# **Czech University of Life Sciences Prague**

Faculty of Economics and Management



# DIPLOMA THESIS

# Feasibility Study of Pralinkárna

(small chocolate manufacturer)

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## CZECH UNIVERSITY OF LIFE SCIENCES PRAGUE

Faculty of Economics and Management

# DIPLOMA THESIS ASSIGNMENT

Eliška Němcová

**Economics and Management** 

Thesis title

Feasibility study of Pralinkárna (Small Chocolate Manufacture)

#### **Objectives of thesis**

- 1. Characterize the business plan and its steps
- 2. Evaluate the market and conduct financial analysis
- 3. Evaluate feasibility of reviewed business activity

#### Methodology

- 1. Literature survey induction, deduction and extraction
- 2. Collecting data from the questionnaire
- 3. Conducting of structured interviews with professionals from the analyzed area
- 4. Marketing analysis S.W.O.T. , PEST analysis, Porter analysis
- 5. Financial analysis of the company return of investment, break-even-point.

#### The proposed extent of the thesis

60 pages

Keywords

Business plan, chocolate, marketing mix, financial analysis, investment, market analysis

#### **Recommended information sources**

- BENNETT, Braun. The Business Plan: Work Book (online). 3. Lulu.com, 2005 (cit. 2015-11-26). ISBN 1+4116-6527-9.
- GREWELING, Peter P a Ben FINK. Chocolates and confections: formula, theory, and technique for the artisan confectioner. 2nd ed. New York: John Wiley & Sons, c2013, ix, 534 p. ISBN 9780470424414.
- PINSON, Linda. Anatomy of a business plan: a step-by-step guide to building a business and securing your company's future. 6th ed. Chicago, IL: Dearborn Trade Publishing, c2005, x, 292 p

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### **Declaration**

This thesis is a presentation of my original research work. Wherever contributions of others are involved, every effort is made to indicate this clearly, with due reference to the literature, and acknowledgement of collaborative research and discussions.

Prague, Czech Republic; March 31<sup>st</sup>, 2016

# Acknowledgement

I would like express my gratitude to Ing. Petru Procházkovi for his advice and support during my work on this thesis; and to all others who lent their helping hand.

#### Feasibility study of Pralinkárna (Small chocolate manufacturer)

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#### Realizovatelnost projektu Pralinkárna (Malá čokoládovna)

#### Summary

The subject of this business plan is the establishment of an enterprise that is engaged in the manufacturing of chocolate products. The structure of the business plan has been adapted to meet the needs of this project. Part of the business plan is also a questionnaire that the author of this work carried out on the promotion of the company. The results were analyzed and used to create the market and SWOT analysis. The financial plan is a core part of this thesis; it provides a summary of the expected costs and benefits and also the sources of funding. The financial analysis was carried out from the basic financial statement overview as well as from the financial ratios; the break-even point was also determined. This thesis also describes the estimated situation of the company during the next five years. Risk analysis focuses on factors that can endanger the manufacturing of chocolate products. This thesis concludes with the answer of the profitability of this business plan.

#### Souhrn

Již z názvu diplomové práce je patrné, že se autor zabývá tvorbou podnikatelského plánu, který bude složit k reálnému projektu. Předmětem tohoto podnikatelského plánu je založení fyzické osoby, která podniká v oblasti výroba čokoládových výrobků. Struktura podnikatelského plánu byla uzpůsobena podle potřeb pro tento projekt. Součástí podnikatelského plánu je také dotazník, který autor této práce provedl na své propagační akci. Výsledky byly analyzovány a slouží jako základní data pro vytvoření marketingové analýzy a SWOT analýzy. Nedílnou součástí je finanční plán zahrnující přehled předpokládaných nákladů a výnosů a také zdrojů financování podniku. Z údajů základních účetních výkazů a ukazatelů je provedena finanční analýza a stanoven bod zvratu. V dlouhodobém výhledu je nastíněna předpokládaná situace podniku

v období příštích 5 let. Faktory, které mohou podnikatelskou činnost ohrožovat, zkoumá analýza rizik. Závěr pak zodpovídá otázku, zda je vhodné zamýšlený plán uskutečnit či nikoliv.

**Key words:** Business plan, chocolate, financial analysis, marketing mix, competition, truffles, risk analysis, future development, survey

**Klíčová slova**: Business plán, čokoláda, finanční analýza, marketingový mix, konkurence, pralinky, analýza rizik, budoucí vývoj, výzkum

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# List of abbreviations

B2B	Business to business
B2C	Business to customer
BEP	Break-even point
CEC	Caution exchange capacity
CR	Current ratio
CZK	Czech crown
FC	Fixed costs
GDP	Gross domestic product
NWC	Net working capital
PCS	Pieces
QR	Quick ratio
ROA	Return of Assets
ROE	Return on Equity
ROS	Return on Sales
USD	United States Dollar

## **1** Introduction

Nowadays the market is oversaturated, particularly in the food industry. Thus, a question arises: Is it wise to enter the market with a new business plan in this area? It can be, because if you make your business plan made with love and care will have a great chance to succeed on the market and have a wide range of customers.

What is clear, however, even such a business plan filled with love and care needs to be a realistic business plan. It does not matter if the intention is coming from entrepreneurs or if it is a potential million-dollar business. Anyone who enters the market needs a clear vision of the business, must be familiar with all the risks and should also have an idea about the financial planning. A business plan helps address all of these issues.

Regardless of how good the business idea could be, without a business plan it will be over before it even began. Properly prepared business plans give specific information about the current market situation, competitors, suppliers, financing and can predict how the business will evolve in the future.

The author will move on to finish her college education and then continue to work on the success of her company. It has been considered to go into the truffle business for some time, and now the author thinks that this is the right time to start up the plans and go into business.

## 2 Thesis Objectives and Methodology

#### 2.1 Main Objective

The aim of this thesis is to create a business plan that serves as a real background for practical use. Based on results obtained from different parts of the business plan, it will be possible to assess whether the intended project is viable or not.

#### **Partial aims:**

For the theoretical part:

1. Product specification

This part is focused on definitions, chocolate manufacturing and processing.

2. Description of the business plan

This section describes the parts of a business plan.

For the practical part:

1. Analysis of the business environment

To fulfil this objective, an analysis of the fundamental determinants that have an impact on the realization of the company was made. Surveys provided information on who can form the target of the company and how the competition could affect the operation of the company.

#### 2. Compilation of market analysis

The next step, which is a fundamental part of the business plan, is to construct a solid market analysis. The success of the company depends on: high-quality range, reasonable prices, wellchosen promotions and distribution.

#### 3. Creating a financial plan

The phase of financial planning is based on the opening balance sheet and income statement.

4. Execution of an analysis

In this part, the financial situation of the company is analyzed and leads us to the break-even point. Based on information gathered, this will be an overall evaluation.

#### 2.2 Methodology

This thesis is divided in two parts. The first part deals with the theoretical knowledge from the literature on which the business plan is built. It contains the history of cocoa and the basic concepts that explain the process of chocolate manufacturing. Furthermore, the first part of the basic information lists its characteristics, properties and structure.

The fundamental premise for the practical part is to obtain information from a sample of our target. This sample consisted of surveying potential customers, approximately 300 people. The survey was executed face-to-face, within promotions of the project on November, 2015. The questionnaire included items that gathered basic information (age, gender, salary, profession) from our potential customers; and items that collected practical questions, the perception of the product, price range and distribution.

In the practical part, an evaluation of the current situation was made using the **PEST analysis**. The key factors that are considered are: political and legal, economic, socio-cultural and technological. The aim of the macro environment analysis is to choose only those that are important for the company. (Sedláčková, 2006)

The **Marketing mix** is a set of tactical marketing tools that companies use to adjust bids based on targeted markets. It includes everything that can be done to affect the demand of their product. This includes: strategies, product, price, and distribution and communication policy.

*Product* does not limit to the actual products or services that the company offers to the market, it also includes: quality, design, packaging, brand, guarantees, and other factors that determine how the product will satisfy the customer's expectations. *Price* is the value expressed in money, for which the product is sold; it also includes discounts, terms and conditions of payment, refunds or credit options. *Promotion* is the way consumers get to know about the product. It includes activities that communicate the advantages of the product and try to persuade the customer to buy it. *Distribution* includes the activities of the company that makes the product available to customers, to mention some: distribution channels, availability of distribution networks, sales assortment, supply and transportation. (Kotler, 2007)

The **SWOT analysis** is a tool used to evaluate factors influencing the status of the company. It identifies strengths and weaknesses and compares them with influences around the company, i.e. the opportunities and threats associated with the business plan. The analysis of strengths and weaknesses focuses on internal business environment and internal factors of business. In contrast, the assessment of the opportunities and threats focuses on external business environment, which may not be controlled as well. (Blažková, 2007)

The view of the property and financial structure of the company provide the company's **balance sheet**. It is necessary to notify the company about all your assets and the sources from where they are financed. It must be drowned up by a certain date and paid to create a balanced equation of assets and liabilities. Based on timing we have: the opening balance sheet, compiled on the date of incorporation; the final balance sheet, compiled on the day of the accounting period; and the extraordinary balance sheet, compiled irregularly. Assets on the balance sheet can be distinguished on receivables for subscribed capital, fixed assets, current assets and accruals. The financial structure is accounted for on the liabilities side of the balance sheet. It contains sources of financing for company assets; it consists of equity, liabilities and accruals. (Knápková, Pavelkova, 2010)

**Profit and loss statement AKA income statement** this is a summary of revenues and expenses of the company during the period. It provides important information on the outcome of the business. It includes revenues from whom are deducted various items, e.g. operational costs, interest costs, taxes and one-time or irregular expenses, resulting in a net gain. Profit is determined by three aspects: operating, financial and extraordinary. (Gladiš 2005)

**Cash flow** is the essential element of the financial analysis. The essence of monitoring the cash flow is to forecast the company's balance. It explains the fluctuations of cash and the reasons why they occurred. For most businesses, cash and a high bank account balance are often more important than profit. Failure to achieve the desired profits may not immediately threaten them, lack of money, which is needed for everyday operations, will have a significant impact on its existence. Cash flow is considered a significant indicator of success of the company. (Knápková, Pavelková, 2010)

Knápková and Pavelková (2011) show the schematic process for calculating cash flow:

#### **Profit for the period**

- + Depreciation
- + Formation (decrease) in long-term reserves
- + Increase (decrease) in liabilities
- + Increase (decrease) of receivables
- + Increase (decrease) in inventories

### = CASH FLOW FROM OPERATING ACTIVITIES

- Expenditure relating to the acquisition of fixed assets
- + Income from sale of fixed assets

#### = CASH FLOW FROM INVESTING ACTIVITIES

- + Long-term liabilities
- + Impacts of changes in equity

#### CASH FLOW FROM FINANCING ACTIVITIES

#### **Closing balance of cash**

The financial analysis is necessary in order to make any economic decisions. The results are based on the management of property and the financial structure. To calculate the financial analysis, the author has chosen the calculation of financial ratios (activity, profitability, etc.) and the break-even point. (TOMŠÍK, 2015)

The profitability analysis indicates the effectiveness of the invested capital. The higher the values, the better the company manages its assets and capital.

These are the most common performance indicators:

- Return on assets (ROA) (Formula No. 01) (return on total assets) = (net profit / total assets) x 100
- **Return on equity (ROE)** (Formula No. 02) (return on equity) = (net income / equity) x 100
- Return on sales (ROS) (Formula No. 03) (return on sales) = (net income before interest and taxes / sales) x 100

Activity ratios are used to measure the ability of the company to convert different accounts into sales or cash. These ratios can also indicate if the company has invested in excessively in inventories.

- Total assets turnover (Formula No. 04) turnover of total assets = sales / total assets
- **Turnover of fixed assets** (*Formula No. 05*) turnover of fixed assets = 360 x (total assets / sales) [in days]
- **Turnover of current assets** (*Formula No. 06*) turnover of current assets = sales / current assets

Liquidity is perceived as ability of a firm to convert its assets into cash funds.

- **Current ratio** (*Formula No. 07*) current ratio = current assets / current liabilities
- Quick ratio (Formula No. 08) quick ratio = (current assets – inventory) / current liabilities
- Cash ratio (Formula No. 09)

cash ratio = cash / current liabilities

- Net working capital (Formula No. 10) net working capital = current assets - current liabilities = (receivables + inventories + financial assets) - current liabilities
- The share of working capital (*Formula No. 11*) The share of working capital = net working capital / total assets

**The break-even point** is the level of sales on which the revenue (sales) equals the expenses (costs) and therefore the net income is zero. At this point the business, product, or project, becomes financially viable. Given this project is more customers (B2B and B2C) is calculated break-even point for multiproduct. (TOMŠÍK, 2015)

FC

(Formula No. 12)

BEP = Contribution margin per batch Where,

BEP - breakeven point

FC - fixed costs

Contribution margin = sales - variable costs

Contribution margin per batch = (contribution margin) (sales mix)

Sales mix = Proportion of total sales that each product generates, and needs to be appropriately balanced to achieve the maximum amount of profit.

### **3** Literature Review

This section is divided in two parts. The first part describes the raw ingredients of the product. The second part identifies the basic issues of the business plan.

#### **3.1** History of cocoa beans

Chocolate is made out of cocoa, sugar, milk and other components; the most important ingredient is cocoa. *Theobroma* is the Latin name for cocoa and it means "food of the gods". This name is connected with many rituals from the past, when Mayans and Aztecs used this raw material in wedding ceremonies and other similar cultural ceremonies. During this time, cocoa beans were used like money during wars. However, cocoa beans popularity arose until the 16<sup>th</sup> century.

The first person who brought cocoa to Europe was Christopher Columbus. He tried to link cocoa with medicine, but he did not succeed. Twenty years later, Hernan Cortes drank cocoa with Aztec emperor Moctezuma, and brought it back to the Spanish court. Even then, it was unlikely that anyone envisaged the great importance that it would become as a world commodity.

During the 17th century, Spain lost the monopoly on the European chocolate market. The brown beans had gained widespread popularity in France. It was praised as a delicious, health-giving food enjoyed by the wealthy. Next, it expanded to England, where one businessman started to open "chocolate houses". After the 18th century, chocolate was expanded to other countries in Europe. Every developed country started to plant cocoa beans in Central America or Africa. (World Cocoa Foundation, 2015)

In this time, Spain started to plant cocoa beans in Ecuador. Later, followed by France, planting in Dominican Republic, Brazil, St. Lucia, and Grenada took place. The next country to follow this trend was England, they had cacao growing in Jamaica and the last one was Netherlands who had plantations in Curacao. Because the demand of chocolate was higher than expected, during the 19th century plantation of cocoa beans began in Africa. There were small plantations in Nigeria, Ghana and Bonny Island.

Today, people around the world enjoy chocolate in thousands of different shapes and flavors. "Throughout its evolution, one thing has remained constant—chocolate has never lacked an avid following of people who love the "food of the gods." (World Cocoa Foundation, 2015)

#### 3.2 Cocoa value chain

Before consumers can enjoy a chocolate bar or any other product made from cocoa, cocoa beans have to go through the following process: growing, harvesting, fermentation and drying, marketing, transportation, roasting and grinding, pressing or chocolate making so it can finally be sold to the customer.

#### 3.2.1 Growing

Cocoa beans grow on cocoa trees. These trees are very sensitive plants and must meet some exact conditions for growing. The first one is climate, this condition is found in the belt between 10°N and 10°S of the Equator, where climate is appropriate for their growing. (International Cocoa Organization, 2015)

#### Figure No. 01 – The belt between 10°N and 10°S of the Equator



COCOA-PRODUCING COUNTRIES

Source: rainforest-alliance.org (2015)

Another important aspect in this area is temperature. Cocoa trees respond well to relatively high temperatures, with a maximum annual average of  $30 - 32^{\circ}$ C and a minimum average of  $18 - 21^{\circ}$ C. Humidity and light are important factors as well. A hot and humid atmosphere is essential for the optimum development of cocoa trees. In cocoa producing countries, relative humidity is generally high: often as much as 100% during the day, falling to 70 - 80% during night time. The cocoa tree will have an optimum use of any light available and it has traditionally grown under shade. Its natural environment is the Amazonian forest which provides natural shade trees. Shading is essential in a cocoa tree's early years. The last aspect that impacts plants is rainfall. Variations in the yield of cocoa trees are affected more by rainfall than by any other climate factor. These trees are very sensitive to a soil-water deficiency. Rainfall should be abundant and well distributed through the year. An annual rainfall level between 1,500 mm and 2,000 mm is generally preferred. Dry spells, where rainfall is less than 100 mm per month, should not exceed three months. (International Cocoa Organization, 2015)

In the chosen belt, soil plays a fundamental part, it contains coarse particles with a reasonable quantity of nutrients, and a depth of 1.5 m allows the development of a good root system. The soil chemical properties are very important, as the plant has a large number of roots absorbing nutrients. Cocoa trees can grow in soils with a pH in the range of 5.0 - 7.5. It can therefore, cope with both, acid and alkaline soil, but excessive acidity (pH 4.0 and below) or alkalinity (pH 8.0 and above) must be avoided. Cocoa is tolerant to acid soils; provided the nutrient content is high enough. The soil should also have a high content of organic matter: 3.5% in the first 15 cm of soil. Soils for cocoa trees must have certain anionic and cationic balances. Exchangeable bases in the soil should be at least 35% of the total caution exchange capacity (CEC), otherwise nutritional problems are likely. The optimum *total nitrogen / total phosphorus* ratio should be around 1.5.

#### 3.2.2 Harvesting

While the cacao tree bears pods all year round, harvesting is generally seasonal. The season is twice per year. Every pod contains 20 - 50 beans, depending on the variety of the tree. Currently there are three types of cocoa trees. The first one is *Criollos* which is one of the oldest kinds of cocoa trees and is now rare. These beans have a red color and a distinctive complex taste which

includes flavors like caramel, nuts, vanilla and tobacco. Compared with coffee, *Criollo* is like Arabica. Another kind of cocoa trees is *Forastero*, this is the equivalent of the Robusta bean in coffee. This kind often grows in Brazil and West Africa and it represents 80% of the world production of cocoa. *Trinitario* is a hybrid between *Criollo* and *Forastero* trees. This tree was originated in Trinidad, it later spread to Venezuela and then to Ecuador, Cameroon, Sri Lanka and Papua New Guinea. Some people mention a fourth kind called *The National*, this one is mostly cultivated in South America and west of the Andes, but it is also very rare.

Harvesting is a long process, it lasts several months. Weather plays a very important role, changes can influence harvest times. To collect the pods, a long handle with a steel end is used. Fallen pods are collected in baskets and then taken to the farm. The husk of the cocoa pod can be used for composting, animal feeding, and soap making.

#### 3.2.3 Fermenting & Drying

Fermentation lasts from 3 to 7 days. During this phase, the scents of cocoa are released. This process transforms the flavor to what we associate with cocoa and chocolate. Without fermentation there would not be *chocolate flavor*. The following step is drying. In some areas the sun is used to fulfil this process. In other areas, solar dryers are used to help dry the crop faster. This process takes 1 or 2 weeks, and during this period the color changes from reddish brown to dark brown. During drying, beans lose nearly all of their moisture and more than half of their weight – moisture reduces from 60% to 7%. (GREWELING, 2013)

#### 3.2.4 Marketing & transportation

Once the beans are dried, the farmers prepare packages with beans and sell them to local agents. Then, exporting companies inspect the cocoa and place it into burlap, sisal or plastic bags. Every transport company has its own conditions; these are different depending on the country of origin. In annex No. 01 a sample of a document that includes transportation conditions by The Cocoa Merchants' Association Of America, Inc. is attached. When the ship arrives to the buyers, they will conduct a quality check and take the package to their own warehouse. The cocoa is used following the "just in time" methodology.

#### 3.2.5 Roasting & Grinding

Roasting helps separate the outer husk from the inner bean and makes cracking and winnowing a lot easier, this also helps the sterilization of the beans. This process will destroy all bacteria and fungi that could have grown in the bean in the original environmental conditions in which it had grown.

During the roasting process heat is used to transform cocoa beans into cocoa mass. To achieve 100% pure chocolate a grinding process called "stone by stone" is used and after 24 hours pure chocolate is achieved. This is because the beans contain 50% cocoa butter and when the structure is compromised by heating it turns into homogeneous liquid material. Once the grinding process is stopped the temperature of the cocoa liquor reaches room temperature and it solidifies. (GREWELING, 2013)

#### 3.2.6 Pressing and chocolate making

What is cocoa powder? "The finely ground particles obtained from the mechanical disintegration of cocoa press cake." (European Cocoa Association, 2015) In this phase, producers have to decide to produce cocoa powder or chocolate.

Pressing is the method used to elaborate cocoa powder. Each producer has its own type of powder, each with different color, aroma, pH-value and fat content. Cocoa powder is the basic ingredient for cakes, biscuits, lotions and every product with color or taste of chocolate.

The second option is chocolate making. As it was mentioned at the beginning of this chapter, chocolate contains 3 main ingredients. The first ingredient is sugar. For example: if a producer wants to make 1 kg of chocolate with 90% of cacao beans, he will use 900 grams of cacao beans and 100 grams of sugar. If the producer adds dried milk, it will now be milk chocolate. White chocolate only contains cocoa butter and no cocoa liquor. For mass production of chocolate soy lecithin is added as well as vanilla aroma. Lecithin is extracted from soybeans and is well known as an emulsifier. But chocolate contains no water, so it is not an emulsion, but rather a suspension of solid particles in fat. The function of lecithin in chocolate is to reduce viscosity.

The final step is tempering, this is the process when chocolate is melted to 50°C and then cooled to 28°C. This process is made to correct the connection of crystals of cocoa butter. Thanks

to crystallization chocolate remains shiny and crisp. Tempering is one of most important processes for chocolatiers. After tempering, chocolate can be poured into any desired form and then hardened. During the hardening process the volume of chocolate is reduced, allowing the chocolate to come out of the mold automatically. (International Cocoa Organization, 2015)

#### **3.3** Chocolate as a commodity

Trading chocolate may not be as literal as the title says. Each producer wants to have their own signature chocolate. That is why chocolate producers trade with the main ingredient – cocoa beans.

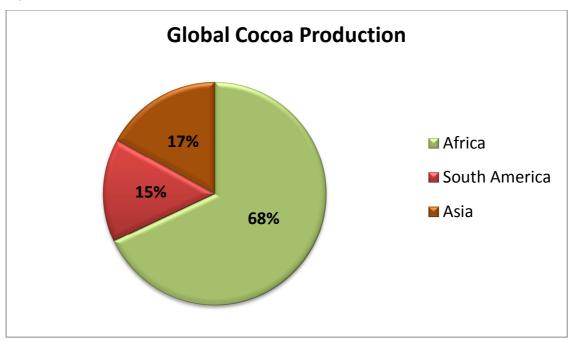


Figure No. 02 – Global Cocoa Production in 2014

Source: own figures based on data from http://www.worldcocoafoundation.org (2014)

The first group - Africa includes the biggest producers of cocoa beans in the world: Ivory Coast, Ghana, Nigeria and Cameroon. The first one supplies approximately 30% of the world's total cocoa with a total harvest of 1,485,822 tons. Their biggest buyers are Nestlé and Cadbury. This country has problems with child labor and poor work conditions. In Ghana cocoa is very important; there are many small farmers whose production accounts nearly one sixth

of the country's GDP. Unfortunately there is high tax to the cocoa industry hence, farmers often smuggle their cocoa to Ivory Coast. Nigeria has had a positive development in the past years. However, they face a problem with unfair wages, men and women who perform the same role in the cocoa-harvesting process are often paid unequally. Cameroon, who historically has been one of the world's largest producers of cocoa beans, is facing some threats due to poor management and lack of new plantations. (European cocoa association,2015)

The second group – Asian countries like Indonesia, Malaysia and Papua New Guinea belong to this group. Most are small rate producers expect for Indonesia; who started later in the 80's, but is now the world's third largest producer of cocoa beans. There are a lot of little farms like in Ghana, because it is a more efficient method than managing large corporate farms.

Last group – American countries like Brazil, Ecuador, Peru, and Colombia are not the big producers compared to African countries, but Ecuador is the leader in terms of quality.

In annex No. 02 we can see a detailed description of the global production and the production of each country. The total production of cocoa was estimated in 4,158,000 tons for the 2014/2015 season, this is about 212 tons less than in the previous season 2013/2014.

#### 3.4 Prices of cocoa

Cocoa beans trade in two world exchanges markets: London and New York. Each contract is for 10 metric tons and the prices are quoted in American dollars per metric ton (USD/MT). On figure No. 03 we can see the price trend during the last 10 years.

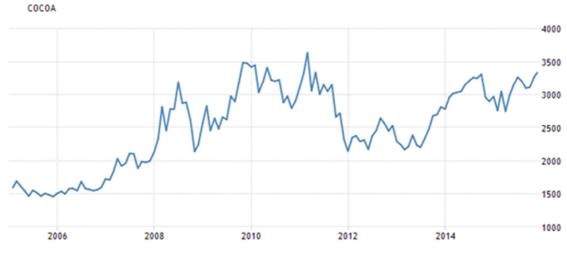


Figure No. 03 – Cocoa price trend in USD/MT (2005-2015)

The current price of cocoa has increased to \$3,338. Cocoa averaged \$1,627.39 from 1959 until 2015. The highest price was \$4,361.58 on July, 1977; on the other hand the lowest price of cocoa was \$211 in July, 1965.

The price of cocoa beans can be influenced by many factors:

- Weather. In the previous chapter, it was mentioned that temperature is very important for cocoa trees. They need a temperature between 21° and 32° C. Temperatures below than 15° C can be fatal. Another condition is that cocoa trees need about than 2,000 mm of annual rainfall. These factors have left cocoa trees vulnerable to global warming.
- 2. Lack of pollination. Farmers are worried due to the lack of bees and butterflies in Europe, however small flies can also pollinate cocoa trees. Global climate shifts and environmental pressures are causing a considerable reduction on the population of these insects, resulting in the need to pollinate by hand.
- 3. **Poor infrastructure.** The biggest producers of cocoa do not have a world class infrastructure. Farmers face a huge problem during rainy season when roads are flooded. This increases the cost of transportation that is counted to the commodity.
- 4. **Geopolitics and war:** Two thirds of the cocoa's production comes from West Africa with Ivory Coast being the biggest world producer. In the last few years, these countries have had

Source: Tradingeconomics.com (2015)

to grapple with civil unrest, wars and Ebola. All of these factors have reflected on the production costs.

5. **Child labor.** Many farmers, especially in Ivory Coast, are exploiting thousands of children in the harvest of cocoa beans. Terrible work conditions, very long shifts and children being victims of human trafficking, are some of the biggest issues.

To conclude this chapter it is important to notate that the supply and demand of cocoa beans is unbalanced. The reason for this disparity is limited to the production, because it depends on climatic conditions; and demand is unlimited across the world. A balance between supply and demand needs to be found. Cocoa's long development period, gives considerable room for price discovery at any given time.

#### 3.5 Description of business plan

"A business plan is like a map that will help each of these individuals gain financial and other support for their enterprise or project." (Creating a business plan, 2007)

"It is a written document that describes in detail how a new business is going to achieve its goals. A business plan will lay out a written plan from a marketing, financial and operational viewpoint. Sometimes a business plan is prepared for an established business that is moving in a new direction." (Investopedia, 2012)

"Set of documents prepared by a firm's management to summarize its operational and financial objectives for the near future (usually one to three years) and to show how they will be achieved." (Business Dictionary, 2013)

The definitions of a business plan can be slightly different, but every business plan must have these conditions:

- It is a written document prepared by the company's management or owner.
- It defines main and particular objectives.
- It describes the marketing strategy and how a company should proceed in the future.
- It estimates financial analysis and threats.

These points are essential for owners, investors, lenders and managers. (BENNETT, 2005)

#### **3.6 Reasons for preparing a business plan**

Before entering the market, a firm must be prepared for the upcoming scenario. Not only is the analysis of the market, product or pricing; with a business plan, a company can identify long term goals, focus on keys of success and also forecast how the desired investment and loans will increase the company's profit. Each investor wants to know how his capital will increase over time and how and when the company will achieve the return of the investment.

Another reason to prepare a business plan is to identify threats. With a well prepared business plan, a company will be ready to avoid actual and future threats. So every company that wants to enter the market, launch a new product, or evolve should dedicate time to work on a business plan, because the success of the business will highly depend on it. (PINSON, 2008)

#### 3.7 Structure and contents of a business plan

This chapter describes the main structure of a business plan. The structure may become wider or narrower, depending on its purpose, but the content is very similar in all cases, only the division of chapters may vary. The common structure of a business plan is described in *Creating a Business Plan* (2007), it lists the following components: cover page and table of contents, executive summary, business description, business environmental analysis, industry background, competitive analysis, market analysis, management summary, financial plan, attachments and milestones.

Furthermore, it could also be developed using ideas of other authors. Keep in mind that each business plan must contain basic core information: schedules, summary of strategies, milestones, responsibilities, numerical goals, and basic projections. These projections include sales, costs, expenses, and cash flow. (BERRY, 2009)

#### 3.7.1 Cover page and table of contents

The cover page is very important, it must be clear, with a professional appearance and it has to catch the audience attention. The cover should include the name of the business, contact information and logo of company. The logo may be simple, but it must be appealing.

The table of contents is suitable for readers, because it provides an overview of the business plan. The next feature of content is maneuverability. The reader should easily find the chapter that is willing to read. (Creating a business plan, 2007)

#### 3.7.2 *Executive summary*

This part provides a quick overview of the business. This section is crucial because it will engage the investors, creditors and other interested parties. An investor or lender will start by reading this chapter, and they expect that the executive summary will include the purpose of the funding and feasibility of the business. Of course, the executive summary will describe other parts such as the description of product, the business opportunity, key for success, management team. (PINSON, 2008)

Pinson (2008) advises that the executive summary should be written only after the business plan is completed.

#### 3.7.3 Business description

According to Creating a Business Plan (2007) the business description is also a summary, but this one focuses more in the business concept. The business description should answer to following questions:

- What kind of business is it?
- What product or service is being offered?
- Who will manage the business?
- What will the structure of the business be?
- Where will the business be located?
- What is the financial status?

The answers should be fully described on the business description. The question about the business offer should be highlighted. How are we going to sell this product/service? It is important to consider the competitive landscape, the intellectual property and the technology that will be needed. (BERRY, 2009)

#### 3.7.4 Business environmental analysis and industry background

In this part, it is very important to distinguish these two important classifications: market and industry.

Definition of industry:

It is "A classification that refers to a group of companies that are related in terms of their primary business activities. In modern economies, there are dozens of different industry classifications, which are typically grouped into larger categories called sectors."

(Investopedia, 2014)

Definition of market:

"An actual or nominal place where forces of demand and supply operate, and where buyers and sellers interact (directly or through intermediaries) to trade goods, services, or contracts or instruments, for money or barter." (Business Dictionary, 2015)

Through the understanding of these two concepts, companies should analyze the environment in which they want to run a business. They should know the answers to questions like: What companies sell the same, or similar, products or services to customers within your market? Is the market in *Prague* saturated? Are you selling a product directly or through intermediaries? (Creating a Business Plan, 2007)

According to Creating a Business Plan (2007) the industry background section provides the readers with information to understand the size, trends, and key features of the industry and it helps them understand how your product or service will fit into that industry.

#### 3.7.5 Competitive analysis

When launching a new company, product, or service to the market, business men should know and identify their current and potential competitors. In order to success, the new company has to satisfy consumer's needs in a better way than the competing firms. For this reason the competition analysis will make possible to find out all the information about our competitors and will give a view of the position against these competitors. According to Kalka, Massen, (2003) the analysis of competitors should be divided in two parts. The first part includes the identification of the biggest competitors and the comparison based on selected criteria. The second part compares each competitor with your company.

Another approach is the *analysis of forces* by Michael Porter. This analysis provides the long term attractiveness of the market, which is evaluated by five forces: competition in the industry, potential of new entrants into industry, power of suppliers, power of customers and threat of substitute products. (Kotler, 2001)

#### 3.7.6 Market analysis

This segment analyses the market, its advantages and disadvantages. For this purpose a company should prepare three types of analysis. The first one is the SWOT analysis. This tool identifies the strengths, weaknesses, opportunities and threats of an organization. It also separates internal issues (strengths and weaknesses) that a company can influence and external issues (opportunities and threats) where the company cannot influence. The aim of this analysis is to oversee what may help the company and what obstacles has to overcome. (Kotler, 2001)

The second type of analysis is the PEST analysis. According to John Sloman (2007), this is the analysis where political, economic, social and technological factors shaping the business environment are assessed by a business in order to devise future business strategies. A company can be influenced by external factors, which are divided into these four groups. The evaluation of the groups can help solving many problems and avoid them.

Finally, we have the marketing mix. According to Kotler (2001), the marketing mix is the set of controllable variables that the firm can use to influence the buyer's response. The marketing mix refers to four elements that are called the 4P's an acronym for Product, Price, Place and Promotion. These elements can provide the highest level of consumer satisfaction. In some cases, the marketing mix may be expanded by People, Physical evidence and Process.

#### 3.7.7 Management summary

This part of the business plan is very important when a company is looking for an investor. For the company to achieve their goals, it must employ the right people. The team members, employees, and managers are part of the society and without the right cooperation and communication the selected goals will not be reached. In the management summary the description of significant positions, qualifications and their skills and knowledge, must be fully described. (Creating a business plan, 2007)

#### 3.7.8 Financial plan

The financial plan is a critical component of all business plans. It must be customized for an investor, a lender or a member of management because they will approach it with different view. What is the importance? The financial plan has to show the real financial view of a company. The financial plan may include many kinds of analysis, but the readers of the business plan only want to know how much capital is required, how much can they expect from the investment and mainly how will the company intend to use the money. According to Pinson (2008), a typical financial plan should include:

- Summary of financial needs
- Dispersal of loan funds statement
- Cash Flow statement
- Income projection
- Break-even analysis
- Balance sheet
- Profit and loss statement
- Financial history
- Financial statement analysis

Simply, it should be mentioned that the financial documents must show past, current, and projected finances. (PINSON, 2008)

#### 3.7.9 Attachments and Milestones

A great part of the business plan are attachments, where it is possible to cite an extract from the Commercial Register, the results of market research, profit and loss, balance sheet, acquired certificates and all other documents that are relevant to the business. Milestones give the reader a perspective on the timeline of the project; it should highlight beginnings of events and major changes or events. The reader should find generic dates as "year one, after six months, during the first quarter". (Creating a business plan, 2007)

## **4** Practicality

The practical part includes the entire description of the business plan for the new company. The elaboration this plan corresponds to the theoretical part - chapter 3, which describes the particulars of a business plan in detail.

#### 4.1 Executive Summary of Pralinkárna

Pralinkárna is a start-up company that relies on handmade production focused on unusual fillings and flavors to give our customers a great opportunity to enjoy high-quality truffles and chocolate goods.

The current market offers lots of truffles, but they are insipid and common. Pralinkárna focuses on different flavors, packaging and originality.

The company entered the market in late 2015 and is building a stable network of customers. The business began with a shared capital of CZK 109,500.

#### **Business description**

For the first year the expected revenue was calculated at CZK 846,000 per year. Expected costs are estimated at CZK 637,200. The company focuses on two types of customers: final consumers, to whom we offer attractive gift packaging; and intermediaries, who will benefit from thanks Pralinkárna's original product. The break-even point is estimated to 5,288 pieces for the B2C market and 45,323 pieces for the B2B market.

The company attracts new customers by advertising the brand on social networks; visiting confectioneries and catering companies; and participating in food events.

#### 4.1.1 Company overview

The legal conditions for entrepreneurship in the Czech Republic are stablished on The Bill of Rights, where is stated that everyone has the right to own a business and/or property. The precise details of this law are in the Commercial Code and The Trades Licensing Act and some other restrictions.

The company chose the business type - Declaration of unregulated trade. In this type of business the owner is the only responsible for the development and risks; the company depends

just on the owner's decisions and failures. In the unregulated trade the owner is liable for every possible outcome of the company. If the owner finds an investor, the company will change its type to Limited Liability Company.

The owner Eliška Němcová, lives in K Orionce 18, Prague 12, 14300, Czech Republic. The company was founded on December 12<sup>th</sup>, 2015 and was granted the identification number 04620283. The trade license has no expiration date and allows the following activities: (Registr živnostenského podnikání, 2016)

1. Manufacture of food and starch products.

- 2. Wholesale and retail trade.
- 3. Mentoring, courses, and training, including lecturing
- 4. Production, trade and services not elsewhere classified

The basic capital was CZK 30,000, and it was used to acquire new equipment and a training course. In November, 2015, Eliška Němcová participated in the competition "Start It" from Chef Starter. Thanks to her participation she won the right to use the professional kitchen of the organizer for 6 months and will also be coached on business administration.

The company has set these objectives:

- Remain in the market
- Maximize profit
- Business expansion
- Promotion of handmade products

In order to accomplish these objectives, it is necessary to obtain a regular and sufficient demand of the company's products and services. This can be done by assuring the quality of the offered range and services, creating a stable customer base and attracting new customers. It is also necessary to monitor the particular market requirements to offer competitive promotions based on these indicators.

## 4.1.2 Vision

Or main goal is to **create a stable network of customers**. The customer network should include at least five fixed customers where each customer orders more than 500 pieces of pralines per month. Another goal is lead Pralinkárna to **become the market leader** in the sector of artisanal pralines. All of this will be reached by **offering high quality and exclusivity**.

The company is in the growth phase. Currently, the company has one fixed customer - Coffee Chocoffee - and two potential customers – the Fusion hotel and a catering company - Plavbomat.

To form a well-rounded business, Eliška Němcová coaches the courses "Pralines I and II" at cooking school Chefparade, this ensues another line of business for the company.

## 4.1.3 Partners and Investors

The main partners of company are cooking school Chefparade and Chef Starter. They assist with workshops, mentors, equipment and warehouse space. Another significant partner is Monaco International and Almeco, s.r.o., they provide high quality materials, equipment and courses.

At the moment the company is not looking for investors.

## 4.1.4 Description of product

This section will not just describe the products and services; it will also describe their problems and solutions. The success of the business depends on the offered products. The success of the products depends on the saturation of the market. It comes down to what do customers need and what we can offer. For the most part, a simple idea when executed successfully turns out to become an extraordinary feat.

The company star products are handmade pralines and truffles. Pralines are available in shopping centers and hypermarkets. The company targets customers, who want to differ from others. The product is made from high-quality Italian chocolate, and each other raw material is carefully selected to keep the overall quality of the product.

Regular pralines are filled ordinary fillings. In Pralinkárna, the fillings increase value of our product because they are exotic. The company as well offers basic fillings like caramel, coffee or nuts. But the top line consists in herbs, spices and selected alcohol.

Chocolate bars that are decorated with blanched nuts, spices, blossoms, or freeze-dried fruit. For this line of products we select single origin or blend chocolate with the highest quality.

The market is saturated by common products and customers are looking something more personal, exclusive and emotive. For this reason, the company creates special sets that can express emotions like love, apology, sadness and enthusiasm.

Besides manufacturing pralines, the company and the cooking school Chefparade organize many types of cooking courses and Eliška Němcová leads the courses "Pralines I and II".

## 4.2 Market analysis

The market analysis is one of the most important parts of a business plan. The market is the place where buyers meet sellers and jointly enter into mutual interaction. To have effective product sales the entrepreneur must know the market. Market analysis demonstrates knowledge of the environment. It is important to know not only the market but also to observe the guidelines and trends in order to project this information to make future decisions. The next chapter assesses the environmental analysis, which is divided into macro-environment (PEST analysis) and micro-environment (marketing mix). The last one shown is the SWOT analysis, which is compiled with basic data from the previous analysis.

# 4.2.1 PEST Analysis

This is a strategic management tool to evaluate the macroeconomic conditions of the company. PEST acronym is derived from the initial letters of the four areas of the external environment:

- Political factors
- Economic factors
- Social Factors
- Technological factors

The aim is to select a macro analysis from all the factors, only those that are important for the company. For this company the most important factors are: political, economic and social.

## **Political factors**

The political factors include all laws and regulations from the government in the sector where the company is located. Currently, most businesses must observe the following laws:

## 1. Labor law

- Act no. 262/2006 Coll., the Labor Code
- Act no. 592/1992 Coll., on premiums for general health insurance
- Law no. 589 / Coll., on social security and state employment policy

## 2. Legislation regulating venture

- Act no. 455/1991 Coll., On Licensing Business
- Act no. 130/2008 Coll., fundamentally changes especially Licensing Act
- Act no. 513/1991 Coll., the Commercial Code

#### **3.** Legislation defining tax

- Act no. 235/2004 Coll., On Value Added Tax
- Act no. 586/1992 Coll., On Income Taxes

Other regulations that have to be met are the ones of the European Union. In recent years the rules are focused on consumer protection. Their focus is to have labels be clear about the complete composition and allergens that their products may contain.

# **Economic factors**

Here we include everything with local, national and global economic influence. In this case, economic factors focus on development of GDP, unemployment and inflation rates and average wage, fall within the category of social factor.

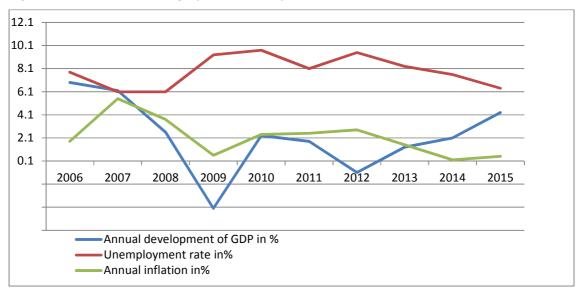


Figure No. 04 - GDP, unemployment and inflation rates trends

#### Source: www.czso.cz, 2015

Figure No. 04 shows the development of core factors. On the figure we can note the economic crisis of 2009 that hit the whole world. The development of each factor has increased from 2012 and at present time is suitable for new business.

#### **Social and cultural factors**

The social and cultural factors are those who influence the social environment. The main ones are: population, average wage and approach to product.

Because the manufacturing is in Prague, the assumption that all the customers are from Prague was made. In Prague, the population has positive development; last year 1,261,715 people lived in the city from which 611,660 were men and 650,055 women.

The average monthly gross wages of employees in Prague reached, in the 1st quarter of this year, CZK 33,010. Compared with the average wage for the whole Czech Republic (CZK 25,306) Prague's is higher by 30.4%. (www.czso.cz, 2015)

At present time there is a big emphasis on ingredients quality and elaboration. Customers now read the composition of products and try to find origin. This trend affects a structure of market. People are beginning to visit again the farmers' markets and seek for small stores. The change on this behavior is positive for Pralinkárna, because customers would rather buy handmade products made with love and care.

## **Technical factors**

The technical factors and equipment are necessary for manufacturing. Given that Pralinkárna is a Start-up Company, it accepted the offer from Chef Starter to begin using their professional kitchen. To ease the production and gain time the owner bought the first machine – Minitemper for melting chocolate. Additional equipment required are molds for pralines which are bought from Monaco International.

#### 4.2.2 Marketing mix

Marketing mix consists of tools that a company uses to achieve their goals. To fulfill its functions; it should include least four parts called 4P's - product, price, place and promotion. In this case the enlarged marketing mix that includes "people" was chosen.

For three months a market research was conducted. Potential customers answered basic questions related to the product, price and distribution. The selected sample of customers was formed by 300 customers from Prague and nearby towns. The size of the sample was calculated using the formula, with a confidence level of 90%, a confidence interval of 5% and population size of 1'247,000 people (population in Prague). The results are shown and described in the following chapter and the whole questionnaire is in appendix No. 03.

#### Product

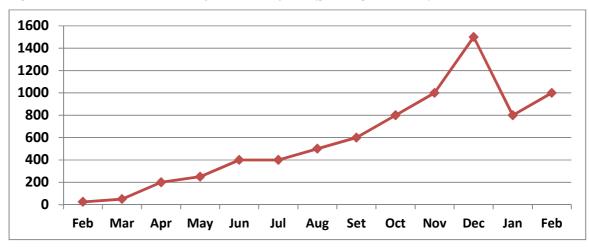
This part includes the entire range of products and services. Products and services were described in chapter 4.2.4. The entire offer is attached in appendix No. 04.

The pralines are made from three types of chocolate: dark chocolate 72%, milk chocolate 32% and white chocolate 31%. The cacao content is a very significant indicator for customers; 37.5% of respondents chose dark chocolate with more than 70% of cacao mass and milk chocolate. The second most popular kind was dark chocolate with 50% - 70% of cacao mass (28.1% of respondents) and as the last kind was white chocolate (15.6%). Customers should know the composition of chocolate besides the cacao content. Dark chocolate should contain only four ingredients: cocoa mass, sugar, soy lecithin and natural vanilla. Milk chocolate and a white

chocolate contain also full cream dry milk. The quality of ingredients is one of the key factors that influence customers when they are intended to buy (85.3% of respondents). Other factors are attractiveness of package (64.7%), price (55.9%) and references (50%).

On the following figure is shown the development of sales of the main product. The manufacture of pralines started in the food festival on Restaurant day in February 2015. Because the owner sold out the entire stock, she decided to start to run a business. The following month a contract with a small café Chocoffee, represented 80% of their sales

Figure No. 05 – Sales turnover for the last year (pieces per month)



#### Own source 2016

The successful sales in café Chocoffee also confirmed the survey, because 88.2% of respondents said that would buy pralines in cafés or candy shops and 64.7% said that would buy pralines for dessert and also as gift.

#### Price

For pricing the cost-oriented approach, combined with the method-oriented competition were used. The calculation is based on own costs and margin which raise the price of about 120%. It represents the profit of the company.

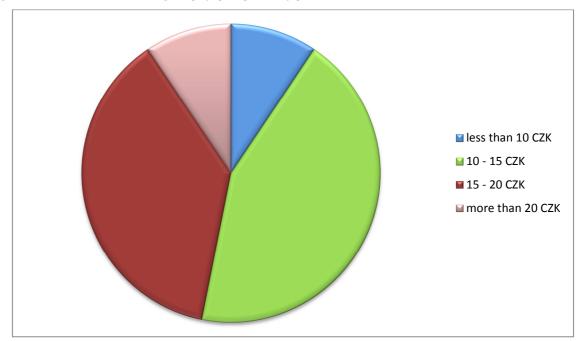


Figure No. 06 – Price willing to pay per piece of praline

The respondents chose centered groups of price. 43.8% of respondents are willing to pay CZK 10 - 15 per piece and 37.5% are willing to pay CZK 15 - 20 per piece. In this case it is very important to mention, that products from Pralinkárna are handmade. This fact increases the price of pralines.

#### People

People are an integral part of the company and each person plays a role in the sales process and influences the perception of other customers. The company was created by one person – the owner. For this reason "people" describes the rest of the community – customers and competitors.

Customers are a key part and each entrepreneur has to know their own targeted group, their expectations of products and services. In this case is important to distinguish customer and consumer. The company focuses on two types of markets - B2B and B2C. In case of B2C, the company focuses on direct selling and the customer will be the final consumer; these are individuals who want to buy the product. In the second case, the customer is another company (café, hotel, catering company) and their consumer is the final customer. It is not a direct selling.

The entrepreneur has influence only on direct selling, that's why the survey is focused on B2C market and its composition (analysis of the customer). The information about respondents is divided into three categories: gender, age, and professions. Bigger interest in praline is shown by women (88.2% of respondents) than men (11.8%). Men indicated that they buy chocolate for women; but women buy chocolate for many reasons (gift, surprise, or dessert for guest). Regarding their age, most of our customers are 25 - 35 years old (44.1%). The next group is 35 - 45 (30.2%) and finally the ones 15 - 25 (16.3%). Finally we divided results based on professions. The greatest are employees (58.8%), then students (26.5%) and entrepreneurs (5.9%).

The second part of people - competitors - is evaluated using Porter's five forces model. The model focuses on 5 different elements: Competitive rivalry, buyer power, supplier power, potential competitor and treatment of substitution.

## *Competitive rivalry*

Competitive rivalry means that another company offers similar products and services in the same place. Prague is big city, and demand is lower than supply. Pralinkárna offers handmade products and therefore, Czech Pralines, Leonidas, or Jeff de Bruges does not become a competitive rivalry. The main competitors are Mon Chocolatier, Lucie Glaister or café Saint Tropez. Each competitor is located in a different part of Prague and only covers part of the total demand.

#### **Potential competitors**

The next force is potential competitors or threat of new entry. The current market is not saturated in this sphere. The probability of entry of new competitors to the market is very high. There are no barriers of entry for new companies. The only requirement is to be a chocolatier. It is also a good time to enter the industry because gastronomy perspective is increasing and people are willing to pay more for products. Furthermore, economies of scale can play an important role. It will depend whether fresh new or existing competitor has machines for tempering chocolate or any additional equipment that can reduce the cost per unit. These machines are expensive, the price goes from CZK 100,000 to CZK 500,000, but they facilitate work and reduce production time.

## Threat of substitution

Threat of substitution represents a high risk. The biggest threat is the wide offer of industrially produced pralines that are available in every shopping center. This can be avoided by increasing the utility value, customization of product, sample tasting and the collaboration of a celebrity.

## **Buyer** power

Buyer power was described in the previous chapter. As a summary it can be mentioned that the clients are mostly middle age women, students, and customers who prefer quality of handmade production. Price perception in very important; it is closely linked to chocolate quality. There is a huge difference among competitors, each one works with a different brand of chocolate and that has an impact on the production cost.

Pralinkárna chose to scarify chocolate quality, such as Valhrona or Domori used by Saint Tropez or Mon Chocolatier; but to compensate this, with big investments developing new exotic flavors and packaging. At the moment an Italian chocolate with acceptable quality was chosen for production.

#### Supplier power

The selected suppliers are mentioned in chapter 4.2.3. The selection of suppliers was made based on an assessment using the following criteria:

- References
- Scale of product and their quality
- Level of pricing
- Delivery and payment conditions

When analyzing all five forces, the situation is positive. Although pressure is strong in shopping centers, customers prefer to look up for manufacturers with their products and positive references. None of the suppliers create a big brunt, because the market has several suppliers from where to choose.

## Place

The company uses two types of distribution. The first one is direct product distribution. The final customer can buy the product via e-shop or through the Facebook page. This way of distribution is intended for products like gift sets of pralines and chocolate bars. This is a direct sale with the final customer and the product is sold at the right time, the right place and at the right price.

The second type of distribution is the B2B sale. The company delivers the products to small and medium sized enterprises. These enterprises use the product for their own purpose like: promotions, gifts, or simply reselling.

The company purchases all material and goods from approved suppliers which are mentioned in chapter 4.2.3.

#### Promotion

The promotion of company provides customers a variety of communication tools. One of the most important promotions channels is social media like. Customers can find important information through: the web site (www.e-pralinkarna.cz), Facebook page (www.facebook.com/pralinkarna) and Instagram (www.instragram.com/pralinkarna), where the company has created a profile. In these sites there are news and photos of products, information from field, events and references from customers.

At the beginning of this year, the owner started a new campaign on Facebook. The campaign had two different parts and it all lasted 3 weeks. Both types of the campaign focused on increasing "Likes" on the Facebook page.

The first one was targeted the whole country, men and female with no age restriction and lasted for 10 days. As a result the company gained 187 new "Likes". The cost of the first campaign was CZK 249.96, which means CZK 1.34 for one "Like".

The second campaign more specific. It only targeted women with an age range 20 – 50 from Prague and a ratio of 50 km. The cost of the second campaign was higher. The investment was of CZK 200, but "Likes" increased only by 59. The cost per "Like" was CZK 3.39. All-in-all, the result of the campaigns is considered successful.



Figure No. 07 – Facebook page

Source: Pralinkárna Facebook Page, 2016

Figure No. 07 shows the 681 "Likes" gained by March 1<sup>st</sup>, 2016 and they are still increasing. Other important aspects to consider include response time on page (9 minutes), 100% response rate, post reach (1,184 people) and finally post engagement (242 people) these numbers will keep rising as the power of social media is yet unmeasurable. This type of online promoting can help to identify potential customers and long term fans of the product.

The following figure shows the people who have liked Pralinkárna's fan page. With this information we can compare the initial survey (subchapter Marketing mix - people), and the Facebook survey. Both surveys agree on the targeted group of customers who are women (87%) aged 25-35 years (37%).

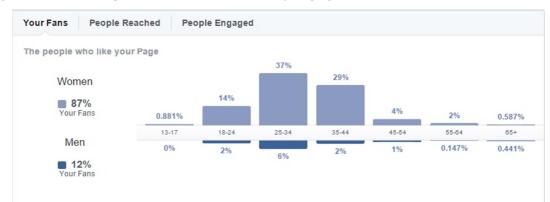


Figure No. 08 – People who like Pralinkárna's fan page

Source: Pralinkárna Facebook Page, 2016

The company has also invested in traditional advertising methods like business cards and posters. Every customer gets business cards to recommend us to other potential customers.

Another type of promotion is social events, where the company has selling place. The company has participated in many events since last year. Pralinkárna is a regular participant of the food festival Restaurant Day, Prague Cake/Candies festival and helps with workshops and events from Chef Starter.

## 4.2.3 SWOT analysis

SWOT analysis is a very useful tool for understanding all sorts of businesses and situations. The letters in SWOT stand for strengths, weaknesses, opportunities and threats. The usefulness of this concept lies in linking internal capabilities (strengths and weaknesses) with external factors (opportunities and threats), and the entire environment - linking strengths with opportunities in the external environment. It also shows what the weaknesses of a company are and what the possible threats on the market are. A company can prepare for these situations by linking these two problems.

#### Strengths

- Unique product with possible customization
- High-quality raw materials and handmade production
- The possibility of additional services

- Products can be shipped across the country

#### Weaknesses

- The company does not have a well-known reputation.
- Limited production capacity
- High prices

## **Opportunities**

- Possibility of extension services
- Technology development and innovation
- Trends
- Customization
- Product Development

## Threats

- Small number of customers
- New competitors
- Rise of food prices and additional services

The above assessment shows that the company has its strengths, which guarantee the successful operation of the enterprise, but also the weaknesses that the implementation and operation of the business could confront.

The company's founder considers that the offered products are strong but may be a subjective view. This bidding will seek primarily for customers who prefer a luxury lifestyle. Consumers that don't have a specific taste for chocolate will not be our concern, the company will focus on the targeted market to maintain the dynamism of the enterprise.

As it has been already mentioned, this venture could be jeopardized by a considerable number of undesirable aspects, e.g. reduced number of customers caused by their lack of interest, the elevated price, or lack of time. There are many areas of opportunities that the company can assess. The fact that the company doesn't have a well-known reputation leaves it open to the risk of having customers go to a competitor and miss out on getting to know the company. Among the opportunities, the expansion of services as the organization and demonstration of themed events, tastings and workshops, would be accounted for.

## 4.3 Financial plan

Part of the financial plan are the costs associated with starting a business, the costs of production equipment, calculation of monthly operating costs and depreciation of tangible fixed assets with a cost greater than CZK 40,000. This data is the basis for the creation of the annual budget.

## 4.3.1 Expected costs

Initial costs are associated with the establishment of the company; purchase of equipment and initial inventory; and marketing investment. A more detailed structure of these costs is shown in the following table.

Establishment of the company	Announcement of free trade	1,000
Purchase of equipment	Purchase of machinery	51,000
	Purchase of other equipment	6,500
Inventory	Purchase of chocolate	20,000
211, 01002 y	Purchase of other ingredients	15,000
	Web site and logo	16,000
Marketing expenses	Uniforms	1,000
	Business cards	2,000
Total costs		97,500

Table No. 01 - Costs associated with the launch of the company (in CZK)

Own source, 2016

Costs related to the launching of the company are estimated at CZK 97,500. Mandatory fees relating to the establishment and acquiring the free trade license are CZK 1,000. The amount

of CZK 57,500 is the cost of equipment. Initial inventory requires the sum of CZK 35,000. In addition to the promotion of the enterprise, an extra CZK 19,000 is needed for marketing.

The professional Minitemper belongs to tangible assets group, its price was CZK 51,000. These assets are included in the second depreciation group with a given period of 5 years and with a straight-line method of depreciation. Depreciation and residual value prices in individual years are shown in Table No 02.

Year	Calculation of annual depreciation	The amount of tax depreciation	The residual value
1	(51,000x11)/100	5,610	45,390.0
2	(51,000x22,25)/100	11,347.5	34,042.5
3	(51,000x22,25)/100	11,347.5	22,695.0
4	(51,000x22,25)/100	11,347.5	11,347.5
5	(51,000x22,25)/100	11,347.5	0.00

## Table No. 02 – Depreciation of machinery

Own source, 2016

In the first year depreciation will amount to CZK 5,610 and during the following years CZK 11,347.5.

# 4.3.2 Operating costs

Table No. 03 - Calculation of operating costs (in CZK)

Operating costs	Monthly	Quarterly	Yearly
Rent of kitchen	15,000	45,000	180,000
Rent of warehouse	400	1,200	4,800
Transportation	3,000	9,000	36,000
Communication	950	2,850	11,400
Inventory	15,000	45,000	180,000

Wages	15,000	45,000	180,000
Social and health insurance	3,750	11,250	45,000
Total operating costs	53,100	159,300	637,200

The table above shows that the monthly operating costs of the company will be CZK 53,100. The kitchen rental and storage is provided by Chefstarter. Due to delivery, it is important to include the cost of gasoline, which is estimated at CZK 3,000. An amount of CZK 950 is dedicated to telephone and internet. Monthly labor costs will be paid in the order of CZK 15,000. The manufacturing will be done by the owner so the cost will not have a direct impact on the business.

The costs related with the establishment of business and operating monthly costs are CZK 150,600. The owner first investment was of CZK 170,000, which covered the costs of purchase and operation costs of two months.

## 4.3.3 Expected revenues

For the calculation of estimated sales there will be considered 3 scenarios: optimistic, realistic and pessimistic. First, it is important to divide customers and their anticipated purchases. On the chart from chapter 4.3.2 it is shown how much our customers are willing to pay for a piece of truffle: CZK 15 / piece.

	Realistic scenario	Optimistic scenario	Pessimistic scenario
Monthly	10,500	12,075	8,925
Yearly	126,000	144,900	107,100

Table No. 04 – Expected sales B2C (in CZK)

Own source, 2016

In the realistic scenario the final customer will buy 700 pieces per month. In the optimistic variation the expectation increases by 15% that means 807 pieces. For the pessimistic variation it

is expected to have a decrease of 15% - 593 pieces per month. Sales per month are calculated by multiplying the anticipated demand in pieces per month and the price per piece (CZK 15).

The second type of customer - patisseries and similar companies have a higher expected sales ratio. From experience the realistic expected sale is approximately 6,000 pieces per month. In this case, the price is lower, CZK 10 per piece.

## Table No. 05 – Expected sales B2B (in CZK)

	Realistic scenario	Optimistic scenario	Pessimistic scenario
Monthly	60,000	69,000	51,000
Yearly	720,000	828,000	612,000

Own source, 2016

Expected realistic sales for pralines are 6,000 pieces per month. In the optimistic scenario it is expected to have an increase of 15% that means 6,900 pieces pralines per month. For the pessimistic scenario the estimation is of 15% lower sales, or 5,100 pieces per month. Profit for each month is calculated by multiplying the anticipated sales in pieces per month by the price per piece.

The following table shows the total expected sales from both types of customers.

Table No- 06 – Total expected revenues (in CZK)

	Realistic scenario	Optimistic scenario	Pessimistic scenario
Monthly	70,500	81,075	59,925
Yearly	846,000	972,900	719,100

Own source, 2016

The following graph is compares the expected sales and the total operation costs, in other words we can visualize the break-even point.

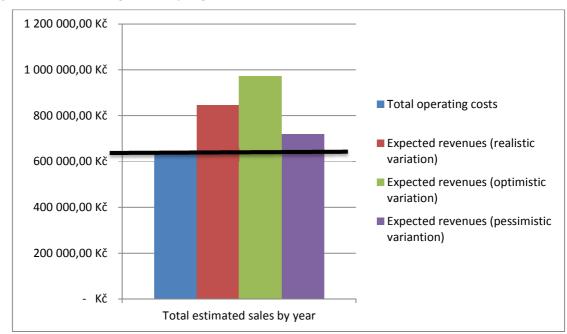


Figure No. 09 – Comparison of expected annual costs and revenues

From figure No. 09 it is seen that all three variants of expected sales (realistic, optimistic, and pessimistic) are positive because they all go beyond the expected annual costs.

Table No. 07 - The annual budget of revenues, costs and profits (in CZK)

The annual budget of revenues,	Realistic	Optimistic	Pessimistic
costs and profit	scenario	scenario	scenario
Revenue from sale of products	846,000	972,900	719,100
Salary	180,000	180,000	180,000
Health and social insurance	45,000	45,000	45,000
Inventory	219,192	238,471	122,969
Depreciation of LT assets	5,610	5,610	5,610
Other operating costs	232,200	232,200	232,200
Operating result (*)	163,998	271,619	138,931

Own source, 2016

Financial result	0	0	0
Income tax on ordinary activities (15%)	24,600	40,742	19,998
Economic result from ordinary activities	139,398	230,876	118,933
Economic result for the accounted period	139,398	230,876	118,933
Economic result before income tax	163,998	271,619	138,931

(\*)Operating result = revenue from sale of product – (salary + health and social insurance + inventory + depreciation+ other operating costs)

From the previous table which shows the annual budget of revenues, costs and profit, it is obvious that all variants are suitable for keeping the business, they all show in positive figures.

# 4.4 Financial analysis

## 4.4.1 Income statement

The profit and loss account expresses income, expenses and profit for the given period. The economic result consists of the sum of the operational, financial, and eventually extraordinary profit.

Table No. 08 – Income statement (in CZK)

Description	Row	Current period
Revenues from sold goods	1	0
Expenses on sold goods	2	0
(+) Sales margin (r. 01 - 02)	3	0
Production	4	846,000
Production consumption	5	652,700

(+) Added value (r. 03 + 04 - 05)	6	193,300
Personnel expenses	7	0
Taxes and fees	8	0
Depreciation of tangible and intangible assets	9	5,610
Revenues from disposals of fixed assets and materials	10	0
Net book value of disposal fixed assets	11	0
Change in operating reserves and adjustments and	12	0
complex deferred costs ( + / - )		
Other operating revenues	13	0
Other operating expenses	14	0
Transfer of operating revenues	15	0
Transfer of operating expenses	16	0
Operating profit / loss	17	187,690
[r. 06 - 07 - 08 - 09 + 10 - 11 - (+/- 12) + 13 - 14 + (-15) - (-16)]		
Revenues from sales of securities and ownership	18	0
interests		
Sold securities and ownership interests	19	0
Revenues from long-term financial assets	20	0
Revenues from short-term financial assets	21	0
Expenses associated with financial assets	22	0
Revenues from revaluation of securities and	23	0
derivatives		
Cost of revaluation of securities and derivatives	24	0
Change in financial reserves and adjustments ( + / - )	25	0
Interest revenues	26	0

Interest expenses	27	0
Other financial revenues	28	0
Other financial expenses	29	0
Transfer of financial revenues	30	0
Transfer of financial expenses	31	0
Profit / loss from financial operations (transactions)	32	0
[r. 18 - 19 + 20 + 21 - 22 + 23 - 24 - (+/- 25) + 26 - 27 + 28 - 29 + (-30) - (-31)]		
Income tax on ordinary income	33	28,154
Operating profit / loss ordinary activity	34	159,536
(r. 17 + 32 - 33)		
Extraordinary revenues	35	0
Extraordinary expenses	36	0
Income tax on extraordinary income	37	0
Operating profit / loss extraordinary activity	38	0
(r. 35 - 36 - 37)		
Transfer profit (loss) to partners (+/-)	39	0
Profit / loss of current accounting period (+/-)	40	159,536
(r. 34 + 38 - 39)		
<b>Profit / loss before tax (+/-)</b> (r. 17 + 32 + 35 - 36)	41	187,690

# 4.4.2 Balance sheet

The balance sheet is a fundamental financial statement. This financial statement provides an overview of company property (assets) and sources for its coverage (liabilities) in monetary terms on a specific date and allows assessing the financial position of the company. Correct balance sheets have to meet this basic balance equation: total assets must equal the sum of liabilities.

Current accounting period December 31 <sup>st</sup> , 2016							
	Gross	Adjustment	Net				
TOTAL ASSETS	318,300	21,110	297,190				
Receivables from subscriptions	0	0	0				
Fixed assets	66,500	21,100	45,390				
Intangible fixed assets	0	0	0				
Tangible fixed assets	66,500	21,100	45,390				
Long-term financial assets	0	0	0				
Current assets	251,800	0	251,800				
Inventory	70,000	0	70,000				
Long-term receivables	0	0	0				
Short-term receivables	0	0	0				
Short-term financial assets	181,800	0	181,800				
Accruals	0	0	0				
Liabilities		Current acco	ounting period				
		Decembe	r 31 <sup>st</sup> , 2016				
TOTAL LIABILITIES		297	7,190				
Equity		269	9,036				
Registered capital	109	109,500					
Capital funds		0					
Funds from earnings		0					
Profit/loss from previous year			0				

# Table No. 09 – Balance sheet (in CZK)

Profit/loss from current year (+/-)	159,536
Decided on advance for payment of a profit share	0
Other sources	28,154
Reserves	0
Long-term payables	0
Short-term payables	28,154
Bank loans and financial accommodations	0
Accruals	0

From the balance sheet, it can be seen that the assets the company owns, as of the end of 2016, are valued in CZK 297,190. It includes some long term tangible assets (professional tempering machine). The adjustment includes depreciation of machinery and small assets with a total value of CZK 15,500. Other items included are: the inventory and the current financial assets, bank account and cash. These assets are completely covered with the company's own capital.

At the end of the period the depreciation of long term assets is calculated in CZK 5,610. Inventories will rise by CZK 35,000, which is the amount that is spent to stock the supplies every month. At the end of the period the amount reported is a profit of CZK 159,536.

# 4.4.3 Cash flow

Cash flow is the movement of money into or out of a business, project, or financial product. It is usually measured during a specified, limited period of time.

CASH FLOW STATEMENT – INDIRECT METHOD							
(+) Economic result from ordinary	159,536						
activities							
(+) Depreciation	5,610						

Table No. 10 - Cash flow (in CZK)

(+) Change in current liabilities	28,154
(-) Change in receivables	0
(-) Changes in inventories	35,000
(-) Change in reserves	0
(=) Cash flow from operating activities	158,300
(-) Increase in fixed assets (investments)	0
(=) Cash flow from investing activities	0
(+) Change in bank loans	0
(+) Change in retained earnings	0
(-) Dividends	0
(=) Cash flow from financing activities	0

Net profit is calculated as the sum of the operating and financial results minus income tax. The cash flow of the operating activities sum up to CZK **158,300** which represent the sum of net income, depreciation and change in current liabilities, and the reduction in the change in inventories. In this particular case, the cash flow is the same as the operating activities, because there are no investing or financing activities.

# 4.4.4 Break-even point

To calculate the break-even point we are using the annual data from the realistic scenario. First, set the variable costs per unit. Variable costs include raw materials like chocolate, cream and flavor.

# Table No. 11 - Variable costs per piece

8g	Chocolate	CZK 1.6
5g	Cream	CZK 0.35
1g	Flavor	CZK 0.25
14g	Final product	CZK 2.2

Own source, 2016

Pralinkárna has two types of targeted customers; therefore a multiproduct calculation must be made.

Table No. 12 – Data	for breakeven	point
---------------------	---------------	-------

	Product A (B2C)	Product B (B2B)			
Selling price	CZK 15	CZK 10			
Variable costs	CZK 2.2	CZK 2.2			
Monthly sales	700 pcs	6000pcs			
Fixed costs	CZK 421,200				
Contribution margin per unit	CZK 12.8	CZK 7.8			
Sales mix	7	60			
Contribution margin per batch	CZK 89.6	CZK 468			

Own source, 2016

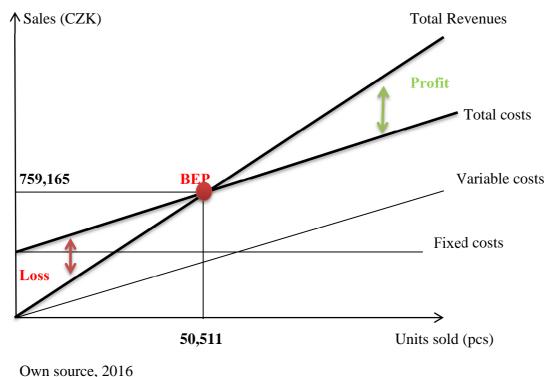
\*contribution margin and sales mix are defined in methodology

 $BEP = \frac{421,200}{557.6} = 755.38 \qquad (Formula No.12)$ 

BEP of product A equals 755.38 x 7 = 5,287.66 pcs; BEP of product B equals 755.38 x 60 = 45,322.8.

After these calculations we conclude that the break-even point for B2C is **5,288** pieces and **45,323** pieces for B2C. This means that an annual production of **50,611** pieces of pralines will cover the fixed costs. In other words, at this point the company will not achieve profits or losses.

Figure No. 10 - Graphical representation of the break-even point



# 4.4.5 Financial ratios

## **Profitability ratios**

The ROA ratio shows how efficiently the company creates profit regardless of the source, self or foreign. The company has a very high ratio of over 53%.

$$ROA = \frac{159,536}{297,190} \quad x \ 100 = 53.7\% \quad (Formula \ No. \ 01)$$

The ROE ratio measures the efficiency on which the company uses capital, i.e. demonstrates the percentage return earned on each crown invested. Return on equity should always be higher than the potential profit in the same risky investments; in this case it would be the interest on a savings account with an interest rate of 1.5%. The company has a very high ratio (over 59%).

$$ROE = \frac{159,536}{269,036} \times 100 = 59.3\%$$
 (Formula No.02)

Return on sales (ROS) is a ratio used to evaluate the company's operational efficiency. It is also known as the "operating profit margin". For the correct interpretation of the indicator, be aware of the long term trend of the development of the company and the value of the industry. The ratio shows that for every CZK 1 of sales the company has 22% of net profit.

$$ROS = \frac{187,690}{846,000} \times 100 = 22.2\%$$
 (Formula No.03)

#### The share of working capital to total assets

It measures the company ability to pay its short term financial obligations. This can detect a difference in current assets and short-term foreign liabilities (current liabilities). Given that the company has no short-term liabilities, it is only the sum of current assets.

Net working capital is positive, which mean that short-term liabilities are lower than short-term assets, from which these obligations are paid. This is known as financial cushion<sup>1</sup>

The increase in net working capital is the result of increasing or decreasing in current liabilities. On the contrary, the reduction in net working capital is given by reducing or increasing the current liabilities.

The share of working capital = 
$$\frac{223,646}{297,190} = 0.753 \qquad (Formula No.11)$$

<sup>&</sup>lt;sup>1</sup> Financial cushion = part of the funds that would allow the company to a limited extent to continue its activities if would be compelled to repay mostly part or all of its short-term liabilities.

## Liquidity ratio

Liquidity reflects the ability of the company of converting assets to cash. It is a general characteristic of assets. Depending on the ability of converting assets into liquidity (cash) resources, they are classified as: current assets, liquid assets and absolute liquid assets. Pralinkárna is out of debt, it only has the tax payments in short term liabilities. For this reason, the results are above the reference value.

Current liquidity tells us how much money of our total current assets is covered by CZK 1 of our short-term liabilities. This means how many times we are able to satisfy our creditors, if at some point the current assets are converted to cash.

$$CR = \frac{251,800}{28,154} = 8.944$$
 (Formula No.07)

Quick ratio is similar to liquidity, but in focuses on completely liquid assets; it does not count the inventory. In other words, it means how much money of our receivables and cash are covered by each CZK 1 of our short-term liabilities.

$$QR = \frac{(251,800 - 70,000)}{28,154} = 6.457$$
 (Formula No.08)

Cash liquidity gives us the ability to repay the short-term liabilities "immediately" - that is, using cash, bank accounts, checks or short-term securities.

Cash ratio = 
$$\frac{181,800}{28,154}$$
 = **6.457** (Formula No.09)

The results show that the company has liquidity reaching results above average, normally set from 1.5 to 2.5. Due to the positive level of net working capital, it can be said that the company is able to meet its obligations.

## **Activity ratios**

Providing information about how effectively the company manages its fixed assets (property, receivables, inventory), and how long are they are boundin funds. If a company has more assets than needed, it creates unnecessary costs; if there aren't enough, on the contrary, revenue may be lost.

Turnover of total assets =  $\frac{846,000}{297,190} = 2.847$  (Formula No.04)

It is a comprehensive indicator that measures the turnover rate for total assets, i.e. the indicator shows, that turnover of total assets is 2.847 times a year.

The period of turnover shows the average number of days from where total assets are bound in the business until their consumption. The ratio for the company is set on 126 days.

Turnover of fixed assets = 360 (297,190 / 846,000) = **126 days** (*Formula No.05*)

Turnover of current assets represents the number of turnovers of current assets in one year. Parlinkárna's ratio is 3.8 times per year.

Turnover of current assets =  $\frac{846,000}{251,800} = 3.783 (Formula No.06)$ 

## 4.5 Long-term outlook

This chapter describes the expected financial situation over the next 5 years, for the period 2016 - 2021. It consists of a planned balance sheet, depreciation of tangible fixed assets, annual profit and loss statement.

During the subsequent years, the owner plans to buy more long-term assets. In 2017, is CZK planned acquire with longitudinal valued 55,000 to cutters cut, in (http://www.monacoint.com/eshop/produkt/pavchitarra). This machine allows introducing another type of assortment to the current offer and sliced truffles. For 2019 a second tempering machine with greater capacity and better features. is intended.

(http://www.monacoint.com/eshop/produkt/icbchocotop). This Tempering machine has a market price of CZK 135,000.

Depreciation	2016	2017	2018	2019	2020	2021
Minitemper	5,610	11,347	11,3478	11,3487	11,347	0
Cutter	0	6,050	12,238	12,238	12,238	12,238
Large temper	0	0	0	14,850	30,037	30,037
Total	5,610	17,397.5	23,585.5	38,435	53,623	42,275

Table No. 13 – Depreciation of long term assets 2016-2021 (In CZK)

Own source, 2016

Long-term tangible assets are reduced by the amount of annual depreciation. The Minitemper that was taken with at the beginning of the company will be fully depreciated by 2020.

	2017	2018	2019	2020	2021
Revenue from sale of products	871,380	896,760	922,140	947,520	972,900
Salary	180,000	180,000	180,000	180,000	180,000
Health and social insurance	45,000	45,000	45,000	45,000	45,000
Material consumption	225,767	232,342	238,917	245,492	252,067
Depreciation	17,397	23,585	38,435	53,623	42,275
Other operating costs	236,844	241,580	246,412	251,340	256,368
Operating result (*)	145,334	144,215	141,688	138,690	174,052
Income tax on ordinary activities (15%)	24,956	26,138	26,006	25,810	29,579
Result for the account period	141,415	148,115	147,370	146,255	167,611
Result before income tax	166,371	174,253	173,376	172,065	197,190

Table No. 14 - The annual budget of revenues, expenses and profit

Own source, 2016

(\*)Operating result = revenue from sale of product – (salary + health and social insurance + material consumption + depreciation+ other operating costs)

Table No. 14 is based with an increase sale of 15%. It also considers the annual increase in energy prices and other operating costs, which are included in the rent, charges for access, management, and telephone; an average of 5%.

Tax deduction from income before tax is determined by net profit (economic result for the account period).

Description	Row	2017	2018	2019	2020	2021
Revenues from sold goods	1	0	0	0	0	0
Expenses on sold goods	2	0	0	0	0	0
(+) Sale margin (r. 01 - 02)	3	0	0	0	0	0
Production	4	871,380	896,760	922,140	947,520	972,900
Production consumption	5	225,767	232,342	238,917	245,492	252,067
(+) Added value (r. 03 + 04 - 05)	6	645,613	664,418	683,223	702,028	720,833
Personnel expenses	7	225,000	225,000	225,000	225,000	225,000
Taxes and fees	8	0	0	0	0	0
Depreciation of intangible and tangible assets	9	17,398	23,585	38,435	53,623	42,275
Revenues from disposals of fixed assets and materials	10	0	0	0	0	0
Net book value of disposal fixed assets	11	0	0	0	0	0
Change in operating reserves and adjustments and complex deferred costs ( + / - )	12	0	0	0	0	0
Other operating revenues	13	0	0	0	0	0
Other operating expenses	14	236,844	241,580	246,412	251,340	256,368
Transfer of operating	15	0	0	0	0	0

Table No. 15 – Income statement for next 5 years (in CZK)

revenues						
Transfer of operating	16	0	0	0	0	0
expenses	10	0	0	0	0	0
Operating profit / loss						
[r. 06 - 07 - 08 - 09 + 10 - 11 - (+/-	17	166,371	174,253	173,376	172,065	197,190
12) + 13 - 14 + (-15) - (-16)]						
Revenues from sales of						
securities and ownership	18	0	0	0	0	0
interests						
Sold securities and	10	0	0	0	0	0
ownership interests	19	0	0	0	0	0
Revenues from long-term	20	0	0	0	0	0
financial assets	20	0	0	0	0	0
Revenues from short-term						
financial assets	21	0	0	0	0	0
Expenses associated with	22	0	0	0	0	0
financial assets	22	0	0	0	0	0
Revenues from revaluation	22	0	0	0	0	0
of securities and derivatives	23	0	0	0	0	0
Cost of revaluation of	24	0	0	0	0	0
securities and derivatives	24	0	0	0	0	0
Change in financial reserves	25	0	0	0	0	0
and adjustments ( + / - )	25	0	0	0	0	0
Interest revenues	26	0	0	0	0	0
Interest expenses	27	0	0	0	0	0
Other financial revenues	28	0	0	0	0	0
Other financial expenses	29	0	0	0	0	0
Transfer of financial	20	0	0	0	0	0
revenues	30	0	0	0	0	0

31	0	0	0	0	0
	-				-
32	0	0	0	0	0
33	24,956	26,138	26,006	25.810	29,579
	,	- 7			
34	141,415	148,115	147,370	146,255	167,611
35	0	0	0	0	0
36	0	0	0	0	0
27	0	0	0	0	0
57	0	0	0	0	0
38	0	0	0	0	0
20	0	0	0	0	0
39	0	0	0	0	0
40	141,415	148,115	147,370	146,255	167,611
<b>/1</b>	166 271	174 252	172 27(	172 045	107 100
41	100,3/1	1/4,233	1/3,3/0	1/2,005	197,190
	32 33 <b>34</b> 35 36 37 38 39	32 0   32 0   33 24,956   34 141,415   35 0   36 0   37 0   38 0   39 0   40 141,415	32 0 0   32 0 0   33 24,956 26,138   34 141,415 148,115   35 0 0   36 0 0   37 0 0   38 0 0   39 0 0   40 141,415 148,115	32 0 0 0   32 0 0 0   33 24,956 26,138 26,006   34 141,415 148,115 147,370   35 0 0 0   36 0 0 0   37 0 0 0   38 0 0 0   39 0 0 0   40 141,415 148,115 147,370	32 $0$ $0$ $0$ $0$ $32$ $0$ $0$ $0$ $0$ $33$ $24,956$ $26,138$ $26,006$ $25,810$ $34$ $141,415$ $148,115$ $147,370$ $146,255$ $35$ $0$ $0$ $0$ $0$ $36$ $0$ $0$ $0$ $0$ $37$ $0$ $0$ $0$ $0$ $38$ $0$ $0$ $0$ $0$ $39$ $0$ $0$ $0$ $0$ $40$ $141,415$ $148,115$ $147,370$ $146,255$

	2017	2018	2019	2020	2021
TOTAL ASSETS	435,407	532,428	731,942	878,001	1,049,381
Receivables from subscriptions	0	0	0	0	0
Fixed assets	82,922	59,407	155,972	102,349	60,074
Intangible fixed assets	0	0	0	0	0
Tangible fixed assets	82,992	59,407	155,972	102,349	60,074
Long-term financial assets	0	0	0	0	0
Current assets	352,415	473,021	575,970	775,652	989,307
Inventory	73,500	77,175	81,033	85,084	89,338
Long-term receivables	0	0	0	0	0
Short-term receivables	0	0	0	0	0
Short-term financial assets	278,915	395,846	494,937	690,568	899,969
Accruals	0	0	0	0	0
TOTAL LIABILITIES	435,407	532,428	731,942	878,001	1,049,381
Equity	410,451	558,566			
	-	550,500	705,936	852,191	1,019,802
Registered capital	109,500	109,500	705,936	852,191 109,500	1,019,802 109,500
Registered capital Capital funds					
	109,500	109,500	109,500	109,500	109,500
Capital funds	109,500 0	109,500 0	109,500 0	109,500 0	109,500 0
Capital funds Funds from earnings Profit/loss from previous	109,500 0 0	109,500 0 0	109,500 0 0	109,500 0 0	109,500 0 0
Capital funds Funds from earnings Profit/loss from previous year Profit/loss from current year	109,500 0 0 159,536	109,500 0 0 300,951	109,500 0 0 449,066	109,500 0 0 596,436	109,500 0 0 742,691
Capital funds Funds from earnings Profit/loss from previous year Profit/loss from current year (+/-) Decided on advance for	109,500 0 0 159,536 141,415	109,500 0 300,951 148,115	109,500 0 449,066 147,370	109,500 0 596,436 146,255	109,500 0 742,691 167,611

Table No. 16 – Balance sheet for next 5 years (in CZK)

Long-term payables	0	0	0	0	0
Short-term payables	24,956	26,138	26,006	25,810	29,579
Bank loans and financial accommodations	0	0	0	0	0
Accruals	0	0	0	0	0

Tangible assets were reduced with the value of depreciation (Table No. 13). Inventories were set based on sales, which have an estimated growth of 15%. The short term finance assets still include the bank account and cash. The capital is expected at a constant rate of CZK 109,500. Given that the company does not expect any high value acquisitions, the bank account will have a high balance. The short term liabilities will still include only taxes.

# 4.6 Risk evaluation

Business involves certain risks, some may affect others will not. Every entrepreneur should, when starting a business, assume all individual risk situations that could happen in the course of business and determine any special measures to mitigate the negative impact that it may occur.

Table No. 17 – Risk evaluatio
-------------------------------

Risk factor	Measures
Overvalued business plan	Improvement of the business plan,
	consultation with an independent
	consultant.
Competitors	Flexible response to changes in customer
	requirements, new products, new pricing
	policy
Low number of customers	Focus on promotion (advertising on the
	radio, social media, food magazines)
	guaranty of high quality goods and

	services.
Lack of interest in products	Give samples in presentations, tastings and workshops
Supply shortages	Obtain information about suppliers (reviews on websites), creating a sufficient portfolio of trusted vendors, well organized inventory.
Distorted estimate of costs	Creation of financial reserves by reducing the paid profit shares.

Those risks could or could not occur. It is certainly a better option to be always ready to confront them and grant them sufficient attention. The analysis can create a prevention plan to ensure the success of the business.

#### **5** Results and recommendation

The first part of the analysis was to analyse both, external and internal environments. Market research was carried out in the form of surveys. A total of 15 questions were answered by 300 randomly selected respondents, from which 35 were men and 265 women. Most of the respondents aged 15 - 35 years old. Mostly of them are employed people or students, from them 177 buy pralines several times a year meanwhile, 71 respondents buy pralines several times a month. 132 of the respondents are willing to pay CZK 10 - 15 per piece of praline; and 113 people are willing to pay CZK 15 - 20. Most respondents buy chocolates for dessert or as a gift.

The SWOT analysis indicates that the strength of the company relies on the original product that is offered. It is possible to adapt it to new trends, handmade quality production and delivery across the Czech Republic is a plus. The great weakness is that a new company has a minimum reputation and a limited production capacity. Another weak point is the high price, which is not proportional to the quality of the product. Now, the opportunities are to expand the services offered, and the biggest threat to the company may be a lack of interest, low number of customers, rising of food prices and new competition.

There was also a marketing mix analysis. The main products of the company are truffles, but there are also other chocolate products and other services associated with the Pralikárna, e.g. courses at Chefparade. The prices of all products are based on cost-oriented methods, combined with the method-oriented competition. Distribution will be through direct sale and through intermediaries in the market, B2C. Promotion is a very important element of the marketing mix, especially during the beginning of the business and in its course. Social networks, a website and participation at food events are the chosen marketing tools.

There was also a marketing mix analysis. The main products of the company are truffles, but there are also other chocolate products and other services associated with the Pralikárna, e.g. courses at Chefparade. The prices of all products are based on cost-oriented methods, combined with the method-oriented competition. Distribution will be through direct sale and through intermediaries in the market, B2C. Promotion is a very important element of the marketing mix, especially during the beginning of the business and in its course. Social networks, a website and participation at food events are the chosen marketing tools.

The financial plan includes the opening balance, predicted revenues, projected costs and projected earnings. Revenues are predicted in three scenarios - realistic, optimistic and pessimistic. The determination of income is based on the market research. Revenues and expenses are calculated in all three variants, and all of them turn back positive figures.

Financial analysis plays in the feasibility study major role. In a study Pralinkárna was compiled projected balance sheet and profit and loss after the first year. From the reports, it is possible to see a profit for the current period, which is in the amount of CZK 159,536. The following statement - Cash flow shows an overall finances flow in the company. In this case, the total cash flow consists only of cash flow from operating activities, which reached CZK 158,300.

Greatly important point for the company is breakeven point. This was calculated for multiproduct and its break occurs when amount of 50,611 units sold pralines. The last part of the financial analysis is financial indicators. Net working capital is estimated in the amount of CZK 223,646. The results of liquidity indicators are above the recommended values. This is caused by almost zero liabilities. For the company it is very positive solvency. On the other hand leads to less efficient use of financial resources. The results of profitability indicators are at very high levels. ROA and ROE shows the results of over 50%. ROS is in the range the recommended values are 2% - 50%. Because this is a newly established company, which has almost no liabilities and no comparison with the competition is very difficult to interpret the results ratios.

#### 6 Conclusion

The aim of this thesis was to convert a business idea into a business plan that will serve as the foundation for the establishment of a chocolate manufacturer.

A business plan for a chocolate manufacture has been created and it includes all necessary parts regarding the nature and the field of business. The market research was conducted in a form of survey using questionnaires in order to obtain valuable information from potential customers, the results of this survey were analysed and presented in the practical part using charts.

A key benefit, which Pralinkárna would like to offer to its customers, is to original product and capturing the best value for customers. According to the business plan that has been created establishing such a type of manufacture would be a good business as it would provide a source of income.

The breakeven point for the company will be when it achieves higher revenues than the initial costs. The expected financial situation over the next 5 years indicates a long-term outlook, which may now be distorted by unexpected expenses or fluctuations on revenue. As in all business endeavours, there are many risks involved and many hardships to be faced but risks have been examined in review. Based on the financial analysis, consisted in ratios, it has been found that the company will achieve its goals, and therefore it can be a successful company.

The general recommendation will be to increase the commitments while reducing current financial assets. Company adjustments and variants will always occur during a start-up business. An increase in commitments while reducing financial assets would be one. Also the company must plan to expand production and for this to happen it must count with additional capital equipment. It's also useful to have a fail-safe savings account in case the company needs it and that way have financial security.

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#### 8 List of appendices

Appendix No. 01 - Guidelines for Shipment of Cocoa Beans

Appendix No. 02 - Global production of cocoa

Appendix No. 03 - Questionnaire

Appendix No. 04 - Scale of products

**Appendix No. 01 - Guidelines for Shipment of Cocoa Beans** 

# THE COCOA MERCHANTS' ASSOCIATION OF AMERICA, INC.



# STANDARD GUIDELINES FOR SHIPMENT OF COCOA BEANS IN CONTAINERS

INCLUDES ALL AMENDMENTS APPROVED BY THE BOARD OF DIRECTORS December 13, 2012

### STANDARD GUIDELINES FOR SHIPMENT OF COCOA BEANS IN CONTAINERS

Includes all amendments approved by the Board of Directors December 13, 2012

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# THE COCOA MERCHANTS' ASSOCIATION OF AMERICA, INC.

# STANDARD GUIDELINES FOR SHIPMENT OF COCOA BEANS

**IN CONTAINERS** 

#### <u>PURPOSE</u>

The purpose of these guidelines is to suggest measures and methods to be followed to minimize damage and deterioration when cocoa beans are shipped in ocean containers.

#### **NEED FOR THESE GUIDELINES**

Cocoa beans characteristically have a propensity to develop condensation and to re-absorb moisture, and to become easily infested while in transit.

Experience has shown that the break-bulk method of ocean transport of cocoa beans responds best to this hygroscopic feature of cocoa. Consequently, the Association's standard c.i.f. and c. & f. contracts prohibit shipment of cocoa beans in containers unless the buyer's prior explicit permission is obtained.

The problems associated with condensation and infestation can generally be controlled when certain elementary rules are observed. By following the guidelines as set out below, the likelihood of damage in transit is greatly reduced. Nevertheless, it should be noted that extraordinary conditions may still be at play under certain circumstances which may render some of these measures less effective.

#### PREPARATION OF BEANS BEFORE THE CONTAINER IS STUFFED

Cocoa beans should conform to the exporting country's grading standards, except that the moisture contents should not exceed 7.0%. They should be reasonably free of foreign matter and be packed in new jute, sisal, burlap or spun-weave polypropylene bags of a weave tight enough to withstand handling and sampling by trier. The bags should be marked in English with the content ("cocoa beans"), net and gross weight in kilo, and the country of origin, as provided by law, plus the usual commercial markings as to lot number, name of shipper and place of business. All markings should be in compliance with all U.S. government regulations.

Holes in the bags caused by the sampling trier should be repaired to prevent the spillage of beans.

Cocoa must be free of live infestation.

#### **CHOICE OF CONTAINER**

If permission to ship beans in containers has been obtained from the buyer, the shipper should request that the carrier provided a container meeting the following specifications:

- 1) It should be in good repair, structurally sound with no holes, broom clean, and free of moist and stained areas, foreign odors and insect and rodent infestations;
- 2) It should be ventilated, when accessible.
  - a) If ventilation is provided through natural thermodynamics, the vent openings should be constructed in such a way that rain or sea spray cannot enter the inside of the container. The shipper should make sure that the vents are in good repair and not obstructed or rusted shut.
  - b) If ventilation is provided through the application of an outside energy source, such as the ship's own power supply, solar cells, or similar features, the shipper should obtain a written assurance from the carrier that the power supply will be provided during all stages during transit, and particularly when the container awaits a vessel at portside at origin or after unloading from the vessel at destination before stripping.

3) Because of lack of equipment or cooperation of the carriers, shippers may be left with no alternative but to accept non-ventilated containers for the transport of cocoa beans. The shipper should make every reasonable effort to obtain ventilated containers. If these efforts are not successful, it is <u>essential</u> that kraft dunnage or a food grade moisture absorbent device, such as dry sacks or silica gel lining and covering be used.

Moreover, the containers should be sealed with an "expansion seal," i.e. a device which maintains the integrity of the original seal but allows the opening of the container's tailgate sufficiently widely to allow ventilation during transit.

#### PREPARATION AND STUFFING OF THE CONTAINER

The inside of the container should be lined with kraft paper or similar absorbent material. The deck should be covered with kraft dunnage or wooden pallets. If pallets are used, they must meet the following requirements:

- Wood packing materials should be consistent with the International Plant Protection Convention standard ISPM #15 and should be labeled with the IPPC logo.
- They should be clean of all rodent or other filth and of previous cargo.
- They should not have been used to carry chemicals or other materials giving off strong odors, such as rubber, fertilizers, etc.
- They should not be insect infested.
- They should conform to all pesticide and other residue requirements set forth by the U.S. Government.
- They should be dry (i.e., not green wood).

The same criteria apply if wooden slats are used as dunning in lieu of pallets.

The bags should be securely piled against the container's bulkheads to prevent shifting in transit, and the top layer should be covered with a sheet of kraft paper. Great care should be taken that no cargo touches any metal parts of the container, as experience has shown that condensation is much heavier on and around these metal parts and tends to stain the bags. Moreover, during the cold season the bags tend to freeze to these metal parts, leading to tears and spillage when the containers are stripped at destination.

Sufficient air space between the top layer of the bags and the container's overhead bulkhead should be provided, and vents should not be obstructed by the cargo.

20 foot standard C.I.T. Dimension containers should be loaded with not more than 18 metric tons gross product weight, including dunnage. 40 foot containers should not exceed 26.25 metric tons gross product weight, including dunnage.

If there is live infestation present, the container should be fumigated with preferably Phostoxin before being loaded on board the vessel.

Stuffed containers should not have to wait for more than one day or so for the arrival of and loading on board the vessel. If the container is carried on deck, it should be protected from sea spray and rain; if carried below deck, there should be sufficient air flow in the hold to maintain ventilation.

#### DISCHARGE AND STRIPPING OF CONTAINER

It is most important that containers are moved to the stripping location contractually obligated as outlined in the CMAA contracts, and be stripped without delay after arrival, as the danger of excessive condensation is greatest after the container has been discharged and is waiting on the pier to be moved and stripped.

#### TRANSIT TIME AT PIER

Great care should be taken that containers stuffed with cocoa beans should not be allowed to stand exposed to sunlight for long periods of time at either loading or discharge port. Moreover, containers arriving from origin at destination in a moderate climate zone during the winter should either be stripped immediately upon discharge from the vessel or transported to a sheltered indoor area, to prevent rapid drops of the temperature in the interior of the container and the formation of condensation.

#### Appendix No. 02 - Global production of cocoa

	Pro	duction of cocoa beans	<b>s</b> (thousand tonnes)	
	2012/13	Estimates	Forecasts	
		2013/14	2014/15	
Africa	2836	3198	2978	
Cameroon	225	211	230	
Côte d'Ivoire	1449	1746	1750	
Ghana	835	897	696	
Nigeria	238	248	210	
Others	89	96	93	
America	622	722	744	
Brazil	185	228	230	
Ecuador	192	234	250	
Others	246	260	264	
Asia & Oceania	487	450	435	
Indonesia	410	375	350	
Papua New Guinea	41	36	42	
Others	36	39	43	
World total	3945	4370	4158	

#### Appendix No. 03 – Questionnaire

#### Good morning,

Please take 5 minutes of your time filling out the following questionnaire. This is a survey for Pralinkárna, a new chocolatier with a new vision on truffles. Pralines are made of high quality Italian and Belgian chocolates and are filled with new and original flavors.

#### 1. How often do you buy truffles or chocolates?

- Several times a week
- o Several times a month
- Several times a year
- I do not buy at all
- 2. What brand you buy more often?
- Open question
- 3. Do you think that truffles are better as:
- o Dessert
- o Gift
- o Both
- 4. Do you think that pancakes for dessert should be served in:
- o Confectioners / cafés
- o Hotels
- o Restaurants
- o Celebrations and parties
- 5. Would you like a cup of coffee with:
- o Dessert
- o Pralines (dessert)
- 5. How much would you be willing to pay for pralines?
- o less than CZK 10
- o CZK 10 15
- o CZK 15 20
- o CZK 20 or more
- 6. How much would you be willing pay for 12 pieces of chocolate truffles?
- o Less than CZK 100
- o CZK 100 200
- o CZK 200 300
- o CZK 300 or more
- 7. How much would you be willing to pay for 25 pieces of chocolate truffles?
- o Less than CZK 300
- o CZK 300 400
- o CZK 400 500
- o CZK 500 or more

- 8. Have you ever bought chocolates on-line?
- o Yes
- o No
- 9. What influences your decision when buying chocolate products?
- o References
- o Advertising
- o Attractiveness of packaging
- o Materials
- o Quality
- o Price
- o Availability
- o Manufacturer
- o Brand

#### 10. What kind of chocolate do you prefer?

- o Dark 70% cocoa or more
- o Dark 50-70% cocoa
- o Milk-chocolate
- White chocolate

#### 11. Gender:

- o Male
- o Female

#### 12. Which groups represent your age?

- o Under 15 years old
- o 15-25 years old
- o 25-35 years old
- o 35-45 years old
- o 45-55 years old
- o Over 55 years old

#### 13. What's your primary occupation?

- o Student
- o Employee
- o Businessman
- o Retiree
- o Unemployed

#### 14. What's your favorite flavor of truffles?

o Open question

#### Appendix No. 04 – Scale of products

Pralines (mould)					
Fillings	Dark 73% chocolate	White 34% chocolate	Milk 36% chocolate	Weight	Price (in CZK)
Marzipan	YES	NO	NO	10g	15
Milk ganache with amaretto	YES	NO	NO	10g	15
Dark ganache with orange	YES	NO	NO	10g	15
Gianduia (nougat)	YES	YES	YES	10g	15
Caramel	YES	NO	NO	10g	15
Dark ganache with chilli	YES	NO	NO	10g	15
Dark ganache with coffee	YES	YES	YES	10g	15
Dark ganache with cherry and slivovice	YES	NO	NO	10g	15
Milk ganache with maracuja	YES	NO	YES	10g	15
Milk ganache with rapsberry	YES	YES	YES	10g	15
White ganache with sencha and matcha tea	YES	YES	NO	10g	15
Milk ganache with vanilla	YES	NO	YES	10g	15
Milk gianduia with caramelised nut	YES	NO	YES	11g	15
Dark ganache with Grand Marnier	YES	NO	YES	15g	15

Truffles					
Filling	Shell	Weight	Price (in CZK)		
Milk ganache	original cacao 20/22 and slice of almond	12g	15		
Milk ganache with amaretto	original cacao 20/22	12g	15		
Milk ganache	cinnamon	12g	15		
Dark ganache with lavender	white chocolate 34%	12g	15		
Milk ganache with tandoori spicy	originak cocoa 20/22 and tandoori spicy	12g	15		
Dark ganache with gingerbread spicy	White chocolate 34% and gingerbread spicy	12g	15		
Milk ganache with pistachio	Dark chocolate 73% and pistachio	12g	15		
Milk ganache	Coconut	12g	15		

Chocolate bar					
Type of choolate	Size	Weight	Price (in CZK)	Decor	
Dark chocolate 73%	10x10	90g	55		
Dark chocolate 80% - Blend (Uganda 50%/Ghana 50%)	10x10	90g	75	nuts (almonds, hazelnuts calibrated, crushed pistachios, walnuts,	
Milk chocolate 36% - Single origin Ecuador	10x10	90g	55	pecans), fruits (raspberry strawberry, banana), spices (chilli, Himalayan salt), cocoa beans,	
White chocolate 34%	10x10	90g	55	coconut	