR techniques into practice and placed a strong emphasis on offline and online promotional programs for the OK Series by concentrating on raising consumer awareness of the availability of OK Series bag products and constantly organizing different campaigns.

Meanwhile, TFMAMA has increased the creation of innovative products for the market in the high-end category, including OK instant rice. This would be owing to the decline in sales of the products in the porridge and instant boiling rice group in the year 2021.

To sum up, Mama intends to constantly create unexplored flavor products across all product categories, such as instant noodles, instant rice noodles, noodles, and vermicelli, instant porridge and instant boiled rice, and Biscuits, to develop a wide range of products and get customers with various product needs. Along with creating new items for customers who come across the relevance in health and wellness, to encourage revenues and to deliver better opportunities.

### **2.3.2 International Market**

The unavoidable result of the Corona pandemic has effect labor scarcity, hikes in the price of raw materials, logistical issues, container deficiencies, and a spike in freight costs, increasing both production costs and retail prices at the terminal. Nevertheless, the corporation is dedicated to promoting positive business growth in many nations by making strategic reforms. For example, reorganizing Chinese distributors for offline marketing to increase sales nationally. Plus, with giving importance and emphasizes adapting to changes rapidly.

Likewise, the firm had advanced marketing online by assisting distributors in advertising on platforms for E-commerce, allowing customers to see the content of the products and brands on the main social media and websites of China. Weibo, Sohu, Mafengwo, Ctrip, and others, for instant. With the purpose to broadcast unknown culinary styles to clients, MAMA has developed content on numerous platforms for social media like Facebook, Twitter, Instagram, and TikTok, as well as cooperated with overseas influencers in the United States, United Kingdom, and Singapore.

TFMAMA is devoted to developing products in accordance with market mechanisms and producing items that align with international trends. Nutritional products are regarded as one of the most significant culinary sensations nowadays. The organization has released non-fried items blended with vegetables to increase nourishing value, as well as publicizing canceled utilization of palm oil in various European nations and changed to utilize rice bran oil instead to match market demand while reducing the usage of palm oil to lessen the environmental effects.

## **2.4 Corporate governance**

As of December 31, 2021, there are a total of 2,321 shareholders. The company's shareholding structure is as follows: Juristic Person has 59.94%, Natural Person has 40.06%, 79.08% of which is Thai Nationality, and the rest is Non-Resident.

The Company has a policy of limiting the Board of Directors and executives, and their family members to issued and paid-up shares of less than 25%. As of December 31, 2021, the Board of Directors executives and their family members, a total of 34 people, held shares of the company amounting to 14.97%.

The following are the top ten major shareholders of Thai President Foods Public Company Limited:

1. Saha PathnaInter-Holding PCL with a 25.98% stake.
2. NISSIN FOODS HOLDINGS CO., LTD with a 16.84% stake
3. Punsak-Udomsin Group with a 15.74% stake
4. Paniangvait Group with a 14.47% stake
5. Tatiyakavee Group with a 8.68% stake
6. NOMURA SECURITIES CO LTD-CLIENT A/C with a 3.18% stake
7. Chokwatana Group with a 2.27% stake
8. Sahapatanapibul Public Company Limited with a 1.95% stake.
9. I.C.C. International Public Company Limited with a 1.25% stake.

#### 10. Osathanugrah Group with a 1.06% stake

The Company has crossholdings with Saha Pathana Inter-Holding Public Co.Ltd. as of 31 December 2021, where the Company holds 1.23% shares in Saha Pathana Inter-Holding Public Co.Ltd. and Saha Pathana Inter-Holding Public Co.Ltd. holds 25.98% shares in the Company.

As of 31 December 2021, the Company had Registered and Paid-up Capital of 329,704,014 shares, with no other share types, Stocks, Mutual funds, or other convertible securities.

#### Figure 2.3: TFMAMA Shareholders detail

Shareholders Detail	
Overview As of 29 Sep 2022 Rights Type : XD	Free Float As of 30 Mar 2022
Total Shareholders <b>2,297</b>	Minor Shareholders (Free float) <b>1,686</b>
% Shares In Scripless Holding <b>75.82</b>	% Shares In Minor Shareholders (% Free float) <b>24.30</b>

#### Source: SET

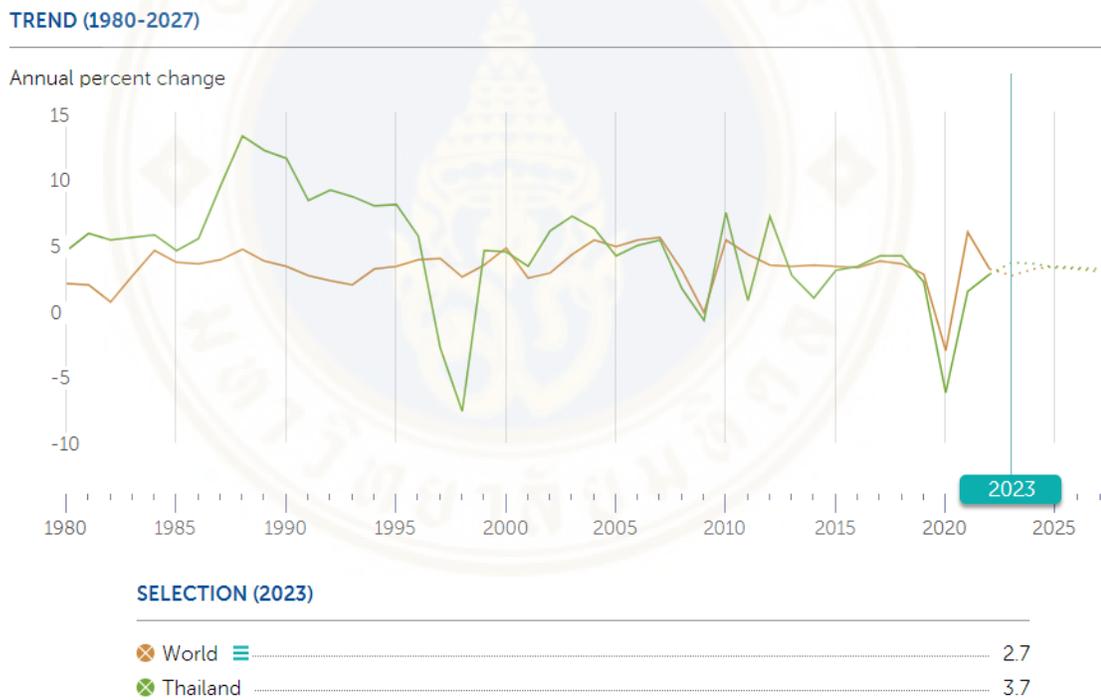
According to the most recent SET record (2022), the number of shareholders of TFMAMA was 2,297 in total. Free Float shares held by minor shareholders were recorded at 1,689 in total, representing 24.3% of the total shares.

## CHAPTER III MACROECONOMIC, INDUSTRY, AND COMPETITION ANALYSIS

### 3.1 Macro-Economic Analysis

#### 3.1.1 Global and Thai GDP

**Figure 3.1: The world and Thai's real GDP growth**



**Source: International Monetary Fund (IMF)**

**Figure 3.2: Forecast summary of Thailand's GDP growth and headline inflation**

Forecast summary as of 30 November 2022				
%	2021*	2022	2023	2024
GDP Growth	1.5	3.2 (3.3)	3.7 (3.8)	3.9
Headline Inflation	1.2	6.3 (6.3)	3.0 (2.6)	2.1
Core Inflation	0.2	2.6 (2.6)	2.5 (2.4)	2.0

**Source: Bank of Thailand (BOT)**

Referring to the graph of the world and Thai's real GDP growth from the International Monetary Fund (IMF), Thai's GDP growth had outperformed the world until 1996 before the Asian Financial Crisis in 1997 which resulted in negative Thai GDP growth in that year due to a severe recession. After that, both world and Thai's real GDP growth sharply contracted in the year 2020, -3% and -6.2%, respectively, due to the Coronavirus pandemic that slowed down the entire world. However, the latest year indicated a recovery sign as the world's GDP growth increased by 2.8% and Thai's GDP growth rose by 3.2%. Besides, the Bank of Thailand (BOT) has predicted the Thai GDP growth rate to be 3.7% and 3.9% in the year 2023 and 2024, respectively, which provided a favorable indication that the country's GDP growth will be strengthened.

**Figure 3.3: TFMAMA's Statement of Comprehensive Income Summary**

Statement of Comprehensive Income Unit: M.Baht

	Y/E 2020 31 Dec 2020	Y/E 2021 31 Dec 2021	9M/2021 30 Sep 2021	9M/2022 30 Sep 2022
Accounting Type	Consolidate	Consolidate	Consolidate	Consolidate
Revenue From Operations	23,580.48	24,457.04	17,972.54	19,600.51
Other Income	183.16	228.30	168.12	111.33
Total Revenues	23,838.54	25,095.88	18,437.86	20,094.46
Costs	14,849.96	16,126.93	11,735.15	14,075.62
Selling And Administrative Expenses	3,611.08	3,873.73	2,878.81	3,004.62
Total Cost And Expenses	18,461.04	20,000.66	14,613.96	17,080.24
EBITDA	6,920.81	6,629.10	5,002.63	4,144.45
Depre. & Amor.	1,216.06	1,219.53	918.51	879.47
EBIT	5,704.75	5,409.57	4,084.12	3,264.98
Net Profit : Owners Of The Parent	4,090.01	3,574.64	2,707.31	1,954.74
EPS (B.)	12.41	10.84	8.21	5.93

Source: Stock Exchange of Thailand (SET)

**Figure 3.4: TFMAMA's Growth Rate Summary**

Growth Rate (%)

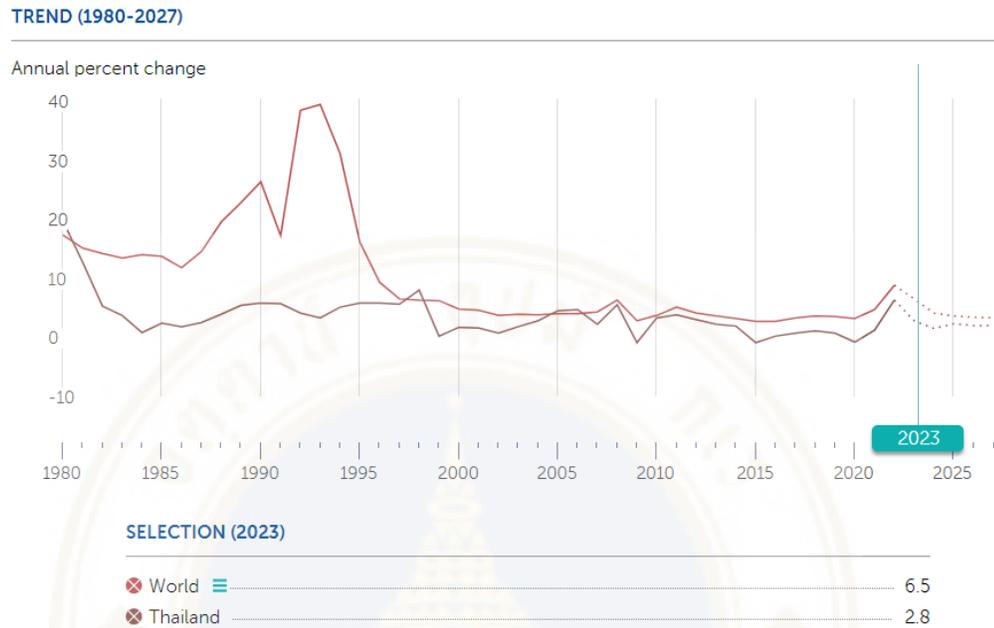
	Y/E 2020 31 Dec 2020	Y/E 2021 31 Dec 2021	9M/2021 30 Sep 2021	9M/2022 30 Sep 2022
Sales Growth	-1.74	3.72	0.81	9.06
COGs Growth	-2.95	8.60	4.95	19.94
Total Revenue Growth	-2.77	5.27	1.07	8.98
Total Expense Growth	-3.47	8.34	5.18	16.88
Net Profit Growth	3.73	-12.60	-13.65	-27.80

Source: Stock Exchange of Thailand (SET)

Interestingly, since instant noodle is considered an inferior good, when the economy is strong the demand for this product will decline. However, it can be seen in Figures 3.3 and 3.4 that the revenue from operation for 9M/2022 is 19,600.51 million baht whereas for 9M/2021 was 17,972.54 million baht, increasing by 9.06%. This was mostly owing to an increase in selling prices, together with the higher value of export sales which improved due to the depreciation of the Thai baht.

### 3.1.2 Inflation Rate

**Figure 3.5: The world and Thai's inflation rate**



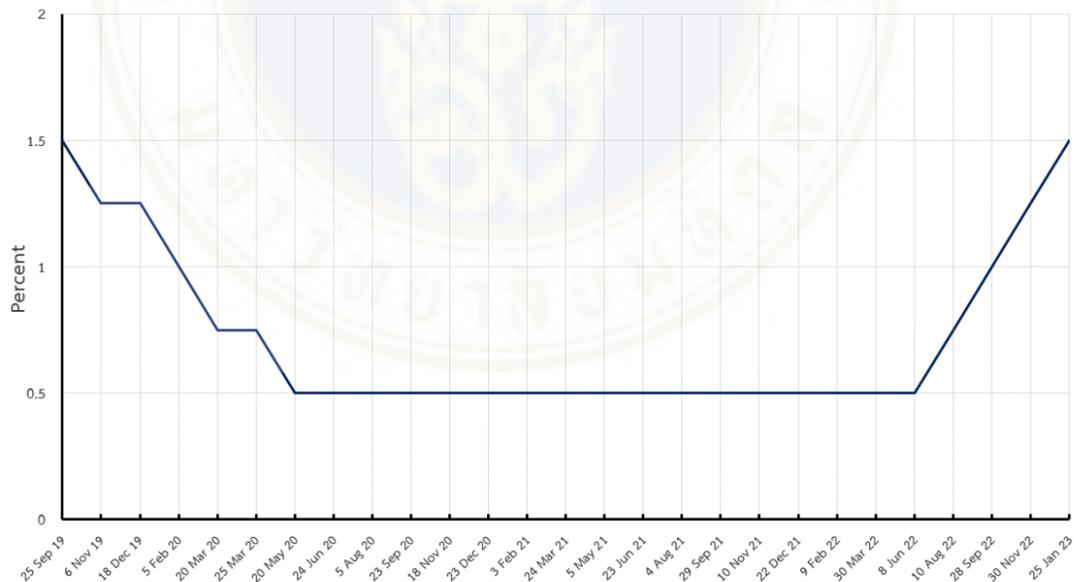
**Source: International Monetary Fund (IMF)**

In terms of inflation, the historical data revealed that since the year 2000, world and Thai inflation have a parallel in which Thai inflation is lower than the world by approximately 1.5-2%. In the year 2020, the world's inflation was 3.2% while Thailand's inflation was -0.8%. And among the two following years, both numbers significantly climbed to 8.8% and 6.3%, respectively. This might be attributed to a shortage of consumer products (higher demand and lower supply) as a consequence of the easing of covid-19 restrictions, the conflict between Russia-Ukraine, and skyrocketing of the World crude oil prices (Zipmex, 2022). Nevertheless, the prediction of BOT about the headline inflation of Thailand is 3.0% in 2023 and 2.1% in 2024 which decreases over the next two years (Figure 3.5).

The current high inflation rate in Thailand created a challenge for the company to higher raw material costs. According to figures 3.3 and 3.4, the cost of goods sold was 14,075.62 and 11,735.15 million baht for 9M/2022 and 9M/2021, respectively, illustrating an increase of 19.94%. So, as mentioned above that the revenue rose by 9.06% while the cost of goods sold increased by 19.94%, this would negatively affect the gross profit margin of the firm. In other words, inflation decreased the gross profit margin and consequently negatively impacted the net profit at the end. Evidently, the net profit of 9M/2022 was 1,954.73 million baht whereas of 9M/2021 was 2,707.31 million baht, a decrease of 27.80%. Nevertheless, the inflation rate was predicted to be lower in the next year, hence the raw material costs might also be lower, and the company might be able to grow its net profit as a result.

### 3.1.3 Interest Rate

**Figure 3.6: Thailand's Interest Rate**



**Source: Bank of Thailand (BOT)**

According to Figure 3.6 Thailand's Interest Rate above, it is shown that the bank of Thailand gradually declined its interest rate from 1.50% in September 2019 to 0.5% in May 2020 and maintain the same level for around two years until the mid of the year 2022, in order to help relieve the impact of the Covid-19. Recently, the BOT raise the interest to 1.50%, causing borrowing costs to reach their highest level since mid-2019 as the committee considers economic growth that the Thai economy is expected to regain pace, boosted by an ongoing rebound in tourism and private consumption and inflation forecasts (Bank of Thailand, 2023).

From TFMAMA's point of view, the change in interest rate might not have a high influence on the company since there is just a small portion of assets were funded by debt as the debt-to-equity ratio in the year 2021 was just 0.12 times, and 9M/2022 was 0.13 times.

### 3.1.4 Exchange Rate

**Figure 3.7: Exchange Rate (USD/THB)**

USD/THB - US Dollar Thai Baht ▲ 33.530 +0.030 (+0.09%)



Source: Investing.com

When looking at Figure 3.7, we can see that the Thai baht depreciated against USD during the mid of 2022 which lead to an increase in the volume of export sales in the Thai Baht as aforementioned. The proportion of sales from foreign that the company exports to sell abroad in the year 2021 is 21.66% of total revenue, which is exported to Asia, Europe, and America and mainly came from the sale of instant food at 18.69% (TFMAMA Annual report 2021).

Although this benefited the company for the first 9 months of the year 2022, THB just appreciated against USD at the beginning of the year 2023, hence this benefit might not still be available for the next year.

## **3.2 Industry analysis**

This section will include four consecutive analyses: 3.2.1 Global F&B analysis, 3.2.2 Regional F&B analysis, and 3.2.3 Domestic F&B analysis, as well as a section for analysis of Thai President Foods Public Company Limited's dominant product: 3.2.4 Market Overview for Convenient Foods- Instant Noodles.

**Thai President Foods Public Company Limited** operates in the Food, Beverages and Tobacco industry or the F & B industry. According to the SET index as of 17 February 2023, TFMAMA is the 6th largest company in the Thailand Food and beverage market, with a market capitalization of THB 66.9 billion.

### **3.2.1 Global analysis of F&B industry**

A report on the global Food, Beverage, and Tobacco industry (Euromonitor, 2022) indicted production growth and market gain for the F&B and Tobacco industry to continue growing in the year as it has leveled off from the pre-pandemic level in 2021 to a

higher value in 2022. Price increases that reflect increased production value are a significant indicator. The United States (ranked first) and China (ranked second) remain the industry's global leaders in this sector, followed by Germany, Ireland, and Indonesia. However, the total number of companies in the industry has actually decreased as a result of consolidation, owing in part to the rise in raw material costs, which has put pressure on global producers.

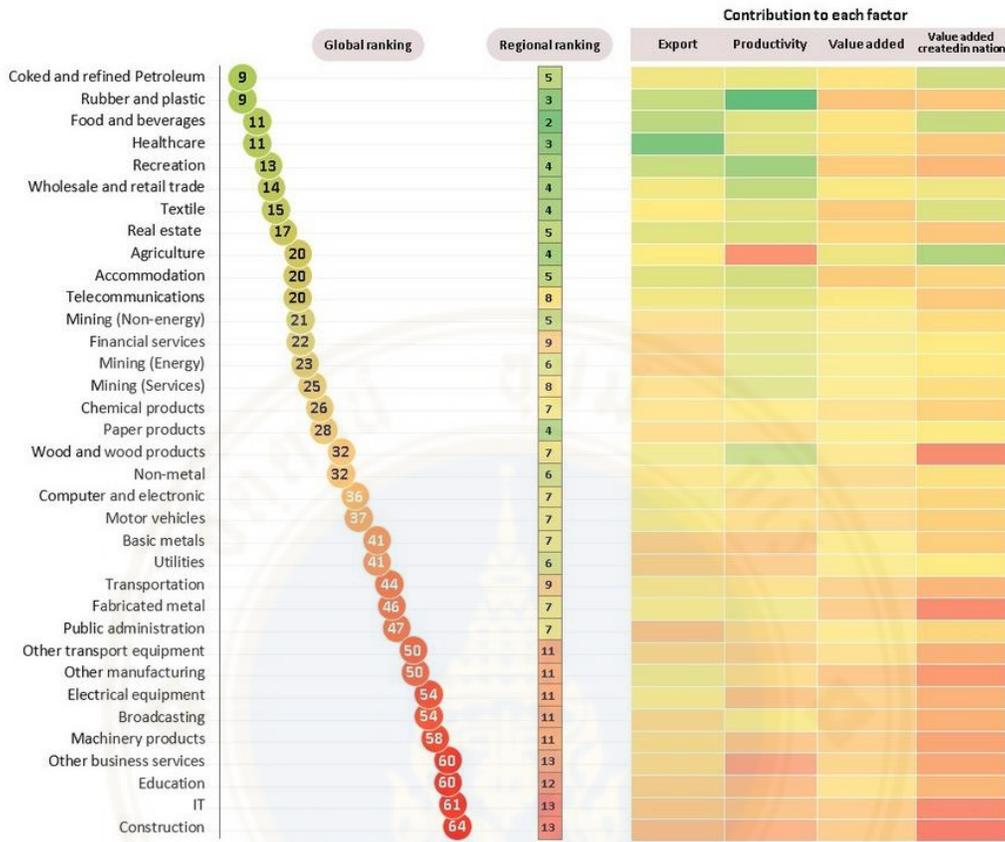
### **3.2.2 Regional (APAC) analysis of F&B industry**

The regional (Asia Pacific or APAC) outlook for the F&B industry also indicates growth, with a CAGR of 8.90% expected between 2021 and 2028 (Euromonitor, 2022). APAC's growing population is expected to fuel significant economic growth, cementing the region's position as the world's largest food producer. Many APAC countries' growing middle classes are expected to boost domestic demand for food. Between 2021 and 2030, the F&B and Tobacco industry in APAC is expected to grow by more than USD 1 billion, reaching USD 5.1 billion.

### **3.2.3 Domestic (Thailand) analysis of F&B industry**

Thailand is ranked in the top 11 countries worldwide and second in the region in a ranking of the F&B industry (Krungsri Research, 2021). Thailand's top three domestic sectoral rankings are Rubber and Plastics, Food and Beverage, and Healthcare. Nonetheless, Thailand's competitiveness falls short of that of its neighbors and the ASEAN group in a number of industries, including IT, construction, and education.

**Figure 3.8: Thai sectoral potential ranking**



Source: OECD, calculation by Krungsri Research  
 Note: Regional ranking includes Brunei Darussalam, Cambodia, Indonesia, Philippines, Singapore, Thailand, Vietnam, Japan, Korea, India, Hong Kong, Malaysia, and Taiwan

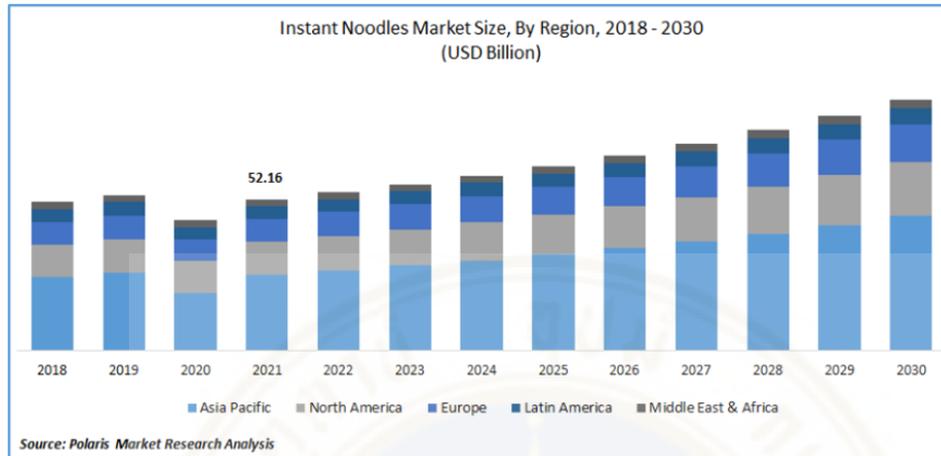
**Source: Krungsri Research**

### 3.2.4 Market Overview for Instant Noodles

#### Instant Noodles: Global overview

Over the forecast period, 2022-2030, the market for Instant Noodles is anticipated to grow at a CAGR of 5.91% (Polaris Market Research, 2021). Moreover, the same report shows that the Global Instant Noodles market revenue in 2021 stood at a value of USD 52.16 billion and is expected to reach USD 69.9 Billion in 2028.

**Figure 3.9: Instant Noodles Market Size, By Region**



**Source: Polaris Market**

In the past few years, the COVID-19 pandemic has had a considerable impact on the global market for Instant Noodles. Consumers are prone to shop in larger amounts knowing a lockdown is uncertain, and, due to this, consumers have resorted to panic shopping and stocked up on long-lasting items like Instant Noodles.

Furthermore, consumers' increasingly hectic lifestyles influence their dietary preferences for ready-to-eat foods. More consumers want to prepare quick meals, such as Instant Noodles, that can be consumed right away. According to reports, consumer disposable income per capita is expected to rise in the coming years, making low-cost food options may be less popular due to it is considered an inferior good. Meanwhile, Instant Noodles manufacturers are developing products to appeal to the growing number of health-conscious consumers, which will contribute to the market's progress.

### **Instant Noodles: APAC overview**

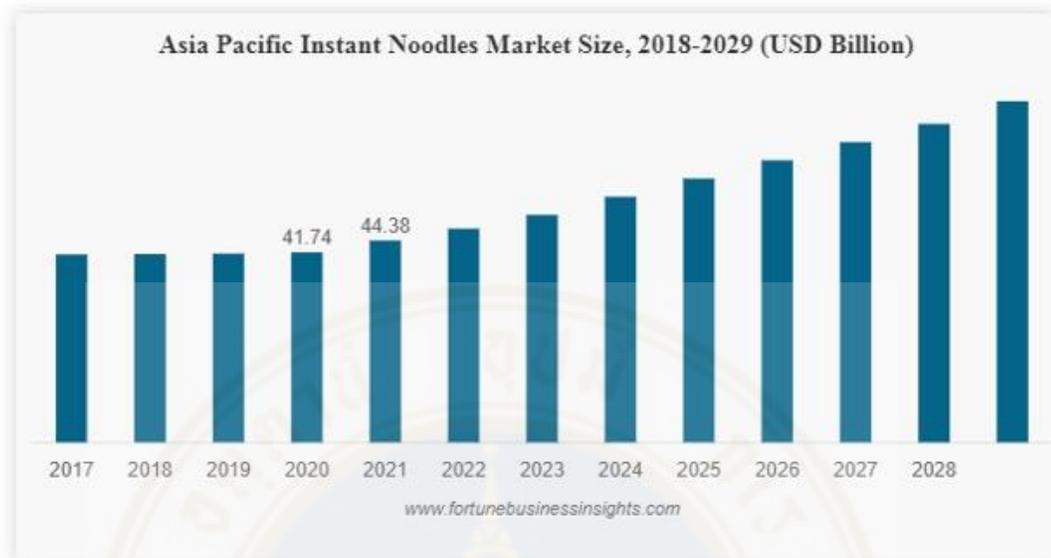
**Figure 3.10: Instant Noodles Market Size, By Global Geography**

Instant Noodles Market: Market Size (%), by Geography, Global, 2021



**Source: Mordor Intelligence**

The APAC Market Size of Global Instant Noodles is the largest in the world, reaching USD 44.38 billion in 2021. The region's market dominance is due to the region's strong presence of numerous local and global brands. The reason for this is that Instant Noodles are a byproduct of the deeply ingrained Asian culinary culture and thus the most popular among its countries. Asian countries account for ten of the top fifteen countries in terms of instant noodle consumption.

**Figure 3.11: Instant Noodles Market Size, APAC**

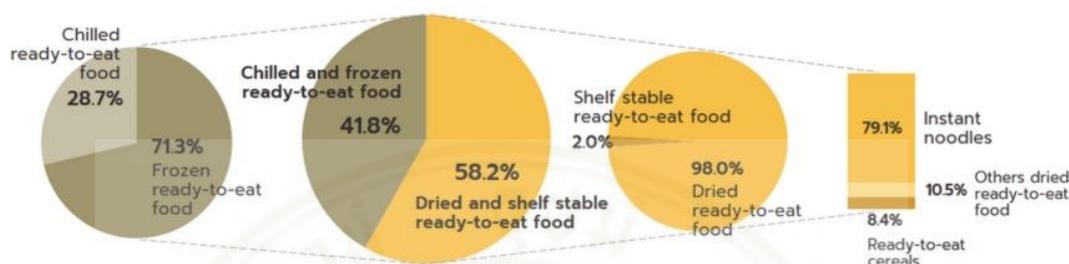
**Source: Fortune Business Insights**

The APAC market is expected to maintain its global dominance in the coming years, owing to the expected continued growth and increasing collaborations of a significant number of Instant Noodles companies, as well as the high adoption rate as a result of government policies that promote this particular industry in the region. Countries such as India, Malaysia, Indonesia, and China, in particular, play an important role in accelerating market expansion as Instant Noodle preferences among urban consumers. The global increase in demand for Convenience Foods will have a positive correlation with the growing market size in APAC.

### Instant Noodles: Domestic (Thailand) Overview

**Figure 3.12: Instant Noodles Market Value, Thailand**

Figure 1: Share of Ready-to-eat Food Market Value in Thailand (2021)



Source: Euromonitor, Krungsri Research

#### **Source: Euromonitor and Krungsri Research**

In terms of Thailand's Instant Noodle market overview, Instant Noodles accounted for 79.1% of the total domestic Ready-to-eat Food Market, followed by Other dried ready-to-eat food (10.5%) and Ready-to-eat cereals (8.4%).

The domestic market, which increased by 6.4% annually on average between 2016 and 2021 and reached THB 20 billion in 2021, accounts for the majority of sales of local Instant Noodles companies. Furthermore, the export value of Thai Instant Noodles shows growth, with an annual 3.9% average growth in the sector's manufacturing production index (MPI). The attribution to growth was supported by the stronger year on year domestic market strength.

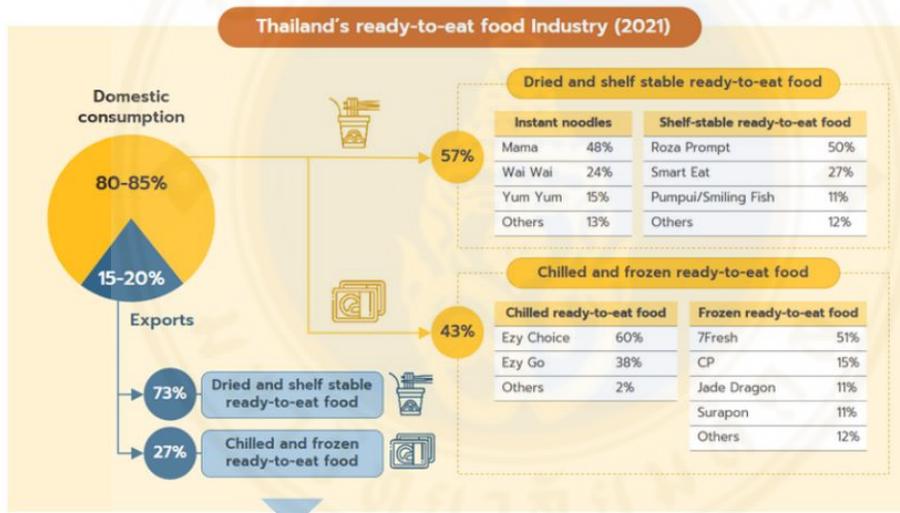
In terms of consumers, Instant Noodles are popular among consumers, and sales have increased as a result of the product's low cost. Additionally, because of the economy's gloomy outlook and weak purchasing power during the Covid-19 pandemic, consumers have been encouraged to be more frugal with their spending. Furthermore, pandemic control measures influenced consumer behavior by reducing eat-in meal options and

restaurant and canteen hours, resulting in a shift in demand for consumers to consume more Instant Noodles.

However, costs for palm oil and wheat, which are the key ingredients in wheat flour used to make Instant Noodles, have risen, putting pressure on profitability for domestic producers.

### 3.3 Competitor analysis

**Figure 3.13: Ready-to-eat Food Industry overview, Thailand**



**Source: The Office of Industrial Economics, Ministry of Commerce, Euromonitor and Krungsri Research**

#### 3.3.1 Domestic Competition - Instant Noodles Companies

The market for instant noodles in Thailand was estimated to be worth USD 20 billion in year 2021 (Krungsri Research, 2022). The market is dominated by three huge prominent brands: Mama, Waiwai, and YumYum, which are operated by Thai President Foods with a 47.6% market share, Thai Preserved Food Factory with a 23.7% market share,

and Wan Thai Foods Industry with a 15.4% market share, respectively. The combined market share of the three brands was 86.7%. Other market players include Nissin foods Thailand, which has a 0.7% market share, and Nong Shim, which has a 0.6% market share. And other brands account for the remaining 12% of the market.

Because of their large market share and widespread brand recognition, the three leading local brands benefit from economies of scale as well as advantages in terms of gaining better access to raw materials and capital. Furthermore, they are able to expand their extensive distribution networks.

However, there is insufficient financial data of the following two Instant Noodles companies: Thai Preserved Food Factory and Wan Thai Foods Industry to conduct valuation analysis for this paper; thus, to tackle better analysis, this report will be analyzing the Company (Thai President Foods) against domestic F&B companies in the same industry.

### **3.3.2 Domestic Competition - F&B Industry**

This report will compare Thai President Foods to three other leading Food, Beverage, and Tobacco companies by market capitalization. The criteria for peer company selections are set in the range of approximately THB 50 billion to THB 110 billion in market capitalization size; new companies (that do not have sufficient financial data) are also excluded.

Thus, the peer companies are as follows:

1. **Carabao Group Public Company Limited (CBG)** is the second largest company in the Food, Beverage, and Tobacco industry by market capitalization, with THB 105.0 billion as of February 19 2023. CBG and its subsidiaries produce, sell, and distribute beverages in both the domestic and international markets.

2. **Osotspa (OSP)** comes in third by market capitalization with THB 94.6 billion as of February 19 2023. OSP and its subsidiaries manufacture and distribute energy drinks and personal care products around the world.
3. **Thai Union Group Public Company Limited (TU)** and its subsidiaries produce and sell frozen, chilled, and canned seafood in Thailand and around the world, ranking fifth in terms of market capitalization with a THB 73.1 billion as of February 19 2023.



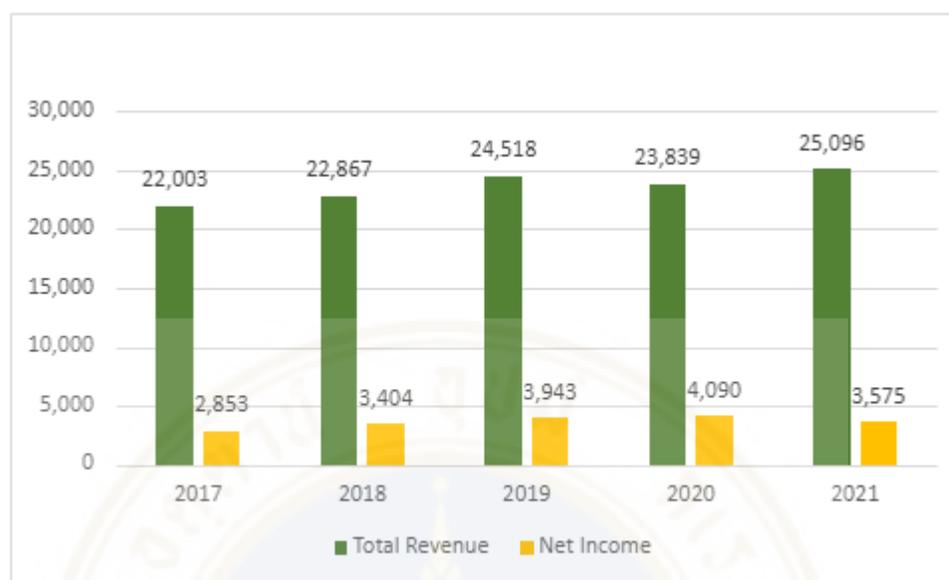
## **CHAPTER IV VALUATION**

### **4.1 Financial Analysis**

The following part of this paper moves on to describe in greater detail the financial analysis of the organization and its main competitor, Thai Union Group Public Company Limited, TU (listed in the Stock Exchange of Thailand, SET), which includes Growth Analysis and Return on Equity (ROE)

#### **4.1.1 Growth Analysis**

In this section, we investigate the growth rate of total revenues, total expenses, net income, earnings per share, and free cash flow from the last five years (2017-2021) and the first nine-month of years 2021 and 2022 of TFMAMA against TU.

**Figure 4.1: Comparison of Total Revenue and Net Income**

Source: Team Analysis

**Table 4.1: TFMAMA's Financial Summary**

	2017	2018	2019	2020	2021
<b>Total Revenue</b>	22,003	22,867	24,518	23,839	25,096
<b>Total Expense</b>	17,966	18,156	19,131	18,461	20,001
<b>Net Income</b>	2,853	3,404	3,943	4,090	3,575
<b>Earnings per Share</b>	8.65	10.33	11.96	12.41	10.84
<b>Free Cash Flow</b>	3574	4672	3580	4042	3401

Source: Team Analysis

As shown in Figure 4.1 and Table 4.1, TFMAMA's total revenue which comprises revenue from the operation, interest income, and dividend income has gradually risen from 22,003 million baht in 2017 to 25,096 million baht in 2021. Even if the total revenue has dropped a bit in 2020 from the Covid-19 impact, the company is able to boost its total revenue in the following year. On the opposite, the net income illustrated an upward trend until 2020 and decline sharply to 3,575 million baht in 2021.

**Table 4.2: Growth Analysis of 2018 to 2021**

	TFMAMA				CAGR	
	2018	2019	2020	2021	TFMAMA	TU
<b>Total Revenue</b>	3.92%	7.22%	-2.77%	5.27%	2.67%	0.45%
<b>Total Expense</b>	1.06%	5.37%	-3.50%	8.34%	2.17%	0.43%
<b>Net Income</b>	19.31%	15.82%	3.73%	-12.60%	4.61%	6.00%
<b>Earnings per Share</b>	19.37%	15.82%	3.73%	-12.60%	4.62%	5.84%
<b>Free Cash Flow</b>	30.71%	-23.36%	12.88%	-15.87%	-0.99%	-2.75%

**Source: Team Analysis**

When examining the pace of growth, TFMAMA's compound annual growth rate (CAGR) of total revenue at 2.67% is greater than its CAGR of the total expense at 2.17%. The interpretation could be over the year 2018 to 2021 the company could manage its total expense well and might enjoy with higher profit margin which will be analyzed in the next part. In Addition, TFMAMA's CAGR of net income and earnings per share are around 4.61% which is considered good. Last but not least, TFMAMA'S CAGR of free cash flow to the firm is -0.99%.

In comparison's sake, TU's CAGR of total revenue is also higher than its total expense, however, the spread between these two is much narrower than that of TFMAMA, with 0.02% for TU and 0.5% for TFMAMA. Surprisingly, TU's CAGR of net income and earnings per share is larger than TFMAMA by approximately 1.4%, meaning that these two items of TU grow faster than TFMAMA. Lastly, for the CAGR of free cash flow, TU shows a stronger decrease at -2.75% while TFMAMA indicates a decrease of just -0.99%.

**Table 4.3: Growth Analysis of 9M/2021 and 9M/2022**

	TFMAMA		TU		Growth (%)	
	9M/2021	9M/2022	9M/2021	9M/2022	TFMAMA	TU
<b>Total Revenue</b>	18,438	20,094	103,131	116,664	8.98%	13.12%
<b>Total Expense</b>	14,614	17,080	96,288	110,307	16.88%	14.56%
<b>Net Income</b>	2,707	1,955	6,083	5,900	-27.80%	-3.00%
<b>Earnings per Share</b>	8.21	5.93	1.26	1.22	-27.78%	-3.17%

**Source: Team Analysis**

Finally, we look at the recent performance of the firm and its peer compared to the same period of the prior year. For the nine-month analysis, the total expense of TFMAMA grew faster than its total revenue by two times which represents a negative signal for the company. Fortunately, there is still a positive net income for the company but the growth rate of net income and earnings per share are strongly negative at around -27.78%. And when compared with the peer, TU's growth rate of total revenue and total expense is in the same position as TFMAMA which is the total expense growth more than the total revenue by about 1.5%, much lower than TFMAMA. As a result, TU's growth rate of net income and earnings per share are in the negative number as well at around -3.00%.

#### **4.1.2 Dupont analysis of ROE**

In this section of the Dupont ROE calculation and analysis from the last five years (2017-2021) of Thai President Foods and also, it will be compared to its closest market capitalization peer: Thai Union Group Public Company Limited (TU). TU has a market capitalization of THB 73.1 billion, which is slightly higher than Thai President Foods (TFMAMA)'s market capitalization of THB 66.9 billion.

Calculation formula used:

$$\text{Dupont ROE} = \text{Net Profit Margin} \times \text{Asset Turnover} \times \text{Equity Multiplier}$$

Where:

*Net Profit Margin = Net Income / Sales*

*Asset Turnover (AT) = Sales / Average Total Assets*

*Equity Multiplier (EM) = Average Total Assets / Average Shareholders' Equity*

**Table 4.4: Dupont ROE Analysis of 5Y TFMAMA and 2021 TU**

	TFMAMA					TU
	2017	2018	2019	2020	2021	2021
Revenue (in million baht)	22,003	22,867	24,518	23,839	25,096	141,858
Net Profit Margin	13.19%	15.17%	16.43%	17.34%	14.62%	5.68%
Asset Turnover	0.74	0.73	0.70	0.63	0.60	1.08
Equity Multiplier	1.48	1.48	1.46	1.44	1.44	2.19
Dupont of ROE	14.36%	16.29%	16.88%	15.75%	12.69%	13.51%

**Source: Team Analysis**

Table 4.4 shows the decomposed variable of Dupont ROE of TFMAMA year-by-year and TU 2021. The table also displays revenue in million baht for both companies over the specified years.

For TFMAMA, during the first three years (2017-2019), the calculation result shows an increasing percentage of ROE, from 14.36% to 16.88%, before dropping to 15.75% and 12.69% in 2020 and 2021, respectively. The lower percentage of ROE in 2020 is due to a 1.74% drop in total sales, which also mirrored in TFMAMA Revenue that slipped from THB 24,518 million in 2019 to THB 23,839 billion in 2020.

Another finding from the ROE calculation is a nearly 3% drop in TFMAMA's net profit margin in 2021. Despite the fact that TFMAMA revenue increased by approximately 4% in 2021 over the previous year, its net income dropped by more than 12%, resulting in TFMAMA's overall net profit margin decreasing by nearly 3%, and thus the percentage of ROE decreasing by more than 3%.

In terms of peer comparison, TU2021's ROE is calculated to be 13.51%, which is nearly equivalent to the 5-year average of TFMAMA ROE (15.19%).

TU 2021 has a higher revenue than TFMAMA, but its Cost of sales is extremely high when compared to TFMAMA, leaving its Net profit margin at only 5.68%, which is nearly three times lower than TFMAMA's average Net profit margin over the specified five years (15.35%). However, TU 2021 has a higher asset turnover ratio than TFMAMA. This generally means that TU is more efficient in generating revenue from its assets. TU2021 has a higher Equity Multiplier, indicating that a company uses debt to finance its assets and operations more than TFMAMA. However, both companies' Equity Multipliers are considered high.

## **4.2 DCF Valuation**

### **4.2.1 Revenues Forecasts**

The revenues from the sale of TFMAMA are separated into six types, including instant noodles and semi-finished food, bakery, biscuits, fruit juice, packaging, and others, (with domestic and foreign). When looking into the sales mix of each type, It can be seen that the majority of the sales are from domestic and foreign sales of instant noodles (39.5% and 19.4% respectively in the year 2022), and domestic sales of bakeries with 28.4% in 2022. As a result, these three areas will be analyzed in great detail while the rest are forecast to be equal with the latest year which is the year 2022 in order to be conservative. Along with revenues derived from activities other than sales which are the Interest, dividend, and other income, that are projected to be the same as in the year 2022.

### 4.2.1.1 Domestic Sales of Instant Noodle and Semi-finished food

**Table 4.5: Forecast Domestic Sales of Instant Noodle and Semi-finished food**

Instant Noodles and Semi-finished Food: Domestic	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F	Average (2018-2022)	
	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F		
Size of Instant Noodle Industry (THB million)	17,080	14,836	15,669	16,223	15,720	17,106	17,258	17,488	17,650	17,807	17,914		
- Industry Growth		-13.14%	5.61%	3.54%	-3.10%	8.82%	0.89%	1.33%	0.93%	0.88%	0.61%	0.35%	
TFMAMA Instant Noodle Sales (THB million)	8,090	8,350	9,076	9,218	9,654	10,454	10,573	10,714	10,813	10,909	10,975		
- Growth		3.21%	8.69%	1.56%	4.73%	8.29%	1.14%	1.33%	0.93%	0.88%	0.61%		
Implied TFMAMA Market Share from Industry	47.37%	56.28%	57.92%	56.82%	61.41%	61.11%	61.26%	61.26%	61.26%	61.26%	61.26%		
Nominal GDP Size (THB billion)	15,489	16,373	16,892	15,654	16,180	17,080	18,000	19,454	20,545	21,646	22,439		
Nominal GDP Growth		5.71%	3.17%	-7.33%	3.36%	5.56%	5.39%	8.08%	5.61%	5.36%	3.67%	2.09%	
Real GDP Growth		4.22%	2.15%	-6.20%	1.57%	3.33%	4.29%	3.82%	3.35%	3.23%	3.06%		
												Coefficiency Rate	16.51%

**Source: Individual Analysis**

The historical nominal GDP of Thailand from the International Monetary Fund (IMF) together with the size of the instant noodle market in Thailand were applied to find the ratio between the average industry size growth and the average nominal GDP growth which is equal to 16.51% and assumed to be constant for all forecasted years. After that, with the information of forecasted nominal GDP growth and the ratio, I could calculate the forecasted size of instant noodle industry. Then I used the implied TFMAMA market share from the industry to predict the company's domestic sales of instant noodles and semi-finished food further.

### 4.2.1.2 Domestic Sales of Bakery Products

**Table 4.6: Forecast Domestic Sales of Bakery Products**

Bakery: Domestic	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F	Average (2018-2022)	
	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F		
Size of Thailand's Bakery Industry (USD million)	2,233	2,473	2,547	2,515	2,491	2,491							
Exchange Rate	32.95	32.82	30.28	30.62	33.39	36.42							
Size of Thailand's Bakery Industry (THB million)	73,592	81,151	77,122	77,011	83,159	90,716	91,172	91,860	92,341	92,802	93,120		
- Industry Growth		10.73%	2.99%	-1.25%	-0.95%	0.00%	0.50%	0.75%	0.52%	0.50%	0.34%	0.20%	
TFMAMA Bakery Sales	7,449	7,495	7,744	7,143	7,160	7,529	7,529	7,586	7,625	7,663	7,690		
- Growth		0.62%	3.32%	-7.76%	0.23%	5.15%	0.00%	0.75%	0.52%	0.50%	0.34%		
Implied TFMAMA Market Share from Industry	10.12%	9.24%	10.04%	9.28%	8.61%	8.30%	8.26%	8.26%	8.26%	8.26%	8.26%		
Nominal GDP Size (THB billion)	15,489	16,373	16,892	15,654	16,180	17,080	18,000	19,454	20,545	21,646	22,439		
Nominal GDP Growth		5.71%	3.17%	-7.33%	3.36%	5.56%	5.39%	8.08%	5.61%	5.36%	3.67%	2.09%	
Real GDP Growth		4.22%	2.15%	-6.20%	1.57%	3.33%	4.29%	3.82%	3.35%	3.23%	3.06%		
												Coefficiency Rate	9.33%

**Source: Individual Analysis**

In the Bakery section, I also use the average growth rate of the IMF's historical nominal GDP for Thailand to discover the ratio with the average growth rate of the market size of Thailand's Bakery industry. However, the size of Thailand's Bakery industry that I could trace from Euromonitor is in the unit of USD million, hence, I need to convert them into the THB first by multiplying with the average yearly exchange rate. After that I compute the ratio of average nominal GDP growth rate and average growth rate of the bakery industry, the outcome is 9.33%. Then assume that the ratio will be constant and use it to calculate the bakery market size and find the company's forecast domestic sales of the bakery by the implied TFMAMA share from the industry at the end.

#### 4.2.1.3 Foreign Sales of Instant Noodle and Semi-finished food

**Table 4.7: Forecast Foreign Sales of Instant Noodle and Semi-finished food**

Asia												
Instant Noodles and Semi-finished Food:	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F	Average
Foreign	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F	(2018-2022)
Size of Instant Noodle Industry (USD million)	81,151	85,984	88,459	98,262	104,218	106,216	113,513	120,153	126,869	133,637	140,600	
- Industry Growth		5.96%	2.88%	11.08%	6.06%	1.92%	6.87%	5.85%	5.59%	5.33%	5.21%	5.58%
TFMAMA Instant Noodle Sales (THB million)	50%	1,592	1,806	2,025	2,141	2,286	2,759	2,920	3,083	3,248	3,417	
Average Exchange Rate		33.92	32.31	31.04	31.28	31.99	33.20	33	33	33	33	
TFMAMA Instant Noodle Sales (USD million)		47	56	65	68	71	83	88	93	98	103	
- Growth		19.06%	16.78%	4.88%	4.41%	8.55%	7.14%	5.85%	5.59%	5.33%	5.21%	
Implied TFMAMA Market Share from Industry Sales		0.06%	0.06%	0.07%	0.07%	0.07%	0.07%	0.07%	0.07%	0.07%	0.07%	
Nominal GDP Size (USD billion)		23,921	25,770	26,770	27,197	31,036	33,888	36,935	39,763	42,672	45,651	48,764
Nominal GDP Growth			7.73%	3.88%	1.59%	14.12%	9.19%	8.99%	7.66%	7.32%	6.98%	6.82%
												Coefficiency Rate
												76.40%
Europe												
Instant Noodles and Semi-finished Food:	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F	Average
Foreign	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F	(2018-2022)
Size of Instant Noodle Industry (USD million)	13,836	14,571	14,305	16,225	16,853	17,072	17,798	18,395	18,928	19,447	19,931	
- Industry Growth		5.31%	-1.82%	13.42%	3.87%	1.30%	4.25%	3.36%	2.90%	2.74%	2.49%	2.17%
TFMAMA Instant Noodle Sales (THB million)	25%	796	903	1,013	1,070	1,143	1,346	1,391	1,431	1,470	1,507	
Average Exchange Rate		33.92	32.31	31.04	31.28	31.99	33.20	33	33	33	33	
TFMAMA Instant Noodle Sales (USD million)		23	28	33	34	36	41	42	43	44	45	
- Growth		19.06%	16.78%	4.88%	4.41%	8.55%	4.51%	3.36%	2.90%	2.74%	2.49%	
Implied TFMAMA Market Share from Industry Sales		0.17%	0.19%	0.23%	0.21%	0.21%	0.23%	0.23%	0.23%	0.23%	0.23%	
Nominal GDP Size (USD billion)		8,802	9,489	9,312	9,158	10,157	10,225	10,862	11,397	11,880	12,358	12,808
Nominal GDP Growth			7.81%	-1.87%	-1.66%	10.91%	0.68%	6.23%	4.92%	4.24%	4.02%	3.64%
												Coefficiency Rate
												68.25%
Instant Noodles and Semi-finished Food (THB million)												
	Weight	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F
		2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F
Asia sales	50%	1,592	1,806	2,025	2,141	2,286	2,575	2,759	2,920	3,083	3,248	3,417
Europe sales	25%	796	903	1,013	1,070	1,143	1,288	1,346	1,391	1,431	1,470	1,507
Others foreign sales	25%	796	903	1,013	1,070	1,143	1,288	1,288	1,288	1,288	1,288	1,288
Total Sales	100%	3,184	3,611	4,050	4,281	4,572	5,150	5,392	5,599	5,802	6,006	6,212

**Source: Individual Analysis**

Referring to the TFMAMA annual report 2021, the export market is mainly in Asia and Europe with proportions of 50% and 25% of total foreign sales, respectively.

While the rest 25% are from others. Therefore, I focused on these two markets and separated the foreign sales of instant noodles and semi-finished food into two parts followed by their proportion, and separately forecast the sales. For the Asia market, I gather the size of the noodle market from Euromonitor in USD and find the ratio between the average growth rate of the noodle market size and the growth rate of the historical nominal GDP of Asia of the IMF. Then use the ratio of 74.70%, with assumption that this ratio will remain the same for all forecasted years, to forecast the sales in USD and convert them back to THB.

Similarly for the Europe market, the market size of noodles in Europe has been found by Euromonitor. Then I compute the ratio between the average growth rate of the market size and the past Europe's nominal GDP from the IMF which equals 68.25% and keep this rate constant. Then again, I use this ratio to forecast the size of the instant noodles market in Europe and compute the company's sales in USD and convert them back to THB. Whereas the other sales in the instant noodles section are forecast to be the same as the year 2022. To conclude, the total foreign sales for instant noodles are calculated by summing the forecast sales from Asia, Europe, and Others.

#### 4.2.1.4 Cost of Goods Sold (COGS)

**Table 4.8: Projection of Cost of Goods Sold (COGS)**

Year	2560A 2017A	2561A 2018A	2562A 2019A	2563A 2020A	2564A 2021A	2565A 2022A	2566F 2023F	2567F 2024F	2568F 2025F	2569F 2026F	2570F 2027F	
Sales from Operation	21,631	22,437	23,999	23,580	24,457	26,482	26,843	27,247	27,590	27,927	28,225	
Cost of Goods Sold	14355	14528	15301	14850	16127	18876	18,314	18,590	18,824	19,054	19,258	
Common Size	2560A 2017A	2561A 2018A	2562A 2019A	2563A 2020A	2564A 2021A	2565A 2022A	2566F 2023F	2567F 2024F	2568F 2025F	2569F 2026F	2570F 2027F	Average 2017-2020
Sales from Operation	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	
Cost of Goods Sold	66.36%	67.16%	70.73%	68.65%	74.55%	87.26%	68.23%	68.23%	68.23%	68.23%	68.23%	68.23%

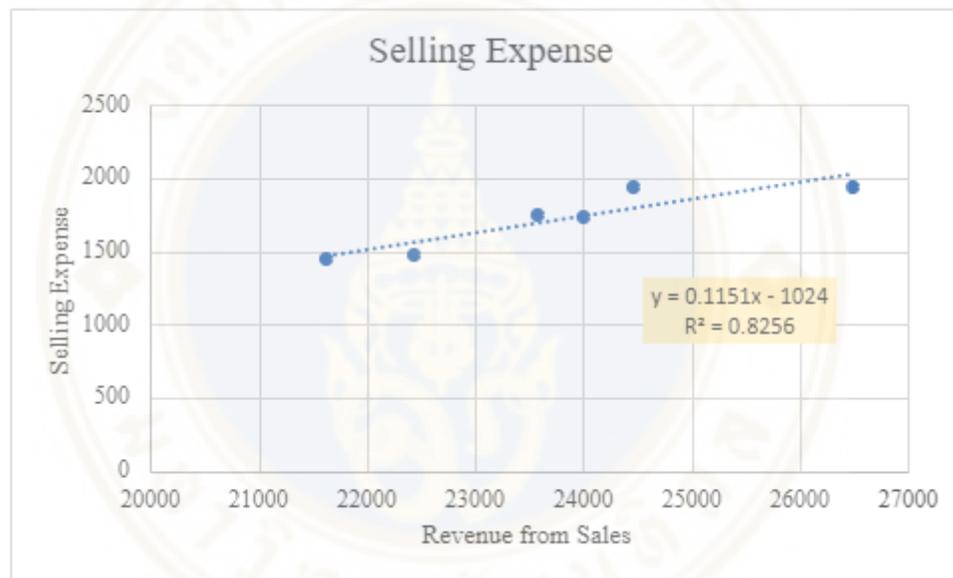
**Source: Individual Analysis**

To perform the Pro Forma Income Statement, the expense sides must be anticipated as well. Begin with the cost of goods sold (COGS), which is the direct cost of the sales that resulted from manufacturing the goods of the firm. This cost has been

estimated from the average COGS percentage of sales from 2017 to 2020 which equals 68.23%. The reason why the last two years, 2021 and 2022, are not taken into account is there was high inflation in those particular years which resulted in a dramatically higher COGS from high raw materials and lead to a higher percentage against the sales, however, the high inflation is not projected to continue in the next year and the later years.

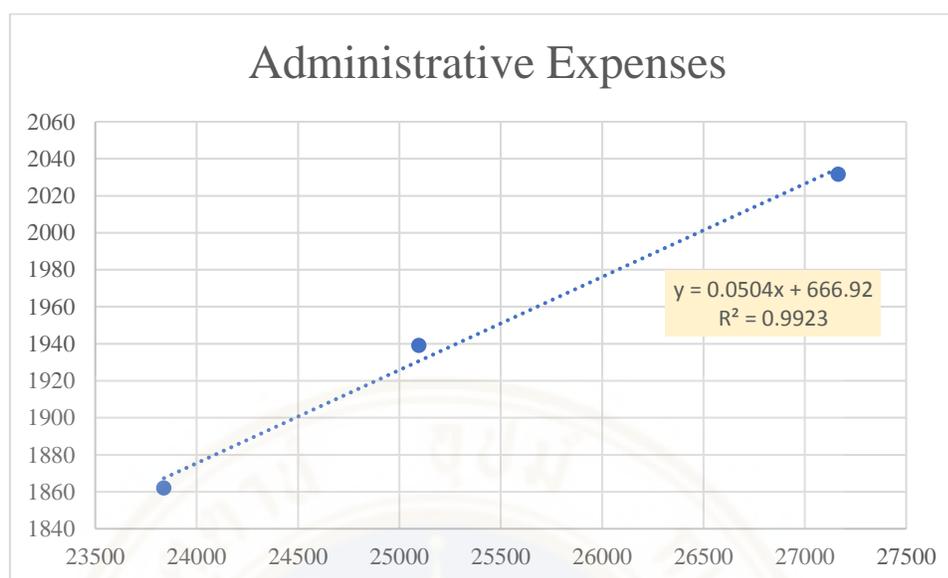
#### 4.2.1.5 Selling General and Administrative (SG&A) Expenses

**Figure 4.2: Linear regression between Selling Expenses and Revenues from Sales**



**Source: Individual Analysis**

**Figure 4.3: Linear regression between Administrative Expenses and Total Revenues**



**Source: Individual Analysis**

**Table 4.9: Projection of Selling General and Administrative (SG&A) Expenses**

Year	2560A 2017A	2561A 2018A	2562A 2019A	2563A 2020A	2564A 2021A	2565A 2022A	2566F 2023F	2567F 2024F	2568F 2025F	2569F 2026F	2570F 2027F
Total Revenues	22,006	22,867	24,518	23,839	25,096	27,165	27,526	27,931	28,273	28,611	28,909
Revenue from Sales	21,631	22,437	23,999	23,580	24,457	26,482	26,843	27,247	27,590	27,927	28,225
Selling Expense	1,444	1,474	1,734	1,749	1,935	1,934	2,066	2,112	2,152	2,190	2,225
Administrative Expenses	2,167	2,154	2,090	1,862	1,939	2,032	2,054	2,075	2,092	2,109	2,124
Selling General and Administrative Expenses	3,612	3,628	3,825	3,611	3,874	3,965	4,120	4,187	4,243	4,299	4,349

**Source: Individual Analysis**

The selling general and administrative (SG&A) expenses are divided into two parts which are selling expenses (the expenses incurred in distributing, marketing, and selling a product) and Administrative Expenses (the expenses associated with paying wages and salaries). The selling expenses were forecasted by finding the linear regression between historical selling expenses from 2017 to 2022 and Revenues from sales in the same period. On the flip side, administrative expenses were anticipated by constructing a linear regression between historical administrative expenses from 2020 to 2022 and Total Revenues for the same period as the company has changed its cost structure in 2020. Then, I sum the projection of selling and administrative expenses into SG & A Expenses.

### 4.2.1.6 Pro Forma Income Statement

**Table 4.10: Pro Forma Income Statement**

Year (THB million)	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F
	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F
Revenue From Sales	21,631	22,437	23,999	23,580	24,457	26,482	26,843	27,247	27,590	27,927	28,225
Interest And Dividend Income	213	275	351	75	411	513	513	513	513	513	513
Other Income	162	155	168	183	228	170	170	170	170	170	170
<b>Total Revenue</b>	<b>22,006</b>	<b>22,867</b>	<b>24,518</b>	<b>23,839</b>	<b>25,096</b>	<b>27,165</b>	<b>27,526</b>	<b>27,931</b>	<b>28,273</b>	<b>28,611</b>	<b>28,909</b>
Cost Of Sales	14,355	14,528	15,301	14,850	16,127	18,876	18,314	18,590	18,824	19,054	19,258
Selling And Administrative Expenses	3,612	3,628	3,825	3,611	3,874	3,965	4,120	4,187	4,243	4,299	4,349
Selling Expenses	1,444	1,474	1,734	1,749	1,935	1,934	2,066	2,112	2,152	2,190	2,225
Administrative Expenses	2,167	2,154	2,090	1,862	1,939	2,032	2,054	2,075	2,092	2,109	2,124
<b>Total Cost And Expenses</b>	<b>17,966</b>	<b>18,156</b>	<b>19,125</b>	<b>18,461</b>	<b>20,001</b>	<b>22,841</b>	<b>22,434</b>	<b>22,777</b>	<b>23,067</b>	<b>23,354</b>	<b>23,606</b>
<b>Profit Before Finance Costs and Income Tax Expense</b>	<b>4,252</b>	<b>4,945</b>	<b>5,884</b>	<b>5,705</b>	<b>5,410</b>	<b>4,588</b>	<b>5,456</b>	<b>5,517</b>	<b>5,570</b>	<b>5,621</b>	<b>5,666</b>
Finance Costs	17	13	11	3	3	4	5	5	5	5	5
Income Tax Expense	430	590	729	726	681	623	1,091	1,103	1,114	1,124	1,133
<b>Net Profit</b>	<b>2,853</b>	<b>3,404</b>	<b>3,943</b>	<b>4,090</b>	<b>3,575</b>	<b>2,786</b>	<b>3,226</b>	<b>3,266</b>	<b>3,299</b>	<b>3,332</b>	<b>3,361</b>
Basic Earnings Per Share (Baht/Share)	8.65	10.33	11.96	12.41	10.84	8.45	9.79	9.90	10.01	10.11	10.19

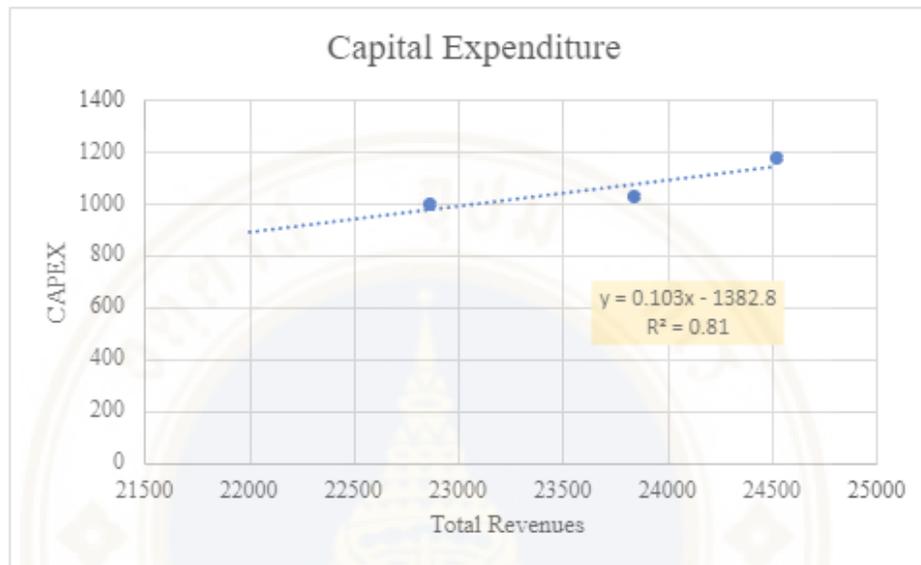
#### Source: Individual Analysis

According to Table 4.10 above, the total revenues are forecast to be 26,843 million baht in the year 2023 and continue to grow to 28,225 million baht in the year 2027. While the total costs and expenses are 22,434 and 23,606 million baht in 2023 and 2027, respectively. As a result, the profit before finance costs and income tax expenses would equal 5,456 million baht in the first forecasted year, 2023. And equal to 5,666 million baht in 2027. Moreover, the Finance cost or interest costs are projected to be 5 million baht for all forecasted years from the latest interest rate of the company. Besides, the tax expenses are calculated with a corporate tax rate of 20%. In the end, the firm's net profit is estimated to be 3,226 million baht in 2023 and increases to 3,361 million baht in 2027. With the same number of shares of 329.7 million shares, the earning per share would be 9.79 baht and 10.19 baht in the year 2023 and 2027, respectively.

## 4.2.2 Free Cash Flow to Firm (FCFF) Projection

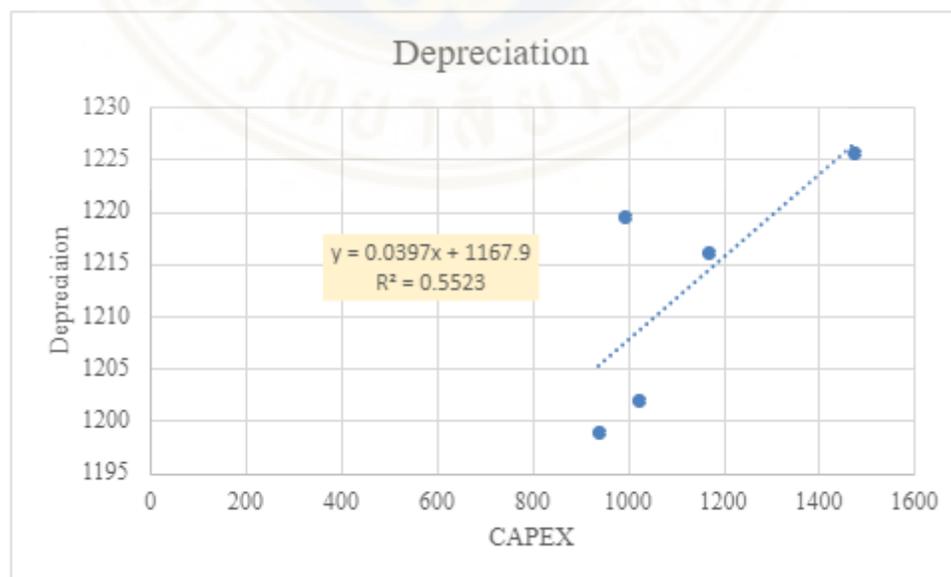
### 4.2.2.3 Capital Expenditure (CAPEX) and Depreciation

**Figure 4.4: Linear regression between Capital Expenditure and Total Revenues**



**Source: Individual Analysis**

**Figure 4.5: Linear regression between Depreciation and CAPEX**



**Source: Individual Analysis**

**Table 4.11: Projection of CAPEX and Depreciation**

Year (THB million)	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F
	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F
Total Revenue	22,006	22,867	24,518	23,839	25,096	27,165	27,526	27,931	28,273	28,611	28,909
CAPEX		993	1,172	1,026	1,475	939	1,452	1,494	1,529	1,564	1,295
Depreciation	1,168	1,220	1,216	1,202	1,226	1,199	1,226	1,227	1,229	1,230	1,230

**Source: Individual Analysis**

In terms of CAPEX, I conducted the linear regression between Capital Expenditure and Total Revenues from 2018 to 2020, with the assumption that the company tended to expand when it can generate greater sales. So, in order to follow this assumption, the latest two years (2021 and 2022) have to be excluded since the higher sales in that particular year mostly came from the higher selling price from elevated inflation. Moreover, the depreciation has been estimated from the Linear regression between Depreciation and CAPEX as these two variables have a positive relationship. If the company invests more, depreciation will follow. In addition, with the assumption that the company will be in a mature state in the last forecasted year and continue in that state forever, so I set the depreciation of the year 2027 to be equal to the previous year, 2026. While for the CAPEX in the year 2027, I assume it to be close to depreciation since the company just replace the old assets with new ones to continue operating the business, with no further investment.

#### 4.2.2.4 Change in Working Capital

**Table 4.12: Projection of Change in Working Capital**

Year (THB million)	2560A	2561A	2562A	2563A	2564A	2565A	2566F	2567F	2568F	2569F	2570F
	2017A	2018A	2019A	2020A	2021A	2022A	2023F	2024F	2025F	2026F	2027F
Account Receivable	3,626	3,694	3,636	3,238	3,649	3,924	4,001	4,062	4,113	4,163	4,207
Inventory	1,353	1,376	1,455	1,421	1,907	2,685	1,801	1,828	1,851	1,874	1,894
Account Payables	1,788	1,933	1,824	1,781	2,071	2,240	2,135	2,168	2,195	2,222	2,245
Working Capital	3,191	3,136	3,267	2,878	3,486	4,369	3,667	3,722	3,769	3,815	3,856
Working Capital Change		-55	131	-389	608	884	-702	55	47	46	41
Account Receivable Days		60	56	53	51	52	54	54	54	54	54
Inventory Days		22	22	22	25	32	24	24	24	24	24
Account Payables Days		30	29	28	29	30	29	29	29	29	29
Cash Cycle		51	49	48	47	54	50	50	50	50	50

**Source: Individual Analysis**

Moving to the Change in Working Capital, I begin by calculating the Account Receivable Days, Inventory Days, and Account Payables Days of the year 2018 through 2022. Then find the average days for each variable and compute backward from that average days to estimate the working capital of the firm. Lastly, find the difference between the working capital and the prior year to get forecasted change in working capital.

**Table 4.13: Free Cash Flow to Firm (FCFF) Projection**

<b>PERIOD</b>	<b>0</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>
<b>Year</b>	2022A	2023F	2024F	2025F	2026F	2027F
EBIT	4588	5,456	5,517	5,570	5,621	5,666
Tax	20%	623	1,091	1,103	1,114	1,133
EBIT after tax	3965	4,365	4,414	4,456	4,497	4,533
Depreciation	1199	1,226	1,227	1,229	1,230	1,230
Working Capital Change	884	-702	55	47	46	41
CAPEX	-939	-1,452	-1,494	-1,529	-1,564	-1,295
<b>Free Cash Flow to Firm</b>	<b>5,108</b>	<b>3,436</b>	<b>4,202</b>	<b>4,202</b>	<b>4,209</b>	<b>4,509</b>

**Source: Individual Analysis**

The Free Cash Flow to the Firm formula is as follows:

$$\text{FFCF} = \text{EBIT after tax} + \text{Depreciation} + \text{Change in working capital} + \text{CAPEX}$$

The FCFF is computed by the formula above. And the outcomes are 3,436 million baht in the year 2023 and sharply rise to 4,202 million baht in the following year. Then increase to 4,509 million baht in the last forecasted year, 2027.

### 4.2.3 Terminal Growth Rate

**Table 4.14: Terminal Growth Rate**

	Sales Proportion	Long-Term Growth rate
Domestic Sales	75%	1.00%
Foreign Sales	25%	7.32%
Total		2.59%

**Source: Individual Analysis**

The terminal growth rate of TFMAMA is estimated from the weighted long-term growth rate of domestic sales and foreign sales. The long-term growth rate is derived from the Compound Annual Growth Rate (CAGR) from 2017 to 2020 as the growth rate in the year 2021 to 2022 does not reflect the expanding sale, hence I did not take those into account. Besides, the sales proportion is from the year 2027, the last forecasted year as I assume this proportion will remain the same forever.

### 4.2.4 WACC

#### 4.2.4.1 Capital Structure

**Table 4.15: Capital Structure**

Share price (as of 3 Mar 2022)	202
Number of shares (Million)	329.7
Equity Value (THB million)	66,599
Net Debt (THB million)	0
Net Debt / (Equity + Net Debt)	0.00%
Equity / (Equity + Net Debt)	100.00%

**Source: Individual Analysis**

TFMAMA's Capital Structure is estimated by finding the percentage of the Equity value (that compute by utilizing the company's share price as of 3 March 2022 which is 202 baht per share multiplied by the number of shares) with the Net Debt. It can be observed from Table 4.15 above that TFMAMA finances its assets from equity only, representing 100% of equity capital and 0% of net debt capital.

#### 4.2.4.2 Cost of Equity

**Table 4.16: Cost of Equity Estimation**

Dividend Yield	2.02%
Dividend Growth Rate	6.70%
<b>Cost of Equity</b>	<b>8.72%</b>

**Source: Individual Analysis**

For the cost of equity, I decided to apply the Dividend yield plus growth method, under the reason that the company's beta is too low at 0.14 (as of 3 Mar 2023) which is not suitable to apply the CAPM approach. Thus, according to the firm's dividend yield from SET SMART at 2.02% and if its growth rate is set equal to the growth of nominal GDP at 6.70% (from Bank of Thailand), then the estimated cost of equity would be 8.72%.

#### 4.2.4.3 Cost of Debt

As TFMAMA operates debt financing for 0%, therefore the organization would incur no debt costs.

#### 4.2.4.4 Weighted Average Cost of Capital (WACC)

Weighted Average Cost of Capital (WACC) is calculated from the cost of equity and cost of debt follow by its weighted. In this case, the weighted of equity financing is 100%, hence, the WACC would equal the cost of equity at 8.72%.

#### 4.2.4.5 Terminal Value

The Terminal Value formula is as follows:

$$TV = ((FCF * (1 + g)) / WACC - g$$

Where:

TV	= Terminal Value
FCF	= Free Cash Flow to Firm for the last forecast period
g	= Terminal Growth Rate
WACC	= Weighted Average Cost of Capital

TFMAMA's FCF for the last forecasted period or in the year 2027 in this paper is 4,509 million baht whereas the terminal growth rate and the WACC are 2.59% and 8.72%, respectively. As a result, the terminal value of the firm is 75,413 million baht as shown in Table 4.17 below.

### 4.2.5 Discounted Cash Flow (DCF) Valuation Result

#### 4.2.5.1 Discounted Cash Flow Valuation

**Table 4.17: Discounted Cash Flow**

PERIOD	0	1	2	3	4	5	
Year	2022A	2023F	2024F	2025F	2026F	2027F	Terminal Value
EBIT	4588	5,456	5,517	5,570	5,621	5,666	
Tax	20%	623	1,091	1,103	1,114	1,124	1,133
EBIT after tax		3965	4,365	4,414	4,456	4,497	4,533
Depreciation		1199	1,226	1,227	1,229	1,230	1,230
Working Capital Change		884	-702	55	47	46	41
CAPEX		-939	-1,452	-1,494	-1,529	-1,564	-1,295
<b>Free Cash Flow to Firm</b>	<b>5,108</b>	<b>3,436</b>	<b>4,202</b>	<b>4,202</b>	<b>4,209</b>	<b>4,509</b>	<b>75,413</b>
Discounted Cash flow	5,108	3,160	3,555	3,270	3,012	2,968	49,648
Present Value of the Firm Value	70,722 THB million						
Net Debt	0 THB million						
Present Value of Equity Value	70,722 THB million						
Number of Shares	329.7 Million						
Estimated Share Value	214.50 THB						

**Source: Individual Analysis**

After completing FCF, WACC, and terminal growth rate, I am able to calculate the discounted cash flow and find the present value of the firm value which is 70,722 million baht. And as the company has no net debt, the present value of equity value would be the same. Then I divided by the number of shares at 329.7 million to get the estimated share value of 214.50 baht.

#### 4.2.5.2 Sensitivity Analysis

**Table 4.18: Sensitivity Analysis**

Deviation	Cost of		Terminal			
	Equity	Price (THB)	WACC	Price (THB)	Growth	Price (THB)
50%	13.08%	131.00	13.08%	131.00	3.88%	257.14
40%	12.21%	141.64	12.21%	141.64	3.62%	246.88
30%	11.34%	154.40	11.34%	154.40	3.36%	237.62
20%	10.46%	169.99	10.46%	169.99	3.10%	229.20
10%	9.59%	189.48	9.59%	189.48	2.85%	221.53
5%	9.16%	201.16	9.16%	201.16	2.72%	217.94
0%	8.72%	214.50	8.72%	214.50	2.59%	214.50
-5%	8.28%	229.89	8.28%	229.89	2.46%	211.21
-10%	7.85%	247.84	7.85%	247.84	2.33%	208.05
-20%	6.98%	294.42	6.98%	294.42	2.07%	202.09
-30%	6.10%	364.12	6.10%	364.12	1.81%	196.58
-40%	5.23%	479.79	5.23%	479.79	1.55%	191.47
-50%	4.36%	709.23	4.36%	709.23	1.29%	186.72

**Source: Individual Analysis**

The discounted cash flow approach involved various key factors to determine the target share price, thereupon, a change in these key factors would impact the target share price at the end. In order to examine that, I create the sensitivity analysis with deviation from  $\pm 5\%$  through  $\pm 50\%$  for the cost of equity, WACC, and terminal growth. It can be observed from Table 4.18 that the share price is most sensitive to the cost of equity or WACC since if the cost of equity is 1.5 times the original, the share price would decrease to 131.00 baht per share. On the other hand, if the cost of equity is 0.5 times the original, the share price would equal 709.23 per share because the spread between the cost of equity and terminal growth rate would be so small and lead to a huge amount of terminal value.

Then consequently influence the estimated share price. Apart from that, with a terminal growth rate of 3.88%, the target price would be 257.14 baht per share whereas if the terminal growth rate is 1.29%, the target price would be 186.72 baht per share.

#### 4.2.5.3 Implied WACC

**Table 4.19: Implied WACC**

<b>Stock Price (Baht)</b>	<b>Terminal Growth</b>	<b>Implied Cost of Equity</b>	<b>Implied WACC</b>
202	2.59%	9.13%	9.13%
202	0.00%	7.13%	7.13%

**Source: Individual Analysis**

With regard to the estimated share value of the firm, the Implied WACC was analyzed to determine whether the market stock price is undervalued or overvalued. In order to maintain the stock price of 202 baht per share (as of 3 Mar 2023), with the original terminal growth rate at 2.59%, the implied cost of equity and WACC is 9.13% which is greater than the estimated one at 8.72%, indicating that the company's stock price is undervalued. To examine further, I tried with the terminal growth rate at 0% and the result of the implied cost of equity and WACC is 7.13% which is lower than the required rate 8.72%. Therefore, if assuming a zero terminal growth rate, the company's stock price is overvalued, but still having an expected return of 7.13% per year for shareholders.

### 4.3 Valuation Recommendation

**Table 4.20 Possible Factors**

Possible Factors		Percentage (%)
Cost of Equity	Base case	8.72%
	Food and Beverage Sector Yield	10.20%
Terminal Growth	Base Case	2.59%
	Food Market in Thailand	5.23%

**Source: Individual Analysis**

In order to investigate the possible range of the target price, I assume the estimated cost of equity and terminal growth from the prior calculation to be the base case. Furthermore, I used Thailand's food and beverage sector yield at 3.50% to calculate the possible cost of equity and get 10.20%. Likewise, for the terminal growth rate, the expected CAGR from 2023-2027 of the food market in Thailand at 5.23% is the possible terminal growth rate (Statista, 2023).

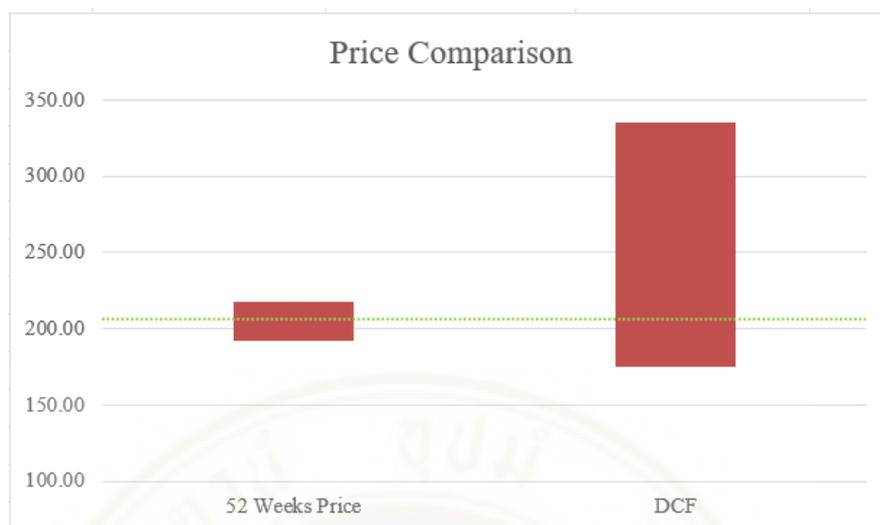
**Table 4.21: Range of Stock Price**

Cost of Equity	Terminal Growth	Stock Price (THB/Share)
8.72%	2.59%	214.50
	5.23%	335.39
10.20%	2.59%	175.42
	5.23%	240.21

**Source: Individual Analysis**

It is illustrated in Table 4.21 that the stock price of TFMAMA varies from 175.42 baht per share to 335.39 baht per share.

**Figure 4.6: Price Comparison**



**Source: Individual Analysis**

**Table 4.22: Price Comparison**

<b>Valuation</b>	<b>Lower Bound</b>	<b>Upper Bound</b>
52 Weeks Price	192.00	218.00
DCF	175.42	335.39
Target price	214.00	
Upside	6%	

**Source: Individual Analysis**

Referring to Table 4.22, the company's target price is 214 per share, showing an upside of 6% against the actual price as of 3 Mar 2023 at 202 baht per share. And to take into account the high uncertainty of all assumptions, the "HOLD" recommendation is issued because the target price does not show a difference of 20% or higher.

## **CHAPTER V INVESTMENT RISKS**

### **5.1 Risk of Price and Availability of Raw Materials**

There were issues with the supply chain last year due to the epidemic, which has not yet been fully addressed and leading to the imbalance between supply and demand that had an impact on the cost and timing for delivery. TFMAMA faced the risk of having insufficient supplies and price fluctuations of its primary raw materials, such as wheat, palm oil, and rice as well as secondary raw materials and processed agricultural goods used as additives.

Even though on 24 August 2022 the Department allow the company to increase the selling price by 1 baht per pack, it still could not compensate for all of the increase in raw material price. Nonetheless, the corporation used futures contracts to buy rice and palm oil when the prices were lower and carefully monitored the effects on the prices to reduce the risk of price fluctuations. Besides, to reduce the risk of raw material shortages and to retain the ability to bargain with suppliers, the company purchased a large number of raw materials from various distributors. (Prachachat.net, 2022)

### **5.2 Risk of Exchange Rate**

Since the firm exports its products to other countries and earned revenue in foreign currency, it is exposed to the risk of exchange rates. So far, the Firm had no foreign loan obligations and invested in foreign exchange forward contracts for the purpose of hedging exchange rate risk rather than speculation. Furthermore, the company handled foreign exchange risk by matching foreign income from exports with foreign expenditure from purchasing raw materials, machinery, and equipment from other countries.

### **5.3 Risk of Major Shareholder Holding More Than 25% of Total Shares**

On page 37 of the Thai President Public Company Limited's Annual Report 2021, it is shown that Saha Pathana Inter-Holding PCL had a total of 85,654,153 shares, or 25.98% of paid-up capital— a cross holding.

A cross holding happens when one publicly listed company holds a significant number of shares in another publicly traded company, which can result in several risk concerns such as double counting if the financial data of the two companies is not explicitly handled. As a result, as an investor, it is critical to keep up with Saha Pathana Inter-Holding PCL and the firm's news because it is a major shareholder and may have a significant impact on TFMAMA's management and performance.

### **5.4 Risk of Distribution Channel**

The Instant food product line is the largest contributor to Thai President's Sales income (approximately 40%). SPC, a local consumer goods distributor, received more than 50% of total domestic sales of instant noodles, semi-f inished foods, and biscuit product. Despite the fact that the two companies' business connections have been lengthy and steady, the risk of reliance on one big domestic distributor is obvious. Nonetheless, the Business intends to raise its exporting share and has formed a working panel to extend alternative distribution channels through subsidiaries.

The Bakery product line is the second largest contributor to Thai President's Sales revenue (approximately 30%), with 40% of total revenues supplied to CP All PLC. As a result, if the Business loses business volume with this significant distributor, its sales income would suffer. Besides the dependence risk, the Business is confident in continuing to do business with this big distributor because there is mutual benefit for both sides. Yet, given CP ALL PLC's significant contribution to Thai President distribution channels, it is vital for investors to stay up to date on both the firms' news.

## **5.5 Competition and Change in Demand Risks**

Industrial rivalry is likewise growing tougher as new technology and ideas are introduced. Technological advancements and innovations may endanger the company's operations in terms of supplies, business methods, and distribution networks. If the company does not adapt to changing technologies to efficiently operate and expand to meet consumers' emerging desires and habits, its profitability, marketing share, and, eventually, brand value may suffer. Thus, investors may need to remark on the issue and examine whether the company is keeping up with changing trends in demand to meet the needs and lifestyle of consumers of all times.



## CHAPTER VI CONCLUSIONS

### 6.1 Investment Recommendation

To conclude this paper, the Discounted Cash Flow (DCF) approach has been performed to calculate the intrinsic value of TFMAMA which is the main manufacturer of instant noodles in Thailand, to determine whether the stock price is currently overvalued or undervalued.

In the valuation analysis, I projected the top line or the company's total revenue first, from the year 2023 through 2027, with various key assumptions, mainly based on the historical nominal GDP growth and a linear regression model, in order to consequently compute the earnings before interest and tax (EBIT) and the Free Cash Flow (FCF). Apart from the FCF, other necessary variables are the WACC and Terminal growth rate. Since the company contains no net debt, its cost of equity is equal to the WACC and was computed to be 8.72% by utilizing the yield plus growth method. Moreover, the terminal growth is 2.59% which is estimated from the weighted Compound Annual Growth Rate (CAGR) from the year 2017 to 2022. The CAGR of domestic sales is 1% with 75% weight whereas the CAGR of foreign sales is 7.32% with 25% weight.

Likewise, I perform the sensitivities analysis on the cost of equity or WACC and the terminal growth rate, the result showed that the intrinsic value or the target price ranged from 131 to 709 baht per share, indicating a difference of -35% to +250% from the current stock price at 202 baht per share as of 3 Mar 2023. Besides, the implied WACC has been performed by applying the solver function in Excel with two scenarios which are terminal growth equal to 2.59% and equal to zero with the condition that the intrinsic value equal to the market price at 202 baht per share as of 3 Mar 2023. The outcomes are 9.13% and 7.13%, respectively. The interpretation is if the terminal growth is 2.59% the stock price is undervalued as implied WACC is higher than what I have estimated at 8.72%.

Whereas, if terminal growth is equal to 0%, the stock price is over value as implied WACC lower than 8.72% but the shareholders still have an expected return at 7.13%.

Thereupon, with regard to the DCF approaches, the expected stock price is 214 baht per share, demonstrating an upside of 6% against the market price at 202 baht per share (as of 3 Mar 2023), leading to the “HOLD” recommendation.

## **6.2 Triggers for Re-assessment**

As aforementioned, the DCF approach depends on various key assumptions. Thereupon, if there is any change regarding those assumptions, a reassessment of the stock's value will be required.

In this article, the cost of equity is defined by dividend yield and growth of nominal GDP. Hence, I need to re-examine the stock value when there occurs a change in the company's yield and the nominal GDP of Thailand that might change over time. And it should be noticed that TFMAMA's cost of equity is equal to its WACC as there is no net debt. Further, the terminal growth rate is determined by the CAGR of sales from 2017 through 2022, calculated from historical information. However, future analyses could consider a forward-looking way by taking into account the firm strategy and plan to expand both domestically and internationally and reassess the stock's value.

## **6.3 Limitations**

In terms of the limitation of the DCF method, it requires a large number of assumptions, making it difficult to determine the intrinsic value with high certainty. The forecast of total revenue depends on historical sales growth and projection of the nominal GDP growth rate with the assumption that TFMAMA would have the ability to maintain its market share. Besides, the cost of equity relies mostly on the nominal GDP forecasts, with a high possibility of varying due to the uncertain inflation rate. So, a change in inflation might affect free cash flow and the cost of equity. Furthermore, COGS, SG&A expenses, capital expenditure, and depreciations rely on the sales under the percentage of

sale and regression methods, when sales change, it would cause a domino effect. To conclude, in order to apply the DCF model, the essential assumptions must be closely monitored and updated throughout time.



## REFERENCES

- TFMAMA. (2022). Annual Report (2021). Retrieved from [https://www.mama.co.th/imgadmins/file\\_annual/en\\_file/EN\\_annual\\_20220324130041.pdf](https://www.mama.co.th/imgadmins/file_annual/en_file/EN_annual_20220324130041.pdf)
- Monetary policy report. (n.d.). Retrieved February 19, 2023, from <https://www.bot.or.th/English/MonetaryPolicy/MonetPolicyComittee/MPR/Pages/default.aspx>
- TFMAMA - factsheet - The Stock Exchange of Thailand. TFMAMA - Factsheet - The Stock Exchange of Thailand. (n.d.). Retrieved February 19, 2023, from <https://www.set.or.th/en/market/product/stock/quote/tfmama/factsheet>
- IMF. (n.d.). Retrieved February 19, 2023, from <https://www.imf.org/external/datamapper/PCPIPCH@WEO/WEOWORLD/THA>
- Policy interest rate. (n.d.). Retrieved February 19, 2023, from <https://www.bot.or.th/English/MonetaryPolicy/Pages/OverviewPolicyRate.aspx>
- USD THB: US dollar thai baht. Investing.com. (n.d.). Retrieved February 19, 2023, from <https://www.investing.com/currencies/usd-thb>
- Food, Beverages and Tobacco in Asia Pacific. (n.d.). Retrieved December 2022, from <https://www.euromonitor.com/food-beverages-and-tobacco-in-asia-pacific/report>
- Thai Industry: How Competitive is Thailand on the World Stage?. (n.d.). Retrieved June 28, 2021, from <https://www.krungsri.com/en/research/research-intelligence/thailand-sectoral-potential-2021>
- Instant Noodles Market Share, Size, Trends, Industry Analysis Report, By Product (Cup, Packet); By Distribution Channel; By Region; Segment Forecast, 2022-2030. (n.d.). Retrieved November 2022, from <https://www.polarismarketresearch.com/industry-analysis/instant-noodles-market#:~:text=The%20global%20instant%20noodles%20market,5.91%25%20during%20the%20forecast%20period>

## REFERENCES (Cont.)

Global Instant Noodles Market Size to hit USD 69.9 Billion By 2028 | Market Outlook by Vantage Market Research. (n.d.). Retrieved August 29, 2022, from <https://www.globenewswire.com/en/news-release/2022/08/29/2505650/0/en/Global-Instant-Noodles-Market-Size-to-hit-USD-69-9-Billion-By-2028-Market-Outlook-by-Vantage-Market-Research.html>

The global instant noodles market is projected to grow from \$54.60 billion in 2022 to \$81.84 billion by 2029, at a CAGR of 5.95% in forecast period, 2022-2029. Retrieved April 2022, from <https://www.fortunebusinessinsights.com/industry-reports/instant-noodles-market-101452>

Industry Outlook 2022-2024: Ready to Eat Food. (n.d.). Retrieved September 28, 2022, from <https://www.krungsri.com/en/research/industry/industry-outlook/food-beverage/ready-to-eat-food/io/io-ready-to-eat-food-2022-2024>