CHAPTER 11 – ORGANIZATION

BEKAY BRUSH (Rajkot, Gujarat)

11.1 - Overview
This is known as one of the oldest brush paint company since 50 years in the Saurashtra market have established in 1977 their fits in the ground of paint industry and have been the leading brand in the market of Saurashtra.

Philosophy of company

Bekay brush as developed unique culture among the wholesalers and corporate to work with the ethical practices and to develop a healthy relationship for an effective working environment between the customers and dealers. The value of the company is position by drawing limits for the wholesalers or distributors to define their positions in the market from starting point of decision making process to the marketing of the product in the Saurashtra market. The equality amongst the distributors by giving them equal chances to prove their marketing abilities and creating a corporate culture is the prime motive of Bekay brush.
Determination Of Bekay Brush :-

Bekay brush concentrates on benefiting small businesses by providing them their chances for developing a focus culture of enhance in their products in different areas of Saurashtra where there are opportunities to develop a strong brand image and can get a primary benefit for developing a long lasting relationship between the dealers and distributors.

The corporate philosophy also helps to implement the strength of Bekay brush by solving the problems of the customers at every business level so they can achieve the best quality and for the distributors they can achieve the best services available from the company side.

Background of Bekay brush

Since the company has developed its position from many years, the primary objective of this company is to give the best quality products to the customers at affordable prices as compared to the other players in the market. The company is also been successful in developing confidence in the minds of the dealers and customers regarding the quality of the brush and along with services for the best possible outcomes. Bekay brush as develop its presence professionally by managing to provide new products that can stand in the market of Saurashtra by satisfying the needs of the customers finding innovative in the range of their budget.

Mission and principal of Bekay brush

The main focus of the company is to provide high quality of products and services for the actual work of the brush for which it is known. The goal of the company used to establish its brand in such a way that it becomes the provider of best commercial and residential application brush having the finish quality of work with multiple abilities of applying on the surface of the walls and thus in this manner it can develop a healthy relationship with the clients for operating on long-term business goal.

The main criteria of the Bekay brush is to provide timely based services to the dealers and customers at professional levels so that they can experience the practical scenario of the company basic grounds for achieving the trust of the customers and loyalty towards the brand.

11.2 - Long term relationship figure
• To create a strong distribution Network and healthy relationship environment in the regional market so that the flow of supply and demand of Brush can be done at regular interval of time.

• To established the satisfaction level of the customers by demanding various professional services which are having the capacity to develop the reasonable profits to the dealers and retailers.

• To consider the retailers and business partners on the equal level of policies by maintaining their position in the company.

• By creating the value of the company for delivering the best possible service in every manner for developing the operating business against the competitors in the market of Saurashtra region.

11.2.1 - Distribution network
The place where products are made available for the customers and company activities is known as distribution or placement.

The marketing channels have been used for this purpose in which the final goods are made available in the placement process to the end customers. This place is also considered to be the independent organisation which is involved in the process making of a product and services that are available for the use of the business as well as the consumption point for the customers.

The distribution network is divided for every region and territories for the Regional Sales Manager allocated for that particular area.
11.3 - Products of Bekay brush

To provide the best quality of brushes for the various conditions in the Saurashtra market, different qualities of brushes are introduced by company to achieve the perspective of covering all territories of Saurashtra region under one roof.

A 1 brush (blue handle) :-

this quality is introduced for the interior paints of work which are available in all sizes. These are specific type of brush have longer length of filaments of black colour for the market of jetpur and kalavad cities.

A2 brush (black handle) :-
this quality of brush is introduced for decorating the interiors of the houses which are available in two different sizes that are 3 inch and 4 inch. These are the specific type of Brush which have medium length of filaments of creamish color and contains the high quality of fibres. They over the market of Bhavnagar and Jamnagar and nearby cities.

**B1 brush (dark green handle) : -**

this quality of Brush is introduced for interior decorative Paints purposes and is available mainly for 1 inch and 2 inch of size which is mainly for the small surfaces on the interior walls for smooth function of paint. These are available in creamish colour mainly covering the market of Rajkot, dhoraji, upleta and have top quality of bristles of long length as compared to other brushes.

**BK 10 brush (red handle) : -**

this quality of brush is mainly introduced for the exterior painting on the walls of the houses. These are available in all different sizes but mainly the sales are in 4 inches and 5 inches. This is available in creamish colour of filaments which mainly covers the market of Gondal, dhoraji and Junagadh cities.

**BK 60 brush (red handle) : -**

these are the long length brushes which are mainly used for the exterior paint purpose and are available in only 2 sizes that are 4.5 inches and 5 inches. Is covers the market of construction sites and real estate projects where large surfaces are needed to be painted quickly.
**Best brush (black handle)**:

This quality of brush is mainly used for the interior purposes and is available in three different sizes that are 2 inches, 3 inches and 4 inches. They are the mixture of white and black colour filaments of medium range of quality covering the small cities of Saurashtra at reasonable prices.

**C1 brush (yellow handle)**:

This quality of brush is mainly available for the interior application of painting in Saurashtra market and is available in all sizes. Jay contains only black coloured filaments of higher quality having tapered shape and covers mainly the market of Rajkot, morbi, metoda, kalavad, junagadh, Shapar, etc.

**C + 1 brush (yellow handle)**:

This quality of Brush is mainly available for the interior purposes and is available at all different sizes from 1/2 inch to 4 inches. This brush contains the high quality of filaments of black colour and greenish colour mixture which the tapering advantage and are covering the market of Rajkot, morbi, dhoraji, Gondal, upleta, Shapar, padadhari, etc.

**C2 brush (yellow handle)**:

This quality of Brush is mainly available for the interior decorations in the Saurashtra market and is available in two different sizes mainly 3 inch and 4 inches. This type of
Brush is introduced mainly to cover the market of Jetpur, Gondal, chotila, Bhavnagar, metoda, kalavad, etc.

**KB brush (black handle) :-**

This type of Brush are introduced for the rural Markets and semi urban areas of the Saurashtra region who are price sensitive and mainly low quality of tapered filaments. They are available in different sizes of 3 inches, 3.5 inches and 4 inches for covering the market of chotila, sayla, and other small centers.
11.4 - SWOT ANALYSIS

Strength
Image of brand and quality
Excellent marketing strategies
Credit terms
Skilled labour work

Weakness
The slack in off seasons
GST tax structure

Opportunities
Need of quality for Saurashtra
Different formulations possible

Threat
Foreign players entering into local market
Competitive prices
11.5 - Raw materials

For regular brushes long hair big bristles or either of animal hairs mostly of horse, cow simply referred as bristles are often used. For fine art of brushes which are mainly used in the foreign countries the natural animals such as squirrel goat or horse hairs are used as Natural bristles which are higher in cost as compared to the other filaments. For the expensive quality of brushes the animal hair of sable or mongoose are used for the fine art of work which are generally handmade and of smaller size in length. If we conclude about the synthetic filaments which are produced by the extrusion process in which the mixtures of pet and pbt are grinded at the standard ratio and melted at 140 degree Celsius of temperature which is further allowed to passed by tiny holes of the dye and fall in the water at certain temperature which cools down the filaments which is for the stretched by the rollers attached with the machine and again passed from cold water so that the filament takes the shape and then again stretched by another sets of rollers which can be helpful for bringing the filaments at the desired size and then the output is gathered in the form of large winders which are kept at cold temperature to maintain the strength and stiffness in the filaments and to avoid the moisture formation on them.

The raw materials used for the synthetic filaments are mainly petroleum products and can be easily available from anywhere in this Saurashtra market at different qualities in the form of granules or flex. There are different types of filaments available in the synthetic market at different size in different cost which makes available to the painter for buying best quality of brush which is comfortable as well as affordable to the owner of the house, factory or other places where the paint is to be done.

11.5.1 - Inputs of raw materials of paint brush.

The basic raw material required for the brush is the bristles data natural hairs of the animals such as hog or pig and filaments which are known as the synthetic extrusion grade plastic thin threads. In today's period the major raw material used is filaments or synthetic filaments which are produced by melting Pet and Pbt a petroleum products to be the base of the performance of the paint brush.
Unlike Paints, the filaments are manufactured within the boundary of India which decreases the overall price of the brush due to the reduction in the import prices and other services needed is the part of the manufacturing process. Due to this the question of scarcity of raw materials does not arises which helps the company to produce more off the paint brush which can smooth the flow of supply and demand affecting the overall growth of the company.

**Synthetic filaments** can be made of many different shapes for different purposes but mainly two Types of shapes are widely used that is solid Shape and hollow shape. The solid shapes elements are mainly used for the household purpose which gives the longest life and also can be cleaned up easily as compared to the hollow filaments. The hollow filaments are difficult to clean but are inexpensive and also give good performance in the artistic work like drawing and fine painting jobs. The people in the Saurashtra region are still unaware of the fact that most of the brushes are made from synthetic filaments and not from work bristles but the manufacturers gives the shape and colour similar to the natural bristles for computing in the market of the paint industry. The natural bristles can work at its best with oil based Paints while the water based Paints search as latex can perform better with the synthetic filaments.

The handles of the paint brush can be made either of wood or plastic according to the quality of the brush. The preference of the Painters differs according to the areas.
of Saurashtra region. The professional Painters likes the feel of specific type of materials of handles, the Painters in rural areas of Saurashtra prefers wood handles while that of metro cities propose plastic handles. The epoxy which is used to fix the filaments with the ferrule has two types of glue mixing process out of which one part consists of a catalyst while the other part acts as the clearing Agent within the metal band. The same size of plug as of the brush made of either wood or cardboard which is attached in the middle of the filaments in the brush head which is pushed by hands within the ferrule. It is necessary to insert the plug so that it allows the brush filaments to hold the paint for a reservoir when it is dipped in the paint so that the paint can flow to the brush tips and work can be done easily.

11.5.2 - Sources of the bristles
The largest producer of bristles in all around the world or United State standing at number one position and all other regions are dependent on them for the imports of bristles. This is mainly due to the culture of the United States and the need of the people that demand all kinds of business resources to be collectively gathered from different nations around the world and then processing it to serve better than anyone else.

But looking at the cultural differences of United State produces more pigs than any other country then there are two major criteria or reasons for this situation. The very first reason stands in the way is that they develop the swine as the source of food for the people then for the plucking of hairs from their skin before it is 10 months old and thus the best quality can be obtained for different sizes and soft quality.

The second main reason is that in India and many countries the using of animals for generating their livelihood and by making harm to them is not allowed and so most of the countries have to import from foreign sources in order to satisfy the demand of bristles to their customers.

11.6 - Defining Inputs
What is PBT?
The common name for polybutylene terephthalate is PBT generally closely related to thermoplastics and has no strength as compared to pet but better resistance and is therefore considered as next level of pet. In compared to nylon PBT provides similar properties but in wet applications it has the tendency to hold and recover its stiffness but at the same time absorbs very little water. It is also considered to be economical as compared to nylon and due to higher abrasion resistance it is used in most of the applications. At high temperatures it reacts to the good resistance of oxidation and also has bend recovery higher than pet. It is also considered to be having resistance against UV radiations so it is mostly used in Paint brushes where higher temperatures can be managed by the filaments of pbt.

What is PET?
The common name for polyethylene terephthalate is pet. It is the most common thermoplastic polymer mainly used in the manufacturing of fibres, containers, packaging strips, etc. which is an excellent water repellent and made from crushing plastic bottles of soft drinks or others.

PBT as compared to nylon
the durability, softness and elasticity of PBT has noticeable advantage than that of Nylon. The ability to maintain its stiffness and bend recovery also provides additional benefits similar to nylon. It can be used in most of the applications of dry and wet conditions due to its ability to absorb very less water than nylon and can sustain its stiffness. The absorption rate of Nylon when saturated in water for 24 hours it is near 3 % while that of PBT absorbs 0.2% of water.

11.7 - The manufacturing process
This process explains the making of paint brush described by the consumers of natural bristles as well as synthetic filaments
11.7.1 - Making of filaments
The filaments are produced extrusion process in which the blend of pet and pbt granules or flakes are mixed at certain ratio and father melted at 120 to 140 degree Celsius in a grinder.

![Extrusion Process](image)

(Source is :- what is plastic.com)
after which it is allowed to pass from the dye made up of tiny holes and also falls thereafter in the cooling tank of 35 to 40 degree Celsius so that the filament can take the shape of a thread which is further stretched by the rollers attached with the extrusion machine and again passed through cold water so that the filaments can attain the flexibility and stiffness and again stretched by the set of rollers which is then passed through another cooling tank which helps to maintain the desired size and strength of the filaments. After this process the filaments are kept at certain temperature so that they can maintain their properties and then they are cut to the available sizes.

11.7.2 - Mixing the filaments
After the filaments are made, they are cut into small sizes of bundles and brought to the factory or household place where they can be stored. Each bundles are
separated by different sizes of various lengths and mixed according to the need of the customers.

In Saurashtra region most of the companies make the mixing process available by giving contracts to the household workers by number of pieces of brush to be made of different qualities as well as size. Some of the companies with higher financial background also uses mixing machine which has a series of runner belts that is aligned in the same direction of the mixing machine and there are steel rods attach with each compartment that moves backward and forward folding the bristles and filaments and shuffling them with one another. The machine works as the filaments drops of the belt and stays on top of another belt which the same set of bristles which are to be mixed and Falls on the top of another set of bristles or filaments until the mixture is completely ready to be filled in the brushes. This process takes less time but its costly then the handmade mixing.

**11.7.3 - Adding the mixture into ferrule**

After the mixing process the ready filaments are then organised into the brush head at the bottom of which the metal ferrule of an oval shape which helps to attach and hide the attachment of the filaments to the brush. The amount of brush to be held in one ferrule depends on the size of the brush as well as demand of its thickness in the market.

**11.7.4 - Adding the plug**

As for Saurashtra region, most of the Assembly process is done by manmade instead of machinery work to reduce the cost and get some employment work for the
people. The bristle and ferrule when fixed with one another considering the needed size of the customers the plug is inserted between the filaments of the same size of the ferrule but can be off wood or cardboard convenient to the worker. However the wood plug is more preferable as it holds the filaments tightly.

11.7.5 - Epoxing the filaments
In this stage the worker inserts and epoxy at the butt end of the ferrule by hand and then if required a second layer is varnished on it and then it is kept inverted so that it helps to bond tightly the plug and ferrule together and then kept aside to dry.

11.7.6 - Finishing the filaments
After finishing the process of making the brush head and fixing it with the epoxy, then this stage will be done of finishing the filaments. It denotes of cleaning the hairs which are separated from the epoxy and loose hair which are cleaned by the workers. The brush head tipping is also done and are slightly feathered in order to make it able to pick up paint more easily and spread them in the corners so that the finer brush tips can paint with fewer brush strokes. The tapering can be done by allowing the tip of the brush to rush on the sand wheel so that it split the ends and can be used for tapering. At this stage the brush is allowed to dry for few hours and then the branding of the brush is mentioned on the ferrule with the size generally in mm for Saurashtra region.
11.7.7 - The handles
Most of the manufacturers in Saurashtra by the readymade handles from the north Indian cities like Sherkot, Dhampur, Delhi and Kanpur as the size can be commonly available from all areas according to the need of the customers. Some of the manufacturers weight gain handles somewhere in the plant and process them to the brush making unit. General terms the high quality brushes I expected to have plastic handles which have been molded by injection method at certain shade used in the Saurashtra region, but otherwise the handles are of wood and regular acrylic or latex paint is done on them for better grip.

Fixing the handles
After the drying of the brush heads they are stand up on one another and one by one the handles are attached to them according to the size and then by machine or by hand they are nailed forcefully with the ferrule so that the brush heads can be surely stay with the handle.

11.7.8 - Packaging
The packaging of the brush is done simply by wrapping the plastic of that shape to the brush and tied with rubber band. After this the flap of the company is inserted and a cardboard packaging is done according to the size and length of the brush. As per the demand in the Saurashtra brass market there are many different sizes available for general category of paint brush either interior or exterior starting from 1/2 inch to 5 inch.
Quality control
The quality of the brush differs from company to company. Brush quality is examined in Saurashtra by the quality of the packaging, size of the filaments and the methods in use of construction of materials. The synthetic filaments are also measured by the thickness, tapering methods, as well as the sharpness at the tip of the brush. The main part that defines the quality of the brush is mainly the finishing and particularly mixing of different filaments at certain percentage that gives fine painting on the walls.

11.7.9 - By products
There are dust cleaning of the filaments during the manufacturing process created from mixing the filaments, attaching plastic handles or wooden handles to the ferrules, dust particles of the cardboard or would plug attached to the epoxy, drying of the epoxy which needs to be heated again for better results and low wastage. Most of the parts of the paint brush can be recycled and also reused in future and also it should be taken care that no harmful solvents are used in the paint brush.

11.8 - Characteristics and usage of filaments
The brush not only used for the painting purpose but serves the people in every day to day base work whether it is cleaning, removing of small particles, painting etc. But in general it can be used for two opposite functions either to apply or to remove the materials.

The abrasion action of the fibres decides the removing action depending some part on the flicking effect of the fibres. In painting the brush not only spreads the paint on the walls of the surface but also allows it to hold in the filaments before applying and deciding the area to be covered. The natural fibres data used in order to fulfill the application of the brush are commonly a byproduct of swine which is generally unknown to layman.

The main use of the hairs of the swine is in the application of making paint brush. The purpose for which the bristles are used depends on the characteristics of the row product available in the market of Saurashtra. The first and foremost is the bristles starting from the bottom of the brush head to the outer end of the tips which provides required stiffness and elasticity to the bristles to work accordingly to the need of the Painters. The durability of the brush also increases while using tapered
filaments which allow the brush to react on the hard surface to reach every corner of the walls and it make sure that the paint floors evenly from butt to tip in its outer end. The flagging is done on the outer side of the tips in order to spread the Paints smoothly on the surfaces which is naturally present in the hog bristles which holds the Paints and other liquids known as split ends at the outer end.

11.8.1 - Preparing filaments for the market
The series of operations undergoes for the bristles when it is pulled from the skin of swine which are preserved at healthy living of state and after which the collected bristles or natural hair are transformed into the bundles due to which it can be used in a brush. Despite of the modern technological era in Paint industry, the manufacturing of Brush till today is done manually in Saurashtra region due to low budget of brush makers in only certain parts having the skilled work. After pulling out the natural bristles from the hog skin it is then the boiling water is poured over to the surface of the bristles in order to get the purity and free from infection if any for further use in the business. Only a small quantity of bristles are obtained from each Hog nearly 1 kg and then it is dried in the sun or automatic ovens for several hours which is then sent to the assemble units.

Financial statements
The below shown graph indicates the financial figure of the company on yearly basis indicating the growth and demand for the time being.
The graph shown in the figure points towards the activities of the brush market sales in the Saurashtra region by calculating two different criteria affecting the profit margins theatre profit before tax and profit after tax.

The below graph indicates the net worth that has been occurred find the formulation of dividing pat with the founder of shareholders. This is how the profitability is
measured by calculating the investment in the company. This also it was the capital risk of the company relating to the productivity criteria.

**Interpretation**

The graph indicates the sales return figure is constantly at the rise of growth from 2013 onwards but due to market slack in the midst of 2015 it came down gradually on constant speed.

**Industrial performance**

In the formulation of paint brush there are different types of inputs platform where the quality of the brush is decided. This major input includes different types of raw materials concentrating on the quality of filaments or bristles which forms 60% of the total cost of making paint brush. This is the main reason in the Rise of the price of filaments as they are directly related to the price of Petroleum oils. So if the price of the crude oil Rises so does the price of the filaments and vice versa.

The profit margins are mainly dependent on the operating cost of the paint brush which is simultaneously related with the price of raw materials affecting the image of the company in the Saurashtra market.
The advantage of the brush manufacturers is that most of the work is done in there in house factory or small room where handful of workers is performing the Assembly work of making the brush. This skill of the workers is developed with the experience of handling different qualities of elements and mixing them together at proper ratio.

**Pricing**

The main ingredient determining the sales of the paint brush is the pricing of the different products of the company which is again dependent on the manufacturing cost of the brush. The company targets of occupying the maximum market territory in the Saurashtra region forgetting equal chances of proving their quality base in the market against the competitors for longer run of business.

Again the price of the raw materials indicates the pricing of the brush because 90% of the raw materials used in today’s market are petroleum products such as pet and pat having higher cost and volume in the manufacturing process.

This also reflex to the disadvantage to the small companies or manufacturers which are not involved in the brush making business and needs some years to establish the skills for understanding the market and the needs of the customers in the Saurashtra region.

Most of the manufacturers are also attracted towards developing the skills of making the brush but the numbers associated with such kind of work are not easily available.
in this Saurashtra region and therefore are hired from Sherkot, Kanpur and other cities of North India.

11.9 - Marketing fundamentals
There are mainly two players ruling the market of Saurashtra in the business of Brush that BK brush and national brush which deeply understands every expects of making the brush at minimum cost and gathering information for the quality markets at different regions so that they can provide the best for their customers. The changing needs of the customers in the brush market also puts the company in dilemma of what to provide and at which market so that the customers can get attracted towards the brand for longer period of time.

Marketing channel has also taken considerable growth in determining the relationship with the customers using the paint brush and the company has linked them directly with the dealers or wholesalers to get in touch on daily basis and understanding the needs of the customers.

11.10 - Technology collaboration
The advancement in the technology for paint brush starting from the extrusion machine for the preparation of filaments to the nailing machine has grown considerably for the betterment of the quality of the paint brush at affordable prices to the Saurashtra customers. The imported filaments have been the major concerns of the Giants companies and so have to be dependent on the top Technology advancement companies for providing them value products at definite time. In today's period the companies like Dupont in Madurai has the advanced technology for manufacturing the cone shaped filaments with excellent Bend recovery and
stiffness to provide the accurate results of painting the walls with minimum effort and time. For example the South brush market is majorly dependent on the filaments of DuPont which is considered to be a trusted quality by the painters and is constantly being compared with other Giants to meet their requirements.

**11.11 - Growth opportunities for foreign companies.**

There is advantage as well as disadvantage for the foreign companies entering into the Saurashtra market of paint brush which are in spite of having use financial backup but are still somewhere on able to touch the minds of the people and their needs. The advantage for the foreign brands is that they can make easily available of the products at the minimum time at every different corners of Saurashtra market due to high level of distribution network but at the same time they face that disadvantage of not knowing the trend of the market and direction of the customers towards the higher quality at cheaper rates which counters the policy of the foreign brands and thus cannot settle their ideas with the local entities.

**11.12 - Selecting of appropriate bristles**

Once reached at the dressing house, different colours sizes and quality of bristles are mixed together. It is then the unwanted particles are removed from the presence and dressing is done by removing the soft and short hair not useful for the brush applications.
11.13 - Rough sorting
Then according to the need of the customers the bristles are separated by colour, size and quality which is then prepared into smaller bundles to be further process.

11.14 - Washing of the bristles
The bundles are then stacked together in a vessel and soaked in water for several days due to the extra fat attached with the skin on the bottom of the bristles and are separated easily after drying under Sun or ovens.

11.15 - Arranging of bristles
The next step is to arrange the exact size of the bristles and then separating them in the form of bundles of different size according to the need of the customers which varies from 1/2 inch to 5 inch in the local Saurashtra market.

11.16 - Finishing process
The arrange bundles are there tired by the cardboard for finishing uniform bundles together and a string is tied along with the but ends of the bristle.

11.17 - Packaging
In the final process the bundles which are wrapped in a paper effect in wooden cases or available to the manufacturer and then are sent to the warehouse of the buyer.