Project Profile

PRODUCT	:	Automobile Filter
PRODUCT CODE	:	75066
QUALITY & STANDARDS	:	As per IS – 3169 - 1991
PRODUCTION CAPACITY	:	Quality : 60,000 Nos.
VALUE	:	Rs. 43,20,000/-
MONTH & YEAR OF PREPARATION	:	October 2012

PREPARED BY : **MECHANICAL DIVISION**
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INTRODUCTION

Automobile Industries in India, is getting developed very fast. This industry has a very high potential to generate employment trade and infrastructural inputs hence Govt. of India has included this industry in extreme focus groups.

Day to day changes in the choice and approaches of the user Automobile industry is also bound to introduce new models, designs and technology in their vehicles. The impact of the market compulsions made this industry very competitive and innovative. Hence, the growth of this industry is very high as compared to other industries.

Automobiles are run either by diesel or by petrol. Lubricating oil is also used in these vehicles for smooth uninterrupted fuel supply, oil supply and to safe guard the parts and components of the engine and filters are required. These automobile filters are called as per their use i. e. diesel filter, petrol filter, oil filter and air filter.

MARKET POTENTIAL

The Auto filters are consumables for the automobile vehicle usually it is being replaced within four to six months, depend upon the kilometer run by the vehicle and pollution level of city i. e. dust particles in the atmosphere.

The market is available for original equipment supply as well as in space market of the country and a good quality filter can be exported.

BASIS AND PRESUMPTIONS

1. The Project Profile is based on 6 working hours per day and 25 days a month. The BEP has been calculated on 75 % capacity utilization basis.
2. The full capacity utilization can be achieved in one year.
3. The normal wages / salaries is considered as per the Govt. norms.
4. The rate of interest both on fixed and working capital has been taken as 14 % p. a.
5. The margin money has been considered as 25 % of project cost.
6. The pay back period is taken as 5 years after the disbursement of loan.
7. Estimated life of project is considered as 25 years.
8. Cost of machines has been taken on the basis of moderately good machines at the time of preparation of the scheme.
9. Raw material prices are taken on the basis of current prices at the time of preparation of scheme.

10. Land and building are taken on rental basis at the current rates i. e. @ Rs. 6 per sq. feet.

IMPLEMENTATION SCHEDULE

Project implementation will take a period of twelve months from the date of approval of the scheme. Break up of activities with relative time for each activity is shown below :

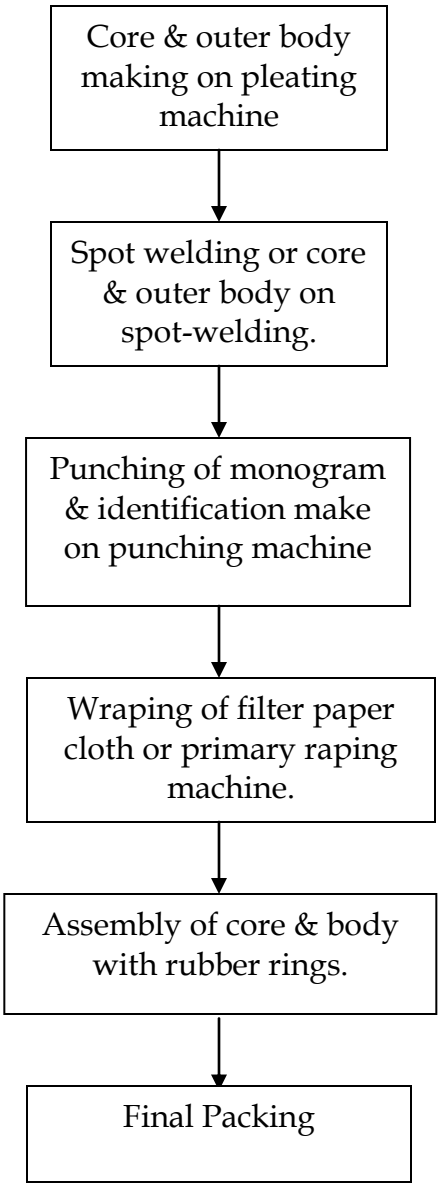
Sl. No.	Activity	Time period in months [Estimated]
a.	Project report preparation and approval	0-2 months
b.	SSI provisional registration	¼ month
c.	Selection of site	0-6 months
d.	Sanction of loan	6-8 months
e.	Recruitment of man power	6-8 months
f.	Placement of orders for delivery of machinery and other equipments	4-8 months
g.	Installation of machines	10-12 months
h.	Trial production	12 months onwards

TECHNICAL ASPECTS

a. Process of Manufacturing : The Auto filters are manufactured in different steps. It contains following parts i. e. core of iron or brass net, hosiery clothe or paper filter, outer iron or brass net body and top and bottom rubber rings. The core and outer body is made on pleating and jointly machine and then spot welded to get desire circular shape. After this filter are raped on it with the help of primary raping machine and suitably punched on punching machine. Finally the rubber rings are assembled to the body and core with filter paper and cloth and packed for sales.

b. Quality Specifications : Product must be manufactured strictly as per IS – 3169-1991.

OPERATION FLOW PROCESS CHART



PRODUCTION CAPACITY (per annum)

a. Quantity : 60,000 nos.
b. Value : Rs. 3900,000

APPROXIMATE MOTIVE POWER REQUIREMENT : 13 KW

POLLUTION CONTROL NEEDS – NIL

ENERGY CONSERVATION NEED

As such only electrical energy is being used. Necessary capacitors should be mounted on motors and all electrical equipments and material should be used of ISI marked only.

FINANCIAL ASPECT

a. **Land & Building (Rental)**
Covered area 800 sq. feet @ Rs. 12 per sq. feet = 9600 pm

b. **Machinery & Equipments**

S. No.	Description	Quantity	Value [in Rs.]
01.	Spot welding machine 5 kw	01	85000.00
02.	Punching machine ½ HP	01	50000.00
03.	Pleating and jointing machine 1 ½ HP	01	55000.00
04.	Primary rapping machine ½ HP	01	35000.00
05.	Heating press 1 HP	01	45000.00
06.	Oven 3 kw	01	25000.00
07.	Hand tools & other equipment	L. S.	5000.00
08.	Measuring & Testing equipments	L. S.	20,000.00

c. **Pre – operative expenses : L. S. 15,000.00**
Cost of other equipments : L. S. 25,000.00
Total fixed capital : 3,60,000.00

d. Working capital :

1. Personnel :

Supervisors/Manager	01	20000.00
Skilled workers	04	28000.00
Helpers	04	16000.00
Clerk / Typist	01	7000.00
Total		**71000.00**

Perquisites @ 15 % : 10650.00
Total : 81650.00

2. Raw material including packing requirement [p. m.]

a.	Raw material including packing requirement [p. m.]	5000 nos.	20,000.00
b.	Inner iron net / brass net	5000 nos.	40,000.00
c.	Filter paper	5000 nos.	50,000.00
d.	E–rubber ring	10,000 nos.	10,000.00
e.	Wire locks	10,000 nos.	5000.00
f.	Cotton media white & colourless	5000 nos.	4000.00
g.	Packing material	L S	10,000.00
			1,39,000.00

Total cost of Raw Material

3. Utilities

Power charges 2000 KWH @ Rs. 7 = 14000.00
Water charges L S = 500.00
Total = 14500.00 (8500)

4. Other contingent expenses (PM)

Rent	9600.00
Postage and stationery	2000.00
Telephone	3000.00
Consumable stores	5000.00
Repair and maintenance	5000.00
Transport charges	2000.00
Advertisement & publicity	5000.00
Insurance	800.00
Taxes	1000.00
Sales expenses	5000.00
Misc. expenses	2600.00
Total	**41000.00**

5. Total Recurring Expenditure (P M)

Salary wages	81650.00
Raw material	139000.00
Utilities	14500.00
Other contingent expenses	41000.00
Total	**Rs. 2,76,150.00**
Say	**Rs. 2,77,000.00**

Total working capital (for 3 month) Rs 8,31,000.00

7. Total capital investment – fixed cost + working capital

360000/- + 831000/- = 1191000/-

e. Machinery utilization

As the process is skill and assembly oriented man power should be well trained and machinery may be utilized at its optimum level.

f. Financial Analysis

Cost of Production [per year] :

Total recurring cost [p. a.]	33,24,000
Dep. on building [if any]	Nil
Dep. on machines & equipments @ 10 %	36,000.00
Interest on total investment @ 14 %	1,66,740.00
Total	**Rs. 35,26,740.00**
Say	**Rs. 35,27,000.00**

g. Turn over [per year]

Filters 60,000 @ 72each Rs. 43,20,000.00

h. Net profit [per year]

43,20,000 – 35,27,000 = 7,93,000

i. Net Profit Ratio

$$\frac{\text{Net Profit [per year]}}{\text{Turn Over [per year]}} \times 100 = \frac{7,93,000}{43,20,000} \times 100 = 18.36\ \%$$

j. Rate of Return

$$\frac{\text{Net Profit}}{\text{Total investment}} \times 100 = \frac{7,93,000}{11,91,000} \times 100 = 66.59\ \%$$

k. Break Even Point

a.	Dep. on machine and other equipment	36000.00
b.	Rent	115200.00
c.	Interest on Total investment	166740.00
d.	40 % of salary	3,91,920.00
e.	40 % of other expenses	1,50,720.00
	Fixed cost	**8,60,580.00**

FC x 100 / FC + profit = **8,60,580**x 100 / **8,60,580** + 7,93,000 = 52 %

l. Additional Information

The product is a consumable one and having a very tough competition with established large scale industries hence, quantity may be revised as per our own strength to sustain in the market and marketing efforts are required to give sufficient margin to the retailers.

m. Address of machinery suppliers

1. M/s Quality Machine Tools, 108, Jawahar Marg, Indore
2. M/s Standard Machine & Tools Ltd., 43, Siyaganj, Indore
3. M/s Kudarati Machinery & Metals, 3/1, Sanyogitaganj, Indore

n. Address of Raw Material suppliers

1. Local Market
2. M/s Paper Products Ltd. , 14/13, Ajmerigate [Ext.], New Delhi