# Factors influencing Bangladeshi people to lean towards increased consumption of frozen food products

# Internship Report On "Factors influencing Bangladeshi people to lean towards increased consumption of frozen food products"



# **BRAC Business School**

# **Submitted To:**

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Date of Submission: 28th August, 2017

# **Student's Declaration**

I hereby declare that this work is my own. I have not copied from any other students' work or from any other sources except where due reference or acknowledgement are made explicitly the text, nor has any part been written for me by another person. I have followed secondary data analysis process while preparing this report and all the data are collected from reliable source.

Sincerely,

\_\_\_\_

Sirazum Munira ID: 13204025

# **Certificate of Authentication**

This is to certify that this report titled **Factors influencing Bangladeshi people to lean towards increased consumption of frozen food products** is an authentic work of Sirazum Munira who carried out the research under my supervision. It is certified further that to the best of my knowledge the work reported herein does not form part of any other project report or dissertation on the basis of which a degree or award was conferred on an earlier occasion on this or any other candidate.

This is also certified that the project report is an original work done by her and only for academic use.

I wish her success in life.

\_\_\_\_\_

Md. Fazla Mohiuddin Lecturer BRAC Business School BRAC University **Letter of Transmittal** 

28<sup>Th</sup> August, 2017

Md. Fazla Mohiuddin

**BRAC Business School** 

**BRAC** University

Dear Madam,

This is to inform you that I have completed my internship as a mendatory part of my BBA program

and this is the internship report on "Factors influencing Bangladeshi people to lean towards

increased consumption of frozen food products." I worked as a business development and branding

intern at Abdul Monem Ltd., Igloo Frozen Food Ltd.

In writing this report, I have followed the instructions that you have given me, and I have also

applied relevant concepts that I have learnt throughout my BBA program. The contents provided

in this report relevant to my topic and some information and references have been taken from my

text book and different sources to facilitate my report. I would like to admit that it was a

challenging and very interesting experience.

I humbly request you to accept this report for your kind evaluation. Finally, I would love to express

my gratitude for your supportive thoughts.

Sincerely,

Sirazum Munira

ID: 13204025

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# 1 Introduction

# 1.1 BACKGROUND

The fast-paced urban lifestyle, rising disposable income, increasing number of women in the workforce and the resultant shortage of time along with preference for nuclear families or that of young students and professionals living alone are major reasons behind growing acceptance of western food and need for 'ready to cook' or 'ready to eat' food. FMCG firms are aiming to capitalize on this trend by launching frozen or 'ready-to-cook' food or microwaveable meals, ranging from traditional food like paratha, samosa to more diverse cuisine like momo, pizza. This report contains a study on the major factors that are affecting the consumption pattern of frozen foods in Bangladesh.

# 1.2 RATIONALE OF THE STUDY

With the economic growth in Bangladesh, people are becoming equally busy. The hectic schedule leaves little time for cooking meals and snack at home. Frozen food has posed as a solution for the people who are strained trying to maintain balance between work and healthy lifestyle.

Though frozen food has been around as an alternate for quite a long time now, in Bangladesh it was not very popular until recently. People here were not accustomed or comfortable to the idea of eating frozen food. But the consumption pattern is changing rapidly. Frozen food is now a quite common eating option in urban areas. Simultaneously, the perception that frozen food is not fresh or as healthy as homemade snacks still exists.

This report is prepared to analyze the factors that are influencing consumption pattern of frozen foods in Bangladesh. As I have done my internship at Délifrost, Igloo foods Ltd., the report will be focused on Délifrost. Working with this upcoming frozen food brand has been helpful in comprehending the trend of frozen food consumption. My work experience and preparation of this report has been insightful to the frozen food industry's operations, practices and consumers' responses to those activities.

# 1.3 OBJECTIVE OF THE STUDY

The aim of the research is to find out the factors influencing Bangladeshi people to lean towards increased consumption of frozen food products.

# 1.3.1 Broad Objective:

To identify and evaluate the factors influencing the consumption of frozen food.

# 1.3.2 Specific Objectives:

- 1. To identify the factors that make customers opt for frozen food.
- 2. To identify factors that influence individual's perception towards frozen food.
- 3. To point out which factors are most valued to consumers regarding frozen food.
- **4.** To determine areas marketer should be more concerned about to increase their acceptance, image and value to customers.
- **5.** To explore strategies of market leaders in frozen food sector for capturing the market.
- **6.** To explore how a new brand (Délifrost) can position itself strongly in the consumer mind.
- 7. To know how the competitors and leaders are doing in the industry.
- **8.** To understand the market and which factors should be prioritized while launching a new brand.
- **9.** To identify reasons behind people's preference for the existing brands.
- **10.** To collect insight from the target market about existing brands and also their expectations about upcoming brands.
- 11. To find out future possibilities and invention scope in frozen food industry.

# 1.4 STATEMENT OF THE PROBLEM

The purpose of this study is to understand how consumer's perception toward frozen food is changing. Both positive and negative perceptions regarding frozen food prevail in Bangladesh. This study takes into consideration both positive and negative consumer attitude and then identifies some major factors that affect their buying decision.

Identified factors are then analyzed to comprehend which factor is more important to consumers while purchasing or eating frozen food. Recommendation is given based on this analysis as to what factors marketers should try to improve and promote.

# 1.5 LIMITATION OF THE STUDY

Though I have faced several limitations while preparing this report, I humbly tried to make this report complete and informative to reflect a clear picture of the regarding subject. The main limitations I had to address were:

1. Unwillingness of respondents to complete the survey questionnaire.

- 2. Insufficient information available on competitors which made the analysis on competitors difficult to complete.
- 3. Scarcity of necessary data on the organization end due to privacy issues. For this reason, detailed and structured information could not be extracted on core strategic implementations of the company.
- 4. Unavailable secondary data.
- 5. Constraint of time for report preparation has been a challenge.
- 6. Understanding and analysing an entire industry's growth, factors affecting the growth, consumers' dynamic behaviour pattern are vast areas that demand to take a longer period of time for the report to be thorough, which was also limited in this circumstance.

# 2 OVERVIEW OF THE FROZEN FOOD INDUSTRY

# 2.1 CATEGORY OF FROZEN FOOD PRODUCTS

Freezing is one of the oldest and most widely used methods of food preservation, which allows preservation of taste, texture, and nutritional value in foods better than any other method. Frozen food market can be categorized according to the type of product. Excluding ice cream, the classifications of frozen food are:

- 1. Frozen fruit and vegetable.
- 2. Meat based frozen food and frozen fish.
- 3. Wheat based frozen food.

# 2.1.1 Frozen fruit and vegetable:

Today in modern society, frozen fruits and vegetables constitute a large and important food group among other frozen food products (Arthey, 1993). The main advantage of freezing preservation of fruits is the extended usage of frozen fruits and vegetables during off-season. Additionally, these can be transported to remote markets that could not be accessed with fresh fruit and vegetables. Year-round further processing of fruit products is also possible such as jams, juice, and syrups from frozen whole fruit, slices, or pulps.

### 2.1.2 Frozen fish:

It is the most common form to consumers. Fish has been preserved using freezing method for a long time. Meat based frozen food products include 'ready to cook' or precooked food that is prepared by poultry, beef etc. Some examples of meat based frozen food are: sausage, meat ball, nuggets, pop chicken, chicken fries etc.

# 2.1.3 Wheat based frozen food:

These are the products of which main ingredient is wheat. This type of frozen food is currently more in demand in Bangladesh because it offers the traditional food that people here are accustomed to. Some wheat based frozen food examples are: paratha, samosa, singara, spring roll, rice flour roti, momo, pizza etc. Items like paratha, samosa, poori etc. are part of traditional snacks but because of the reduction in cooking time consumers often have to skip eating these items. Availability of items like frozen paratha is very convenient and appropriate for this subcontinent. That's why, a large portion of the total sale of frozen food (ready to cook) come from the 'wheat based frozen food' category.

In preparing this report I have considered the wheat based frozen food category as Délifrost is coming in the market primarily with wheat based frozen food.

# 2.2 COMPANY OVERVIEW

Before describing Délifrost, a short overview of the mother company Abdul Monem Ltd. is provided:

# 2.2.1 Summary of Company Profile

Name of the Company: Abdul Monem Limited (AML)

Year of Establishment: 1956

Status of the Company: Private Limited Company

Country of Registration: Registered under Registrar of joint Stock Companies, Dhaka,

Bangladesh

Number of Employee: 5000

Corporate Head Quarters: Monem Business District111, Bir Uttam C.R. Datta Road,

Sonargoan Road, Dhaka 1205.

# 2.2.2 Company's Objective

Their objective is to achieve all short & long run goals & to maintain goodwill by using resource optimally.

### 2.2.3 Business Concerns

Few of the business concerns from the expanded scope of work of Abdul Monem Ltd. are listed below:

- 1. AML Construction
- 2. AM Beverage Unit- Coca- Cola
- 3. AM Securities & Financial Services Ltd
- 4. AM Energy Ltd
- 5. Novus Pharmaceuticals Ltd
- 6. Monem Business District
- 7. Igloo Foods Ltd

- 8. Am Auto Bricks Ltd
- 9. AM Bran Oil
- 10. Service engine BPO
- 11. Am Mango Pulp Processing Unit
- 12. Igloo Ice- cream Unit
- 13. Igloo Dairy Ltd
- 14. Danish bangle Emulsion Ltd
- 15. Abdul Monem Sugar Refinery Ltd
- 16. AM Asphalt & Ready Mix Concrete Ltd
- 17. Abdul Monem Ready Mix Concrete Unit

# 2.2.4 Igloo Foods Ltd. - Nature of the Business

Igloo Foods Limited is a manufacturer and marketer of high-quality, brand name food and potato products for consumers throughout Bangladesh. The company has a strong logistical fleet and manpower to ensure the distribution of the products across the marketplace. There are regional offices, warehouses and depots at different strategic points accompanied by a large transport pool to facilitate the trade.

Igloo Foods consistently makes significant investment in marketing to support out the brands. Marketing investment enhances the consumer awareness and enhances the brand preference, leading to long term growth in volume. Igloo Foods heighten product appeal using integrated marketing programs through our relationships with distributors and retailers on a sustainable basis. Products of Igloo Foods are sold through retailers, food service and corporate clients.

# 2.2.5 Major business wings of Igloo Foods Ltd.

Igloo Foods Limited operates with three business wings: frozen food distribution, frozen food manufacturing, ethnic and snack food production.

# 2.2.6 Frozen Food Distribution

Igloo Foods Limited represents ConAgra Foods of the U.S.A for Lamb weston potato produce – French fries, potato wedges, curly fries, criss cut, hash browns, etc. and is the premier distributor of this top-quality product to the food service industry throughout Bangladesh.

# 2.2.6.1 Frozen Food Manufacturing

Igloo Foods Limited is getting engaged in the manufacture and export of frozen and processed ethnic and fast food items.

### 2.2.7 Ethnic & Snack Food Production

Igloo Foods Limited is a leading manufacturer and distributor of snack-foods, supplying branded and private label products to customers in Bangladesh and exploring export markets. The brands are FOODY and Nature Fresh.

# 2.3 OVERVIEW OF DÉLIFROST

Délifrost is the upcoming Frozen Food brand from Igloo family. Frozen food industry is growing significantly and many frozen food brands have already saturated to capitalize on the potential of this market. Délifrost is aiming to capture the untapped market as well as the established market created by its competitors. Délifrost is using the Abdul Monem's largest cold chain network to establish the brand. Marketing and communication strategic planning would be one of the main focus areas of Délifrost.



### 2.3.2 Tagline

"Home style Goodness" is the selected tagline of Délifrost. Délifrost wants to be positioned as a brand that aims to maintain the homely taste in their food while the main concern being on quality food that is hygienic and safe for consumption.

# 2.3.3 Product line of Délifrost

Délifrost is prepared to enter the market with 9 types of product and 37 SKUs:

|    | SKU MIX            |                    |                              |  |  |  |  |
|----|--------------------|--------------------|------------------------------|--|--|--|--|
| SL | Production Line    | Product            | SKU                          |  |  |  |  |
| 1  | Meat Ball, Strips, | Chicken Ball       | Chicken Ball                 |  |  |  |  |
| 1  | Pop Chicken Line   | Spicy Chicken Ball | Spicy Chicken Ball           |  |  |  |  |
| 2  | Tortilla &Chapati  | Wheat Flour        | Wheat Flour Tortilla Regular |  |  |  |  |

|    | SKU MIX                |                  |                                   |  |  |
|----|------------------------|------------------|-----------------------------------|--|--|
| SL | <b>Production Line</b> | Product          | SKU                               |  |  |
|    | Line                   | Tortilla         | Wheat Flour Tortilla Family       |  |  |
|    |                        |                  | Wheat Flour Tortilla FS           |  |  |
|    |                        | Whole Wheat      | What What Flow Tartilla Family    |  |  |
|    |                        | Tortilla         | Whole Wheat Flour Tortilla Family |  |  |
|    |                        | Corn Tortilla    | Corn Tortilla Family              |  |  |
|    |                        | Chapati          | Chapati Family                    |  |  |
|    |                        |                  | Spring Roll Vegetable Mini        |  |  |
|    |                        | Spring Roll Mini | Spring Roll Chicken Mini          |  |  |
| 3  | Spring Roll            |                  | Spring Roll Beef Mini             |  |  |
| 3  | &Samusa Line           |                  | Samusa Vegetable Mini             |  |  |
|    |                        | Samusa Mini      | Samusa Chicken Mini               |  |  |
|    |                        |                  | Samusa Beef Mini                  |  |  |
|    |                        | Singara Mini     | Singara Vegetable Mini            |  |  |
|    | Singara&Puri Line      | Singara Willi    | Singara Liver Mini                |  |  |
| 4  |                        |                  | PuriAloo                          |  |  |
|    |                        | Puri             | PuriDaal                          |  |  |
|    |                        |                  | PuriKima                          |  |  |
|    |                        |                  | ParathaLaccha                     |  |  |
| 5  | Paratha Line           | Paratha Plain    | Paratha Plain                     |  |  |
|    |                        |                  | Paratha Plain                     |  |  |
| 6  | Rice Frice Line        | Frice            | Frice 900                         |  |  |
| 0  | Kitt Friet Eine        | Titee            | Frice FS 2500                     |  |  |
|    | Chola and Pakora       | Chola            | Chickpeas Curry                   |  |  |
| 7  | Line                   | Pakora           | Pakora Red Lentil                 |  |  |
|    | Line                   | 1 akul a         | Pakora Vegetable                  |  |  |
|    |                        |                  | Momo/Dumpling Chicken             |  |  |
|    |                        |                  | Momo/Dumpling Chicken FS          |  |  |
|    | Crimping &             |                  | Momo/Dumpling Beef                |  |  |
| 8  | Dumpling Line          | Momo             | Momo/Dumpling Beef FS             |  |  |
|    | Dumping Line           |                  | Momo/Dumpling Mutton FS           |  |  |
|    |                        |                  | Momo/Dumpling Vegetable           |  |  |
|    |                        |                  | Momo/Dumpling Vegetable FS        |  |  |

|    |   | MIX |                            |  |
|----|---|-----|----------------------------|--|
| SL | <b>Production Line</b>                            | SKU |                            |  |
|    |   |     | Momo/Dumpling Chocolate    |  |
|    |   |     | Momo/Dumpling Chocolate FS |  |
| 9  | Onion Rings Line Sweet Rings Sweet Rings 30403 FS |     |                            |  |

### 2.3.4 Certification

Délifrost is committed to continuous improvement in production processes to meet internationally recognized standards. All the goods of Délifrost are halal. For assurance of quality Délifrost is authorized by Bangladesh Agriculture University, Mymensingh, as there is no system of BSTI certification for frozen products yet.

### 2.3.5 Durability

Products of Délifrost should remain edible for one year if those are kept on refrigerator. It remains fresh and usable for 2-3 hours without refrigerator.

# 2.3.6 Marketing Mix of Délifrost

Marketing mix is the combination of factors that can be altered according to marketer's need to capture and promote a brand or product's unique selling points that differentiate that product from its competitors. The marketing mix of Délifrost are given below,

- 1. **Product:** Délifrost will be introduced with 18 different frozen food products at the first phase. Délifrost is trying to differentiate its product in terms of homely taste and food safety.
- 2. Price: Because of the presence of strong competitors, setting the price can be a complicated matter for Délifrost. While choosing a pricing strategy it has to consider the standard price set by competitors, cost of production and marketing, desired profit margin etc. Pricing can also be a tool to communicate brand positioning to consumers. For this reason, Délifrost can choose to offer its product at existing standard category of pricing. Setting price too low can backfire because it can cause a negative impact on customers mind. At this stage, price of Délifrost is equal as other frozen food products available in Bangladesh. The price of Délifrost frozen foods is reasonable and

- affordable for middle class people to higher income group people. Price range is 60 tk. To 230 tk.
- **3.** Place: Délifrost is planning to launch in Dhaka and Chittagong district first. The distribution channel is not completely ready yet. But Délifrost have access to country's largest cold chain network of Igloo Ice cream.
  - i. Modern trade: Almost all the super shops in Dhaka sell ready to eat and cook foods along with their regular items. Along with the super shops Délifrost will be available in most of the moderate retail stores (High Vale Shops) which are equipped with refrigerator.
  - ii. Dealer Point: Délifrost has fifteen dealer points in Dhaka and one dealer point in Sylhet.
  - iii. Export: Délifrost is also planning to export its products to Middle East and European Region.
  - iv. Distribution channel: Before starting operation Délifrost needs to set up a distribution channel throughout the country. The existing distribution channel of Igloo ice-cream will be used for most retail and dealer outlets after moderating some other issues. Factory location of Délifrost is at 71/A-71/B, Kadamtali I/A, Shampur, Dhaka-1204. Distribution channel of Délifrost:

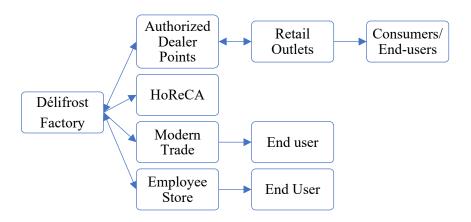


Figure: Distribution Channel

At first Délifrost Factory will mainly transfer its produced products to its dealers and distributes products to the market direct from Factory depending on distribution viability. Dealers will distribute products through Délifrost's provided Tri-Vans to the retailers and wholesalers. Then, retailers will sell products to the end users.

- 4. **Promotion:** Being a new brand, Délifrost is concerned about its promotion strategy. Instead of going for mass promotion at the beginning, Délifrost will aim its promotional activities to its target segments and broadcast on medias that are mostly used by these segments. For promotional planning and execution Délifrost will hire third party advertising and social media promotion advertising agency.
  - So far, Délifrost has taken very little initiative to promote their frozen food product. Recently for package designing and creative support Délifrost has signed the contract with Jarvis Digital Limited.

Along with these four Ps there are also some other elements of marketing mix which are followed:

- 5. **People:** Stakeholders of Délifrost are the main strength of this brand. As branding starts from home, Délifrost will start its promotion by internal branding. If the people are satisfied with it then it will be accepted by the other customers. Consumer and employee satisfaction are considered equally important.
- 6. **Process:** The process is referred to how the service is delivered. It also referred to the ability to offer a service, handle complaints, and foresee any issues before they actually happen and Délifrost aims to maintain consistency in its process.
- 7. **Physical Layout:** The physical layout of any product can affect how consumers perceive the product. To stand out in the crowd, Délifrost is focused on designing a unique packaging design and style.

# 2.3.7 SWOT analysis of Délifrost

# Strength

- Abundant Availability Of Raw Material
- Priority Sector Status For Agro-processing
- Vast Network Of Manufacturing Facilities All Over The Country
  - Vast Domestic Market

# Threat

- Affordability And Cultural Preferences Of Fresh Food
  - High Inventory Carrying Cost
    - High Taxation
    - High Packaging Cost

# Weakness

- Low Availability Of Adequate Infrastructural Facilities
- Lack Of Adequate Quality Control And Testing Methods As Per International Standards.
  - Inefficient Supply Chain Due To A Large Number Of Intermediaries
  - High Requirement Of Working Capital

# **Opporunities**

- Large Crop And Material Base
- A Vast Potential For Agro Processing
- Rising Income Level And Consumption Pattern
  - Favorable Demographic Profile

Figure: SWOT analysis

# 3 LITERATURE REVIEW

History of frozen food can be traced back to as early as 1000 BC. But Clarence Birdseye is credited with inventing in 1930 the quick-freezing method, which produces the type of frozen foods that we know today. ("History of Frozen Foods is Long and Varied", 2009).

Even though frozen foods were not particularly popular following their introduction into our domestic consumer culture, changing lifestyle, higher income and creative marketing ushered it into a new age convenience food.

Consumers often mistakenly perceive frozen food and chilled food as the same. To explain distinctly, chilled and deli products can be defined as 'ready to eat consumables stored at refrigeration temperatures (chilled at 5°C) whereas frozen items need not be ready to eat and are stored at 0° C.' However, both of the categories require that the products are of high quality and microbiologically safe at the time of consumption. ("Chilled And Deli Food Market Size | Industry Report, 2022", 2017)

The global frozen food market size exceeded USD 250 billion in 2015. Asia Pacific is expected to witness significant growth at a CAGR of 5.0% over the next eight years due to rapid expansion in fast food outlets in countries such as Bangladesh, India, Singapore, Indonesia, Malaysia and China. Growing urbanization coupled with rising disposable income are the major factors in these countries, which have augmented consumer's preference towards fast food. ("Frozen Food Market Size and Share | Industry Report, 2024", 2016)

Frozen foods industry is constantly overcoming consumers' negative perception about the health and wellness of frozen foods. The factors that consumers consider while purchasing frozen foods are: Attribute (Hygiene-Quality-Convenience), Taste, Pricing, and Availability. When placed right, these factors contribute to the growth we have been seeing in the consumption pattern of frozen food.

# 3.1 ATTRIBUTE

# 3.1.1 Hygiene and Convenience:

Busy lifestyle and growing preferences for ready to cook food due to conveniences and hygiene is expected to remain a key driving factor for the overall industry.

Besides the time saving factor, another convenience frozen food offers is 'portion-controlled packaging' to manage serving sizes so that the leftover part is not wasted and can be easily stored again. 'Single-serve pouches and re-sealable packs' make it easy for health-conscious consumers to keep track of calorie and nutritional intake. ("Frozen Food Facts | Frozen Food Foundation")

### 3.1.2 Quality:

In comparison with fresh ones in terms of shelf life, frozen meals contain maximum vitamins and minerals. Owing to the fact that, 'freezing preserves the products for extended periods without any preservatives and deters against any microbial growth that causes food spoilage. ("Frozen Food Market Size and Share | Industry Report, 2024", September 2016)

'Frozen foods have a memory for adverse experiences.' (Van Arsde W.B.). Consumers have had negative perception about frozen food lacking freshness or becoming stale over the time. But constant research and use of scientific methods to maintain the freshness throughout the shelf life is overcoming the problem regarding 'what happened to frozen foods between the time they left the plant and the time they were purchased by the consumer.'

WRRC scientists developed "time-temperature tolerance" or "T-TT" work that studied 'changes in frozen foods as they proceeded through the distribution system, determined the deviations in the system that would still allow a satisfactory consumer product, and made recommendations for improving the distribution system itself.' Findings from this study are applied to improve the 'selection, processing, and packaging of frozen foods so that they would better withstand adverse conditions in the distribution system'. They also sought ways to test the product for any possible changes and if those were 'still commercially acceptable when they reached the retail market.' ("Quality and Stability of Frozen Foods: Time-Temperature Tolerance Studies and Their Significance", 2002)

# 3.1.3 Pricing

Frozen food can be an alternative to eating out for a fraction of the cost. But value is about more than just dollars cents, it's about delivering on consumers' expectations of quality and taste at affordable prices.

Frozen foods are often lower in cost per serving and have much greater shelf life than refrigerated foods by their very nature. Frozen fruits and vegetables can also be more easily portioned and stored for later use, which reduces spoilage and food waste, further increasing consumer value. ("Frozen Food Facts | Frozen Food Foundation")

However, large unorganized industry participants, particularly in Asia such as China and South East Asian countries, face significant challenges regarding their price offerings and product quality as compared to large multinational corporations. High maintenance and logistics cost at a 'cryogenic temperature' for these foods are anticipated to pose an obstacle for the industry participants. ("Frozen Food Market Size and Share | Industry Report, 2024", 2016)

### 3.1.4 Availability

Emerging economies such as Asia, South Africa, and Brazil etc. are witnessing significant growth in demand for frozen foods. Increase in the number of supermarkets and online stores are expected to ensure the product availability in these countries. Availability of refrigeration media for commercial and industrial freezing is further expected to benefit the industry growth. Even the convenience stores at streets are now equipped to store frozen food properly. Marketers are targeting modern trade outlets for reaching to a greater portion of their selected segments.

### 3.1.5 Taste

Taste trumps even the most convenient and healthiest of meals. 'The product has to taste good.' (Sandro D'Ascanio, Heinz Canada). Otherwise, no customer will make a repeat purchase. But good taste can be tough to deliver in frozen meal. Adding to this challenge is the obstacle of a negative reputation or distrust among consumers that frozen food is not as fresh and would not taste good. But the preservation process of frozen food is proven to be effective in maintaining nutrition.

'Within three days of vegetables being pulled from the ground, 80 per cent of vitamin C is naturally lost from them and most 'fresh' food has a useful nutritional lifespan of up to five days. Freezing food stops this nutritional depletion, and improvements in fast-freezing technology have made it more appetizing, too, as the speed at which food is frozen has a direct impact on its taste.

As food freezes, moisture inside and outside it forms ice crystals. The slower something freezes, the bigger the ice crystals become — and the more damage they do to the structure of food, and therefore its flavor. (Prince R., 2015)

# 4 METHODOLOGY

To conduct this study on frozen food consumption pattern, I have mainly applied quantitative research method and qualitative method has been used for identifying triggering factors and hypotheses. The reason for using both of the method is that qualitative method helps to gather related data and the findings collected by qualitative method is further analyzed using quantitative method. In this report I have used 'survey' method to gather statistical responses and then backed up this research in more depth by multiple regression analysis.

Data for this research has been collected from all the related parties to the frozen food sector. The theoretical parts are majorly based on secondary information gathered from different scholarly journals and articles. Firsthand information has been used for the quantitative analysis and interpretation. Primary data has been gathered from target groups through a survey (online and in person) conducted mainly on metropolitan cities. Secondary data has been collected from different frozen food manufacturing organizations, company websites, personal interviews and annual reports and articles.

# 4.1 Proposed conceptual model

Insight gathered from observing the frozen food industry and people's buying and eating pattern has led to development of few factors that are believed to affect growth of frozen food consumption. To have a better understanding of the identified factors, a conclusive research has been conducted. Based on these factors I have developed a mathematical model for this research purpose. The identified variables especially needed to form the model are:

- 1. Attribute(Quality-Hygiene-Convenience)
- 2. Taste
- 3. Pricing
- 4. Availability

I have used multiple regression equation to identify and analyze the dependent and independent variables. The Multiple Regression Equation is:

$$Y = \alpha + \beta 1.X1 + \beta 2.X2 + \beta 3.X3 + \beta 4.X4$$

Here,

Y = Dependent Variable (Determining impact of the factors that influence consumption of frozen food)

 $\alpha = Constant$ 

X = Independent Variables

(X1= Attributes, X2= Product Taste, X3= Pricing, X4= Availability)

 $\beta$ 1,  $\beta$ 2,  $\beta$ 3,  $\beta$ 4 = coefficients of independent variables

# 4.2 Research Questions and Hypotheses

Considering the aim and objectives of the research and developed variables, following research questions and hypotheses have been set. Research questions have been formulated to clarify the information or answers that has to be discovered; which are as follows:

- 1. What factors influence consumers' perception towards frozen food?
- 2. Which factors are most valued to consumers regarding frozen food?
- 3. Do the identified factors influence consumption of frozen food?
- 4. Does product attribute influence consumption of frozen food?
- 5. Does product taste influence consumption of frozen food?
- 6. Does product quality influence consumption of frozen food?
- 7. Does product availability influence consumption of frozen food?

Associated with the above mentioned inquisitive statements, following hypotheses has been formulated. Here H<sub>o</sub> means null hypothesis and H<sub>1</sub> means alternative hypothesis.

This study explores the factors that influence consumers to buy frozen foods. Combining these factors in one statement, the Null Hypothesis is:

 $H_0$ : Identified factors do not influence consumption of frozen food.

And the Alternative Hypothesis is:

**H<sub>1</sub>:** Identified factors influence consumption of frozen food.

# 4.3 RESEARCH DESIGN

 "Exploratory Research Design" has been used as an initial step to find out the triggering factor. Review of related literature and interview with industry expert has helped to identify the variables or factors being analyzed in this study. 2. Exploratory research design and overall research framework then is followed by

"Conclusive Research Design". The hypotheses developed via exploratory research

have been tested statistically using Descriptive and Causal Research to meet the proper

accuracy on the study.

4.4 SAMPLING PROCESS:

The primary objective of this research is to have a general understanding of which factors

influence the growth of wheat based frozen food. A five step process is used to determine the

probabilistic sample size.

Step 1-Define the Target population: The target population is the buyer and consumer of

frozen food. For conducting the survey a Likert scale questionnaire has been used .Majority of

the respondents aged between 18 to 24 years old. The survey was conducted in March, 2017.

Step 2- Sampling frame: Most of the customers of frozen food are working women,

housewives, bachelors, students and member of the family who makes purchasing decision.

So, I have chosen to conduct the survey on people from this frame.

Step 3- Sampling technique: To confirm every respondent in the population has the equivalent

chance to be selected as a sample and to ensure population representative sample; Simple

Random Sampling (SRS) has been used as a sampling technique.

Step 4: Sample size: Total 100.

**Step 5: Execution:** Sampling has been executed by administering survey questionnaire in face-

to-face and online approach.

The structured questionnaire used to collect primary data had 'consumption' as dependent

variable. The variables were measured by five-point scale that ranged from strongly disagree

to strongly agree.

# 4.5 DATA COLLECTION

# 4.5.1 Primary source:

Major customers of frozen foods are parents and mothers. Primary data has been collected from our sample. Employees and officials in Délifrost, Igloo Foods Ltd., marketing agencies assigned by the company have also served as sources. I have also collected data from different modern trade points.

# 4.5.2 Secondary sources:

Published journals and research data on frozen food industry of Bangladesh and studies of global frozen food market, official website of Abdul Monem Ltd and market research data provided by Délifrost were secondary sources.

# 4.6 Survey Instruments

Interview technique under personal survey method has been used for collecting data. The survey has been conducted by one to one basis and asking respondents to fill up the questionnaire and by online method (Google docs). Basic information on some key factors regarding the research for better understanding of the questionnaire had been provided. (Questionnaire attached in the end).

# 4.7 DATA ANALYSIS AND INTERPRETATION

Both quantitative and qualitative analyses have been used for analyzing collected data. And the data have been organized and analyzed through (regression analysis) Microsoft Excel and SPSS software. For the analysis, mean value of the variable has been calculated and then relationship among the variables has been established through regression analysis

# 4.7.1 Competitors in the market

There are already a number of frozen food brands that came earlier in the market in Bangladesh. Some of them are well established and have potential market. Some of these are exported brands and the rest are Bangladeshi brands. So Délifrost has to compete strongly to compete with these brands. The major brands in this industry are described below:

I. Kazi Food Industries

Kazi Food Industries Limited is a recent venture of the Kazi Farms Group located in Beron,

Ashulia. Kazi Farms Limited was established in 1996 as a hatchery for imported eggs; the

following year it started its own parent farms. In 2004 production started in the grand-parent

(GP) farms which were responsible for Bangladesh's first exports of hatching eggs and day-old

chicks in 2004.

A range of frozen food products are sold under the brand name Kazi Farms Kitchen. These are

all guaranteed to not contain any antibiotic residues, as chickens are not fed any antibiotics

within 7 days of slaughter, as per international practice. The meat is also guaranteed to be

produced from chickens raised on feed not containing MBM (meat and bone meal) as per

European standards. The meat products are also guaranteed to be MSG and nitrate-free, as we

do not use any of these chemicals during food preparation. Kazi Farm Kitchen's product range

is as follows:

Chicken: Chicken Nuggets (original, spicy and for kids), Sausage (spicy and plain), Chicken

Teasers, Chicken Strips, Meatball, Drumsticks, Cutlets, Korma, Dopiaza, Burger.

**Egg**: Healthy Fresh Eggs (whole eggs).

Flour-based: Vegetable Spring Roll, Veg Samosa, Paratha, Dal Puri, Chicken Samosa, Aloo

Puri.

Price ranges from BDT 75-250/-

II. Golden Harvest

Golden Harvest is one of Bangladesh's leading business groups with diversified interests in

Food. Golden Harvest is the country's first company to develop its own Cold Chain network

in collaboration with USAID. Golden Harvest is also the Joint Venture partner of Nippon

Express, Asia's largest logistics company with network in over 480 locations worldwide. The

company sells a variety of items that include sauces, pickles, crackers, munchies, dried mango

bars and more, under the brand of Golden Harvest. The company is already catering to over

150,000 outlets around the country. Golden Harvest's product list is:

Chicken: Nuggets, Samosa, Sausage, Spring Roll, Meat Ball, Burger Patty, Wings, Pops,

Strips

Beef: Samosa, Burger Patty

Flour: Paratha, Dal Poori, Chapati

Vegetable: French Fries, AlooPuri, Spring Roll, Samosa

Fish: Fish Finger, Fish Ball

Price ranges from BDT 70-290/-

# III. Ready chef

Recently Aftab Frozen Foods has undergone rebranding strategy and changed its brand name to Ready chef. This company has been designed for collection, processing and packaging of frozen shrimp, fresh water fish and seafood products in its pant at Golondaj Road, South kattali, Halishahar, Chittagong.

This brand produces in the modern mechanized & scientific factory and has trained professionals for ensuring quality output check the product. FFL has buyers in China, Taiwan, Saudi Arabia, Kuwait, UAE, EU, USA and Canada. It also supplies Lobster and quality chilled seafood to different countries. It has wide range sources of quality products in home and abroad as per requirements of buyers.

# IV. Harvest Rich Agro Industries

Rich' is the market leader in Bangladesh for further processed meat products which dominates major market share. Harvest Rich Agro Industries Ltd further meat processing factory is the first of its kind of factory to be established in Bangladesh. Rich was awarded the Special Prize in the 'Dhaka International Trade Fair 2012' by the Honorable Commerce Minister, Govt. of the people Republic of Bangladesh Mr. G M Kader MP, for Excellent Brand Communication and Presentation'. RICH was featured in the 'Top 500 Companies of Bangladesh' published by Dun & Bradstreet Rating Agency Bangladesh.

Harverst Rich's products are:

**Chicken:** Burger, Chicken Cheese and Tomato Sausage, Jumbo nuggets, Mini Nuggets, Meat ball, Popcorn, Sandwich, Samosa, Sausage

Beef: Burger, Jumbo Nuggets, Meat ball, Samosa, Sandwich,

**Vegetable**: Aloopuri, Potato Finger, Dal Poori, French fries, Hash Browns, Paneer Samosa, Roti. Paratha, Potato Chops, Veg Samosa.

Fish: Fish Finger, Fish Ball, Jumbo Nuggets, Prawn Ball

Price ranges from BDT 55-230/-

# V. Lamisa

Saint Martin Fisheries, a unit of Saint Martin Group of companies Ltd, produces frozen snacks for the local market as well as for export under the banner of LAMISA brand. The company is marketing ready to cook frozen fish products and traditional items as well. Saint Martin

Fisheries Ltd is the largest manufacturer of frozen fish products and frozen snacks in Bangladesh. It produces frozen snacks for consumers, who prefer to lead a healthy life and are eco-conscious. Lamisa's products are as follows-

Beef: Beef Kima Chop, Beef Tikka

Chicken: Chicken Wonthon, Nuggets, Chicken Ball, Chicken Pop

Shrimp: Shrimp Wonthon, Shrimp Ball, Shrimp Mini Samosa, Shrimp Spring Roll

Flour: Dal Poori, Paratha, Roti

Vegetable: Aloo Poori, Potato Chop, Vegetable Spring Roll, Samosa, Singara,

Fish: Fish Ball, Fish Finger

Product price ranges from BDT 70-290/-

# VI. CP

CP adds value to its basic processed meat with additional process of boiling, steaming, frying, baking or grilling depending on customer's requirements. Products are then packed, frozen and distributed to retailers and wholesalers, fast food operators and modern trade, e.g., convenience stores, supermarkets and supercenters. Some of CP's cooked products are available domestically and internationally including frozen chicken carriage, seaweed-wrapped chicken, teriyaki chicken, roast duck, frozen steamed chicken breast, green curry chicken with rice, soya pork with noodles, egg tofu, meatball and sausage. CPB produces and brands its products under CP, V Pork, Kitchen Joy, Thai, Five Stars, BK, and BKP as well as private labels. Pricing for private label is agreed at time when contract is made

CPB places utmost importance to "product quality" that meets standards, serves variety needs, tasty and hygienic and most important is safe for consumption. CPB emphasizes quality of raw materials.

# 4.8 Market Share Covered by Different Brands

| SL |                    | Frozen             |               |                | Chilled              |                    |
|----|--------------------|--------------------|---------------|----------------|----------------------|--------------------|
| No | Company            | <b>Total Sales</b> | Meat<br>based | Wheat<br>Based | Packed<br>Meat Based | Marinated Products |
| 1  | Golden Harvest     | 8.71%              | 14.74%        | 22.47%         | 0.00%                | 1.01%              |
| 2  | Kazi Farms Kitchen | 10.60%             | 15.02%        | 15.94%         | 0.00%                | 10.22%             |
| 3  | PRAN Jhotpot       | 6.05%              | 10.43%        | 16.55%         | 0.00%                | 0.00%              |

| SL    |                  | Frozen             |        |        | Chi        | lled      |
|-------|------------------|--------------------|--------|--------|------------|-----------|
| No No | Company          | <b>Total Sales</b> | Meat   | Wheat  | Packed     | Marinated |
| 110   |                  | 1 otal Sales       | based  | Based  | Meat Based | Products  |
| 4     | Paragon          | 2.09%              | 4.98%  | 3.77%  | 0.00%      | 0.00%     |
| 5     | BRAC             | 2.90%              | 10.65% | 0.00%  | 0.00%      | 0.00%     |
| 6     | Aftab-Ready Chef | 3.11%              | 11.42% | 0.00%  | 0.00%      | 0.00%     |
| 7     | CP Bangladesh    | 50.01%             | 8.28%  | 0.00%  | 100.00%    | 83.22%    |
| 8     | Euro-Crown       | 0.32%              | 0.00%  | 1.63%  | 0.00%      | 0.00%     |
| 9     | Meena            | 0.14%              | 0.00%  | 0.71%  | 0.00%      | 0.00%     |
| 10    | CRB-Bellycious   | 0.32%              | 0.00%  | 1.65%  | 0.00%      | 0.00%     |
| 11    | Bombay           | 0.50%              | 0.00%  | 2.60%  | 0.00%      | 0.00%     |
| 12    | Harvest rich     | 2.33%              | 6.59%  | 2.77%% | 0.00%      | 0.00%     |
| 13    | Lamissa          | 2.28%              | 3.34%  | 7.06%  | 0.00%      | 0.00%     |
| 14    | AG Agro          | 4.565              | 5.96%  | 5.59%  | 0.00%      | 0.00%     |
| 15    | BD Foods         | 1.34%              | 0.00%  | 6.94%  | 0.00%      | 0.00%     |
| 16    | ATR              | 0.75%              | 2.76%  | 0.00%  | 0.00%      | 0.00%     |
| 17    | Essentials       | 0.41%              | 0.59%  | 1.25%  | 0.00%      | 0.00%     |
| 18    | Others           | 3.57%              | 5.24%  | 11.06% | 0.00%      | 0.00%     |
|       | Total            | 100%               | 100%   | 100%   | 100%       | 100%      |

# 4.9 CHALLENGES FROZEN FOOD INDUSTRY FACES

Being a relatively new one, frozen food industry faces some challenges in this country.

- i. Lack of proper promotion and brand awareness: Promotions such as television, radio and magazine advertising increase brand awareness. More people tend to learn about a particular company or its brands if they frequently see or hear about them. New companies particularly have to advertise to apprise consumers who they are and what they offer. This is true with local or even national companies, as brand awareness can be measured by market, regionally or nationally. It can take many months or even years for companies to build brand awareness levels that match established competitors.
- **ii. Cost of promotion:** The large investment required for mass marketing is an obstacle for new companies.
- iii. Lack of planned and organized promotional effort: To grab consumer attention, marketers need to have planned promotional strategy or else the brand would not be

able to generate desired awareness in the crowd of competitors' promotions. For example, since the launch of Pran Jhatpot, it hasn't conducted any TV commercial. An advertisement is found on YouTube which has only 248 views so far. For Délifrost, there is no plan of TVC yet. So, people hardly know about the new brands. But the other rivals have conducted various promoting measures like- TVC, On Spot Promoting. CP had a promoting campaign of 4-5 days, where it went to the super shops and offered instantly cooked frozen foods to the people by themselves. Due to the lack of proper advertising is a setback for companies as consumers may not recognize or be able to recall a new brand when shopping.

- iv. Unavailability all over the country: Frozen foods are primarily available in urban areas and that too, mostly in above average retail shops. Ready to cook product is comparatively new to Bangladesh and consumer involvement across the value chain is low. Newer brands like Délifrost, Pran Jhatpot are available only in major cities like Dhaka, Chittagong and Sylhet. Inability to expand market is hindering to earn enough profit and to compete with rivals. While other well established frozen food brands like Golden Harvest, Kazi Farms Kitchen etc. are found all over the country. So this is another challenge for new and small companies face in frozen food industry.
- v. Health Awareness: Rise in health awareness has been a global phenomenon since the last decade. More consumers have come forward to take a call on their health. As such, one of the challenges that ready to cook products bring for Bangladeshi customers is the freshness of food. Ready to cook foods are also assumed to contain chemicals and preservatives. This obstacle can be overcome by educating consumers about the benefits they may get from frozen foods.
- vi. Durability and high Price: Ready to cook frozen foods require cold storage, it remain usable only for 2-3 hours without cold storage. Inefficient supply chain management and frequent power cuts, which lead to rise in production costs, in turn translating into higher ready to cook product prices resulting in lower demand.

### 4.10 PORTER'S FIVE FORCES ANALYSIS ON FROZEN FOOD INDUSTRY

Michael Porter's five forces analysis helps to get an understanding of the competitive strength and position of an organization. Based on this concept the five forces that determine frozen food industry's competitive intensity and attractiveness are:

**Industry rivalry:** In spite of being a new industry in Bangladesh, it already has eight-ten well established frozen food brands. Rivalry among these brands is a consistent factor for larger portion of market share.

**Bargaining power of suppliers:** Suppliers have bargaining power in the sense that frozen food brands are mostly dependent upon suppliers for raw material. Only a few companies like Brac Chicken owns and manages poultry firms to meet their demand.

**Bargaining power of buyers:** Buyers can easily opt for any competing frozen food brand if they are not satisfied as the price level in this industry is fairly standard.

**Threat of new entrants:** The market of frozen food is considered lucrative to marketers because of the fact that still a large portion of the population does not consume frozen food. This untapped market holds potential for profitability. So, threat of new entrants is always present.

**Threat of substitutes**: As the market is becoming more and more saturated, threat of substitute is very high. New brands have to find unique ways to position themselves distinctively and to have a share of the consumers' mind as well as wallet. Taste and quality can work as key unique selling propositions instead of pricing strategy.

# 5 FINDINGS

# 5.1 RESULTS OF MULTIPLE REGRESSION ANALYSIS

Various explanatory variables have been combined to make the model useful so that it will reduce the uncertainty of multicollinearity as much as possible. As one of the assumptions of CLRM is that there is no multicollinearity among the repressors (explanatory variables) included in the regression model (Gujarati, 2003).

| Model | R     | R Square | Adjusted R<br>Square | Std. Error of the Estimate |
|-------|-------|----------|----------------------|----------------------------|
|       | .786ª | .618     | .602                 | .63119987                  |

a. Predictors: (Constant), Attribute, Taste, Price, Availability

Table 1: Model Summary

The results of regression analysis are presented in Table 1. According to the analysis from Table 1, we can see that the independent variables can explain 61.8% of the total variability of the dependent variable 'Y (consumption of frozen food)' as the adjusted R2 of the model is 0.602.

**ANOVA**<sup>b</sup>

| Model      | Sum of Squares | Df | Mean Square | F      | Sig.  |
|------------|----------------|----|-------------|--------|-------|
| Regression | 61.151         | 4  | 15.288      | 38.371 | .000ª |
| Residual   | 37.849         | 95 | .398        |        |       |
| Total      | 99.000         | 99 |             |        |       |

a. Predictors: (Constant), Attribute, Taste, Price, Availability

b. Dependent Variable: Consumption

Table 2: ANOVA

The ANOVA table (Table 2) dictates the significance of the mutual effect of explanatory variables in the regression model. So, we can reject the null hypothesis and accept the alternate hypothesis at no level of significance.

Coefficients<sup>a</sup>

|              | Unstandardize | d Coefficients | Standardized<br>Coefficients | t     | Sig.  |
|--------------|---------------|----------------|------------------------------|-------|-------|
| Model        | В             | Std. Error     | Beta                         |       |       |
| (Constant)   | 1.362E-16     | .063           |                              | .000  | 1.000 |
| Attribute    | .027          | .064           | .027                         | .418  | .677  |
| Taste        | .195          | .084           | .195                         | 2.321 | .022  |
| Price        | .358          | .087           | .358                         | 4.130 | .000  |
| Availability | .366          | .082           | .366                         | 4.436 | .000  |

a. Dependent Variable: Consumption

Table 3: Coefficient Table

The involvement of each independent variable requires individual coefficient ( $\beta$ ) values, which appear in the coefficient table. Coefficient table indicates the independent variables' significance for the model. The variance in the dependent variable explained by each explanatory variable is expected to be independent. So, evidence regarding the extent of multicollinearity in the regression is required.

### 5.2 Interpretation of Result

In the model summary, coefficient of determination (R2) is 61.8% which indicates that consumption will be increased if the variables poses positive reaction as well as this statement is strongly supported by the positive co-relation of the variables (R) is 0.786. And the adjusted

R2 also support the value of R2 with the percentage of 60.2%. The standard error of the estimation is insignificant in this regard.

Table 2 explains the dependability of the model as the F statistic showed very high value with no significance level.

Table 3 provides independent variables that have contribution to the dependent variable. It provides each independent variable with the level of contribution to explain dependent variable (y).

According to the unstandardized beta ( $\beta$ ) coefficient and standardized beta ( $\beta$ ) coefficient, these can be arranged according to their importance in explaining the dependent variable (Y). The impact of 'attribute' became most important as its unstandardized beta ( $\beta$ ) coefficient and standardized beta ( $\beta$ ) coefficient are 0.27 and 0.27 respectively. The next important explanatory variable is 'taste', having unstandardized beta ( $\beta$ ) coefficient of 0.195 and standardized beta ( $\beta$ ) coefficient of 0.195. The third important contribution made by 'price' because its unstandardized beta ( $\beta$ ) is 0.358 and standardized beta ( $\beta$ ) is 0.195. The last one is 'availability' as its unstandardized beta ( $\beta$ ) is 0.366 and standardized beta ( $\beta$ ) coefficient is 0.366.

### 5.3 IMPLICATIONS FOR DÉLIFROST

Product attribute, taste, price and availability are the best indicators for measuring consumption of frozen foods. These four factors affect consumption as seen from the study. Here each factor is also affected by another one. Product attribute has direct impact on the fact that consumers will choose that product or not, maintaining decent taste and product attribute affects price of the product and finally, availability of product ensures that consumers are able to purchase and consume the product if they are willing to. Therefore, there is a co-relation among consumption, product attributes, taste, price and availability. Each relationship here opens a new opportunity for marketers to grab customer's attention in the competitive market.

How Délifrost can utilize these factors to facilitate its operations is discussed below:

Exceed the average standard in the industry and offer product with superior attributes.
 Not compromising with product quality even if it costs a bit higher will eventually earn trust from consumers.

- 2. Choose and capitalize on a unique selling proposition. Délifrost as a new brand should conduct research to find out a unique proposition that other companies have not used to position them in the market. For example, Délifrost can draw on 'convenience' and deliver a clear message emphasizing on the short time to prepare a Délifrost meal.
- 3. Consistently focus on maintaining product both in terms of quality and taste. In an industry where number of substitutes is high it is important to maintain consistency. Building a reputation of consistently providing quality product will increase the Délifrost's value to customers which will impact in positive behavioral intention of customers and position Délifrost as a reliable brand on consumer minds.
- 4. Establish communication with customers to broaden the relationship and so that better understanding of customer's need and instant feedback to them will be possible. Better communication is a good indicator to consumers that their opinion matters and they feel Delighted and special. Maintaining communication can be effective for Délifrost to be Perceived as a customer oriented brand.

#### **5.4** Limitations of the Findings:

The study reflects the opinion of a small sample of the huge population. Because the bigger the sample sizes the more dependable answer can be obtained from any research. Other than this, observing and studying consumption pattern accurately demands a longer period of time over which data can be collected and then analyzed to reflect a more precise picture.

### 6 CONCLUSION

If the independent variables positively affect the dependent variable, then consumption will be positive. On the other hand, if the independent variables affect negatively, consumption will be negative. So, it can be said that in frozen food industry, companies should focus on improving their product based on consumer insight. Consequently, it means improving product attributes and taste, setting justified price, ensuring availability combined will result in increased consumption of frozen foods.

Over the past 50 years, as the amount of time people spent in meal preparation has steadily declined, frozen food has become a convenient staple, adapting its packaging and products to better accommodate new developments, such as the microwave oven. But convenience is not the only benefit frozen foods have to offer. Health conscious people have discovered the nutritional advantages of frozen vegetables and fruits to be easy-to-use key components to a healthy family menu. Frozen foods are easy to take for granted—all that clever packaging, all those choices—simply because their very existence hinges on simplicity, convenience, and ease. In Bangladesh people have started exploring different types of foods including frozen foods indicating a major qualitative change in the food habit of the people. Frozen food's main priority is to provide people with healthy, hygienic and tasty products in one. Existence of several strong brands and new ones like Délifrost with diverse product line and the convenience and variety are giving this industry extra push and giving massive opportunity to expand the perimeter.

### 7 RECOMMENDATION

After conducting this study I have noticed a few facts that can be recommended. Those are the following:

- 1. Marketers should identify which factors are most valued to consumers of frozen foods and thrive to excel on those factors.
- 2. Consistent focus should be given on product attributes as consumers consider how healthy the food they are purchasing for their families is.
- 3. Marketers should also aim to overcome the negative consumer perception of frozen food being not hygienic. Educating consumers that frozen food also can be fresh because of long shelf life can be helpful.
- 4. Convenience can be considered as the main attraction of frozen food. So, companies can capitalize on this feature.
- 5. Majority of the respondents agreed that frozen food is not widely available. Companies should ensure availability of their products at convenient places for consumers.
- 6. The healthy side of the product should be increased and detailed nutritional information should be clearly written on package for health consciousness consumers.
- 7. Improve and maintain a consistent relationship with customers, especially at retailing.
- 8. More marketing activities to improve their presence in the minds of the target market and also the potential target market.
- 9. Introducing e-commerce and home delivery services.
- 10. The price of the product can be lessened to reach lower middle class customers.

## 8 APPENDIX

The survey conducted for primary data collection for this research is presented below:

### Questionnaire

This survey is for educational purpose only. I want to analyze the current consumption of frozen foods in Bangladesh. Your cooperation is highly appreciated. Thank you.

| 1.  | Email A | Address:                                     |       |                 |        |                  |
|-----|---------|--|-------|-----------------|--------|------------------|
| 2.  | Gender  | •  |       |                 |        |                  |
|     |         | Male   |       |                 |        | Female           |
| 3.  | Age     |  |       |                 |        |                  |
|     |         | 18-24  |       |                 |        | 31-37            |
|     |         | 25-30  |       |                 |        | Above 38         |
| 4.  | Educat  | ion  |       |                 |        |                  |
|     |         | Honors                                       |       |                 |        |                  |
|     |         | Masters                                      |       |                 |        |                  |
|     |         | HSC/ A- Level                                |       |                 |        |                  |
|     |         | Others:                                      |       |                 |        |                  |
| 5.  | Marital | Status                                       |       |                 |        |                  |
|     |         | Married                                      |       |                 |        | Unmarried        |
| 6.  | Occupa  |  |       |                 |        |                  |
|     | _       |  |       |                 |        |                  |
|     |         | Private Job                                  |       | Entrepreneu     |        | □ Others         |
|     |         | Governmen                                    |       | r               |        |                  |
|     |         | t Job  |       | Student         |        |                  |
| 7.  | What is | s your monthly income (BDT)                  |       |                 |        |                  |
|     |         | Less than 10,000                             |       |                 |        | 30,001 to 45,000 |
|     |         | 10,000 to 20,000                             |       |                 |        | 45,000 and above |
|     |         | 20,001 to 30,000                             |       |                 |        |                  |
|     |         |  |       |                 |        |                  |
| 8.  |         | ften do you buy frozen snacks?               |       |                 |        |                  |
|     |         | Daily  |       |                 |        | Every Month      |
|     |         | Often  |       |                 |        | Never            |
|     |         | Once in a week                               |       |                 |        |                  |
| 0   | On wh   | at agassian da yay aansuma snaa              | Jra9  |                 |        |                  |
| 9.  |         | at occasion do you consume snac<br>Tea Break | KS:   |                 |        | Social Catherina |
|     |         |  |       |                 |        | Social Gathering |
|     |         | Hanging Out                                  |       |                 |        | Events           |
| 10  | Have v  | ou ever purchased any frozen for             | od it | ems over the 1: | ast v  | ear?             |
| 10. |         | Yes  | ou ii | ems over the n  | ast y  | cui.             |
|     |         | No   |       |                 |        |                  |
| 11  |         | ever try frozen snacks like- San             | าแรว  | Singara Roll    | Par    | ratha?           |
| 11. |         | Yes  | iusa  | , omgara, Kon   | , 1 al | atiia:           |
|     | П       | No   |       |                 |        |                  |
|     |         | Always                                       |       |                 |        |                  |
|     | _       | _  |       |                 |        |                  |
|     |         | Sometimes                                    |       |                 |        |                  |

12. Will you be interested to buy next generation products like frozen pizzas?

| No.    | Argu                                     | ıments             |              | Strongly             | Disagree     | Neutral    | Agree    | Strongly            |
|--------|--|--------------------|--------------|----------------------|--------------|------------|----------|---------------------|
| Please | e tick ( $$ ) in the app                 | ropriate box th    |              |                      | our percepti | on on each | statem   |                     |
|        | events/regular basi                      | S.                 |              |                      |              |            |          |                     |
| III    | I like to eat frozen                     | foods in           |              |                      |              |            |          |                     |
|        | (homemade ruti/Pa                        |                    |              |                      |              |            |          |                     |
| 11     | good as non-frozer                       |                    | 15           |                      |              |            |          |                     |
| II     | Frozen food produ                        |                    | ıs           |                      |              |            |          |                     |
| Ι      | Frozen food produ<br>good as fast food i |                    | ıs           |                      |              |            |          |                     |
| No.    | <u> </u>                                 | ata have testes o  |              | Strongly<br>Disagree | Disagree     | Neutral    | Agree    | Strongly<br>Agree   |
| Please | e tick (√) in the app                    | ropriate box th    |              |                      | our percepti | on on each | statem   |                     |
|        | prepared at home                         | •                  |              |                      |              |            |          |                     |
|        | nutritional value co                     |                    |              |                      |              |            |          |                     |
| III    | Frozen food produ                        | cts have a simil   | ar           |                      |              |            |          |                     |
|        | nutritional value co                     | •                  |              |                      |              |            |          |                     |
| II     | items Frozen food produ                  | cts have a highe   | er           |                      |              |            |          |                     |
| I      | Consuming frozen time compared to s      |                    |              |                      |              |            |          |                     |
| No.    | Argu                                     | iments             |              | Strongly Disagree    | Disagree     | Neutral    | Agree    | Strongly<br>Agree   |
| Please | e tick ( $$ ) in the app                 | ropriate box th    |              |                      | our percepti | on on each | ı statem |                     |
|        |  |                    |              |                      |              | _          |          |                     |
|        | □ Taste                                  | J                  |              |                      |              |            |          |                     |
|        | ☐ Availabili                             |                    |              |                      |              |            |          |                     |
|        | ☐ Low Price                              |                    |              |                      |              |            |          |                     |
|        | ☐ Trustwort                              | by                 |              |                      |              |            |          |                     |
| 14     | I. I prefer the brand                    | because of         |              |                      |              |            |          |                     |
|        | Rich                                     |                    |              |                      |              |            |          |                     |
|        | PranJhatpot                              |                    |              |                      |              |            |          |                     |
|        | Paragon                                  |                    |              |                      |              |            |          |                     |
|        | Lamisa                                   |                    |              |                      |              |            |          |                     |
|        | ziFarms Kitchen                          |                    |              |                      |              |            |          |                     |
|        | Golden Harvest                           | Freieneu           | preie        | iieu                 |              |            | P        | neterreu            |
|        |  | Least<br>Preferred | No<br>prefer |                      | Neutral      | Preferre   |          | Mostly<br>oreferred |
| 13     | B. Which Brand you                       | •                  | 1            |                      |              |            |          |                     |
|        | $\square$ No                             |                    |              |                      |              |            |          |                     |
|        | $\square$ Yes                            |                    |              |                      |              |            |          |                     |

| No. | Arguments                              | Strongly<br>Disagree | Disagree | Neutral | Agree | Strongly<br>Agree |
|-----|--|----------------------|----------|---------|-------|-------------------|
| I   | Frozen food products are too           |                      |          |         |       |                   |
|     | expensive                              |                      |          |         |       |                   |
| II  | Frozen food products are primarily for |                      |          |         |       |                   |
|     | people with Higher Income              |                      |          |         |       |                   |
| III | Prices of frozen food products are as  |                      |          |         |       |                   |
|     | much as non-frozen foods               |                      |          |         |       |                   |

| Please tick ( $$ ) in the appropriate box that represents your perception on each statement |
|---|
|---|

| No. | Arguments                             | Strongly<br>Disagree | Disagree | Neutral | Agree | Strongly<br>Agree |
|-----|---------------------------------------|----------------------|----------|---------|-------|-------------------|
| I   | Frozen food products are NOT widely   |                      |          |         |       |                   |
|     | available                             |                      |          |         |       |                   |
| II  | Frozen food products are mostly found |                      |          |         |       |                   |
|     | in superstores                        |                      |          |         |       |                   |
| III | All frozen food brands/Products are   |                      |          |         |       |                   |
|     | available in stores                   |                      |          |         |       |                   |

| Will you suggest to buy frozen foods to others? If then why? |  |  |  |  |  |
|--|--|--|--|--|--|
|  |  |  |  |  |  |
|  |  |  |  |  |  |
| Mention a frozen food item you wish existed in the market.   |  |  |  |  |  |
|  |  |  |  |  |  |

### 9 REFERENCES

AMLBD. (2017). amlbd.com. Retrieved 18 March 2017, from http://amlbd.com

Kotler, P., Armstrong, G., Y. Agnihotri, P., &UlHaque, E. (2010). *Principles of Marketing* (13th ed.). Pearson

Kotler, P., Lane Keller, K., Koshy, A., &Jha, M. (2013). *Marketing Management: A South Asian Perspective* (14th ed.). Pearson.

K. Malhotra, N., & Dash, S. (2011). *Marketing Research: An Applied Orientation* (6th ed.). Pearson.

Frozen Food Facts (2017). Frozenfoodfacts.org. Retrieved 14 March 2017, from http://www.frozenfoodfacts.org/about-frozen-foods/frozen-food-facts

Grand View Research. (2016) Frozen Food Market Report Frozen Food Market Analysis By Product (Fruits & Vegetables, Fish & Sea Food, Potato, Meat, Soup, Ready Meal) And Segment Forecast To 2024

.

Prince, R. (2015). Is frozen food actually better than fresh? Keeping ingredients on ice preserves vitamins and minerals, expert say. Daily Mail. Retrieved 14 March 2017, from http://www.dailymail.co.uk/health/

Quality and Stability of Frozen Foods Time -Temperature Tolerance Studies and Their Significance. (2016). *American Chemical Society*. Retrieved 14 March 2017, from https://www.acs.org/content/dam/acsorg/education/whatischemistry/landmarks/frozenfoods

J. Hiltz, M. (2001). *The Marketer's Handbook: A Checklist Approach* (1st ed.). Markcheck Publishing.

Dewsnap, B., & Jobber, D. (2009). *An exploratory study of sales-marketing integrative devices*. European Journal of Marketing, 43(7/8), 985–1007.

### 10 INITIAL MARKET RESEARCH

#### Launch Delifrost Ready-meal Consumption Though Brand Positioning and IMC

#### 10.1 TARGET GROUP

#### **CORE TARGET**



Mothers who have young children (preferably age 6 or more), financially sound, work and have no time to cook; and prize health and quality in food

#### PRIMARY TARGET





Family with parents who work and don't have time to cook, who prize health and quality especially in food

### SECONDARY TARGET



Young single people not living with parents or children

#### 10.2 RESEARCH METHODOLOGY



Number of Respondents: 32



Location: Urban & Peri Urban



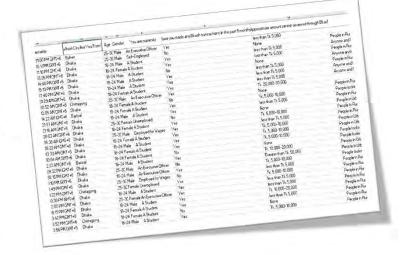
Data Collection Method: One to One



Number of Questions: 19



Per Survey Duration: 8-10 Minutes

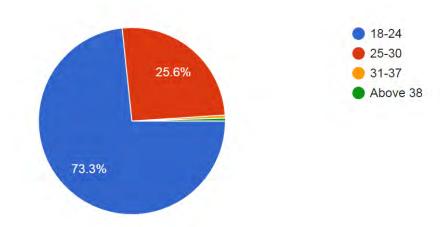


### 10.3 FINDINGS

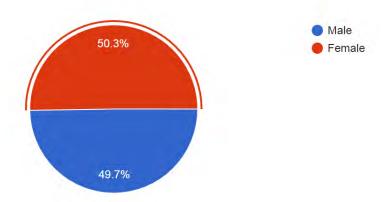
### Market Survey:

## Age

195 responses

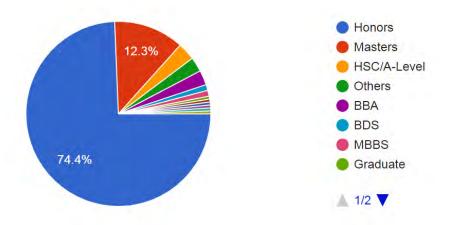


## Gender

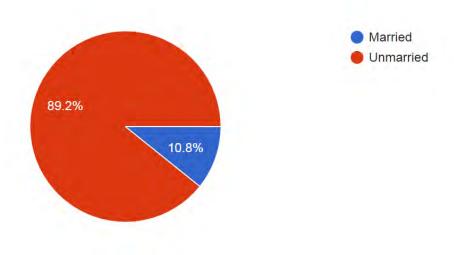


## Education

195 responses

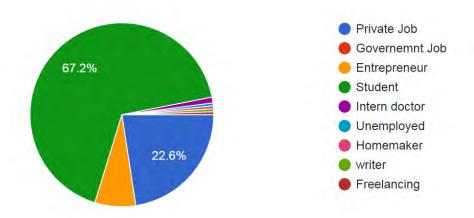


## **Marital Status**

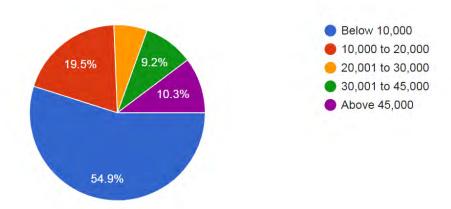


## Occupation

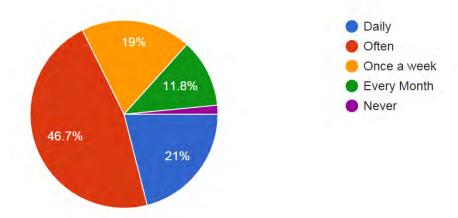
195 responses



## What is your monthly income (BDT)

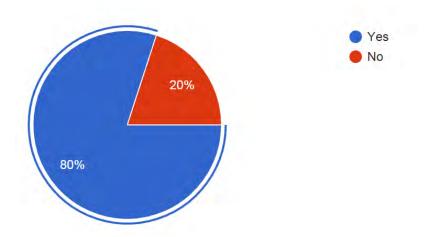


# How often do you buy snacks?



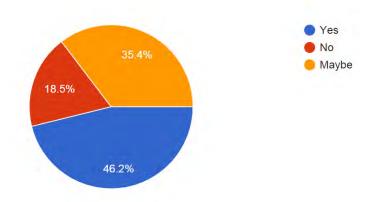
## Have you purchased any frozen food items over the last year?

195 responses

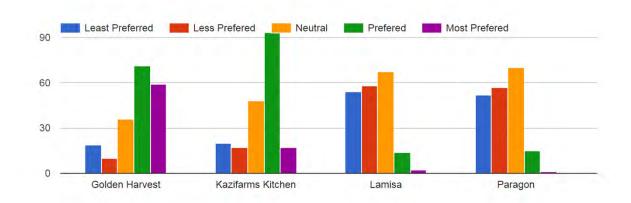


## Will you be interested to buy new generation products like frozen pizzas?

195 responses



## Which Frozen food brand do you prefer?



## I prefer this brand because of

