

## 1 CHILLI PICKLE

### 1.1 Introduction

Pickles are very popular across the country and they are regularly consumed by almost all households. Restaurants, dhabas, caterers etc. are bulk consumers. There are many varieties of pickles with certain regional specialities as well. They are generally spicy but some are sweet also. They are table enrichers.

### 1.2 Objective

The primary objective of the model report is to facilitate the entrepreneurs in understanding the importance of setting up unit of chilli pickle. This model report will serve as guidance to the entrepreneurs on starting up such a new project and basic technical knowledge for setting up such a facility.

### 1.3 Raw Material Availability

The main ingredient required is fresh chillies. In Madhya Pradesh the area under chilli production in the year 2004-05 was 47091 hectares whereas the production is around 43000 MT. the major districts producing chillies are Indore, Malkapur Chikli and Elachpur. The main variety grown is g.t. sannam. The main characteristics of the variety are :-

- Red in colour and pungent
- Harvesting season - January to March
- Annual production - 7500 tonnes
- Available in major markets of Madhya Pradesh.

Oleoresin, capsaicin and dihydrocapsaicin contents in different varieties of Indian chillies.

Chilli variety	Grown at	Oleoresin (% w/w)	Capsaicin (% w/w)	Dihydrocapsaicin (% w/w)
Nagahari	Tezpur	15.0	4.28	1.42
Nagahari	Gwalior	9.7	0.45	0.39
Nagajolokia	Gwalior	13.0	1.5	2.50
Pusa sadabahaar	Gwalior	6.15	2.0	3.0

### 1.4 Market Opportunities

There is a large market for chilly pickles all over the country as well as abroad. Chilly pickles could be of different varieties and at times some other ingredients can also be added. The key element would be to know the regional likings and preferences in terms of taste and making some changes periodically to provide novelty to the consumers. It is a mass consumption item and with proper quality, sales network and publicity, it is possible even for a new entrant to capture the market.

## 1.5 Project description

### 1.5.1 Manufacturing process

The process is standardised and very well established. Green chillies are washed in water and then dried under the sunlight. After cutting the top and bottom portion, they are cured in brine solution for 2½ to 3 days. After that, oil, turmeric powder and other suitable ingredients (depending upon local palate) are added and mixed thoroughly and then pickle is packed in bottles and plastic pouches.

## 1.6 Project description

### 1.6.1 Applications

Pickles are important part of the Indian cuisine and are eaten along with main course as well as many food preparations and snacks. They are used as taste enrichers. Chilly pickles are popular across the board and are consumed round the year. It can be made anywhere in the country.

### 1.6.2 Availability of know how and compliances

CFTRI, Mysore, has successfully developed the technology. Compliance with FPO is mandatory.

### 1.6.3 Capacity of the Project

The rated capacity of the chilli pickle unit is 110 Tonnes per year.

## 1.7 Project component and cost

Major components of the projects and their costs are described in the table hereunder:

PARTICULARS	Unit	Qty	Cost/unit	Total
<b>LAND &amp; BUILDING</b>				<b>21.55</b>
Land	SqM	600	250.00	1.50
Land Development				
Land Area		600	500.00	3.00
Building				
Production Block				
Main Production Area	SqM	200	5,000.00	10.00
Store cum packing room & Sales Counter	SqM	50	5,000.00	2.50
Misc Handling Area	SqM	150	2,000.00	3.00
Contingencies		10%		1.55
<b>PLANT &amp; MACHINERY</b>				<b>6.00</b>
Plant & Machinery	LS	1	500,000	5.00
Contingencies		20%		1.00
<b>MISCELLANEOUS FIXED ASSETS</b>				<b>1.80</b>
Misc. Plant and machinery	LS	1	150,000	1.50
Contingencies		20%		0.30
<b>PRE-OPERATIVE EXPENSES</b>				<b>7.10</b>
Establishment		1	450,000	4.50
Professional Charges		1	100,000	1.00
Security Deposits		1	160,000	1.60
<b>TOTAL</b>				<b>36.45</b>

The cost of the various components will depend on the location of the project. Item wise assumptions are as under:

### 1.8 Plant and Machinery

Equipments like pickle storage tanks, stainless steel utensils, food grade plastic jars, bottle capping machine, grinders and weighing scales shall be required. The total cost could be Rs. 6 lakhs.

### 1.9 Building

The main production block will cost around Rs. 17.05 lakhs. The entire building will be divided into three zones – production, storage cum packing room and sales counter and miscellaneous handling area.

### 1.10 Miscellaneous fixed assets

The miscellaneous fixed assets will cost around Rs. 1.80 lakhs.

### 1.11 Pre operative expenses

A provision of Rs. 7.10 lakhs would take care of pre-production expenses like establishment, professional charges, security deposits etc.

### 1.12 Working capital assessment

ITEMS	Year 1	Year 3	Year 5
STOCK OF RAW MATERIAL & PACKING MATERIAL	4.58	5.89	5.89
SUNDRY DEBTORS	13.86	17.82	17.82
TOTAL	18.44	23.71	23.71
MARGIN	4.61	5.93	5.93
MPBF	13.83	17.78	17.78
INTEREST ON WC	1.52	1.96	1.96

### 1.13 Means of finance

<b>EQUITY CAPITAL</b>			25.00%	9.82
MOFPI SUBSIDY	25%	50.00	25.00%	9.82
TERM LOAN				
FINANANCIAL INSTITUTIONS		10.00%	50.00%	19.63
-Payable half yearly Installments	10	2.00		
TOTAL			100%	39.26

### 1.14 Cash flow statement

PARTICULARS	Year 1	Year 3	Year 5	Year 7
SOURCES OF FUNDS				
EQUITY CAPITAL	-	-	-	-
SUBSIDY				
NET PROFIT	4.31	8.56	7.63	6.70
(INTEREST ADDED BACK)				
DEPRECIATION	1.39	1.39	1.39	1.39
PRELIMINARY EXP.W/O	1.01	1.01	1.01	1.01
INCREASE IN TERM LOAN	-	-	-	-
INCREASE IN BANK BORROWINGS-WC	13.83	1.98	-	-
<b>TOTAL</b>	<b>20.55</b>	<b>12.94</b>	<b>10.04</b>	<b>9.10</b>

### 1.15 Projected balance sheet

PARTICULARS	Year 1	Year 3	Year 5	Year 7
LIABILITIES				
EQUITY CAPITAL	10.27	10.27	10.27	10.27
RESERVES & SURPLUS	11.00	19.08	29.58	39.55
TERM LOAN	18.43	10.03	1.63	-
BANK BORROWINGS-WC	13.83	17.78	17.78	17.78
<b>TOTAL</b>	<b>53.53</b>	<b>57.16</b>	<b>59.26</b>	<b>67.60</b>

### 1.16 Projected profit and loss account

Particulars	Year 1	Year 3	Year 5	Year 7
INCOME	46.20	59.40	59.40	59.40
EXPENDITURE	39.48	48.44	49.36	50.30
VARIABLE	27.38	34.54	34.35	34.16
FIXED	12.10	13.90	15.02	16.14
GROSS PROFIT	6.72	10.96	10.04	9.10
PROFIT BEFORE TAX	0.74	5.28	5.20	4.74
RETAINED PROFIT	0.74	5.28	5.20	4.74

### 1.17 Key Indicators

NET PRESENT VALUE at current Inflation (Rs. in lakhs)	<b>48.47</b>
INTERNAL RATE OF RETURN (%)	<b>27.02</b>
AVERAGE DSCR	<b>1.63</b>
BREAK EVEN POINT %	<b>81.23</b>
PAY BACK PERIOD ( YEARS)	<b>4.85</b>

### 1.18 Man Power Requirement

PARTICULARS	NOs.
<b>SUPERVISORY STAFF</b>	
Production Supervisors	1
Accountant	1
<b>WORKERS</b>	
Skilled Workers	2
Semi-Skilled Labour	6
Salesman	1
<b>TOTAL</b>	<b>11</b>

### 1.19 Assumptions



Contingencies on Building		10%
Contingencies on Equipment		20%
Term Loan		50%
Rate of Interest on Term Loan		10%
Subsidy Considered	Subject to ceiling	25%
Expected time of Installation	Months	10
Moratorium	Months	6
<b>CAPACITY</b>		
Rated Capacity Per Annum	80% of Installed capacity TPA	110
Number of Operational Days	DAYS	300
Working Hours Per day	Hrs	8
<b>CAPACITY UTILIZATION</b>		
Year I		70%
Year II		80%
Year III		90%
<b>SALES PRICE</b>		
W S Price		65,000
<b>OTHER EXPENSE</b>		
Commission		10.0%
Marketing Expenses		2.5%
<b>POWER</b>		
Connected Load	HP	40
<b>DEPRICIATION AS PER COMPANY'S ACT</b>		
BUILDING		3.34%
PLANT & MACHINERY		10.34%
MISC. FIXED ASSETS		7.07%
LAND & SITE DEVELOPMENT		1.63%
<b>MAINTENANCE</b>		
BUILDING		1.00%
PLANT & MACHINERY		3.00%
MISC. FIXED ASSETS		2.00%
LAND & SITE DEVELOPMENT		1.00%

The actual cost of projects may deviate on change of any of the assumptions.