Economic Analysis of Cotton Ginning and Pressing Agriculture Research in Shri Ramdev Cotspin India

Komal S Dainiwal, N V Shende, School of Agri-Business Management, Nagpur, India

Abstract:- Ginned Cotton is the basic need of spinning factory and other units which require raw cotton like quilt & other product manufacturers. Demand of the service is very huge because cotton cannot be use without ginning and hand process is very time and labor consuming. Thus, the demand of the service is very huge in cotton growing areas. Demand for ginned cotton is significantly affected by its quality, which depends on the characteristics of the raw materials. The objectives of this project were to study the profile of Shri Ramdev Cotspin (P) Ltd. Akot, Dist. Akola, to workout cost and returns, to estimate the breakeven point, marketing of bales and to find out constraints face by Cotton Ginning & Pressing Factory The project conducted at Shri Ramdev Cotspin (P) Ltd. by direct contact with workers, co-workers, managers and director. This study will help in knowing the present competitor, products, perception of the farmers towards the products.

Keywords:- Ginned Cotton, Raw Cotton, Cost And Returns, Break-Even Point, Marketing, Constraints.

I. INTRODUCTION

Shri Ramdev Cotspin (P) Ltd. of Akola, India is one of the small-scale industries of ginning and pressing of raw cotton, started in the year 2008 by the proprietor Mr. Ajit R. Gupta with his experience of 15 years in this field. He made the industry one of the main manufacturing units of ginning and pressing of raw cotton with the help well advanced and modern technology for the convenience of the transport. Shri Ramdev Cotspin (P) Ltd. also engaged in manufacturing of best quality cotton bales and cotton seeds in market and to the end users.

II. OBJECTIVES

- To study the establishment of Shri Ramdev Cotspin (P) Ltd.
- To workout cost and returns of Shri Ramdev Cotspin (P)
- To study the marketing of cotton bales of Shri Ramdev Cotspin (P) Ltd.
- To identify constraints face by Shri Ramdev Cotspin (P)

III. METHODOLOGY

The primary data was collected through survey. The information was collected through personal interview with company employee using well-structured questionnaires. The present study was conducted at District-Akola. The data was collected for the period from year 2021-2022.

➤ Method of Analysis

The profile of Shri Ramdev Cotspin (P) Ltd. is studied, and the data is collected through observation and information provided by company employees. The cost and returns of Shri Ramdev Cotspin (P) Ltd. are estimated by

- **Fixed Cost:** It includes cost of machinery, buildings, land, furniture, wages of permanent employee labor, salary to staff, insurance premium and taxes.
- Variable Cost: It includes expenditure on purchase on raw material, wages of casual labors, oil and lubricants, energy charges, repair and maintenance of machinery, packaging cost and interest on working capital etc.
- **Total Cost:** Total Cost = Fixed Cost + Variable Cost
- **Gross Income:** Gross income is the total value of main product, by product, waste income etc.
- Gross Income = Quantity of the product * Price per unit
- **Net Income:** It shows the remuneration for the product and it is computed by deducting cost of production from the gross income.

Net Income = Gross income - Total Cost

For identifying the break-even point, we will follow the below given BEP formulae.

Break-even point = Fixed cost / (Selling price – Variable cost per unit)

To study the marketing of cotton bales of Shri Ramdev Cotspin (P) Ltd. includes identification of marketing channel which uses company marketing cost, market margin, price spread.

Net Price Received by Company = Selling Price - Charges Incurred

Producer Share In Consumer Rupee = (Net Price Received By Producer)/(Price Paid By Consumer)*100

To identify the constraints Faced by Shri. Ramdev Cotspin (P) Ltd. Data is collected by personal interview and the questionnaire.

ISSN No:-2456-2165

IV. RESULTS

	Table No. 1: Capacity utilizati	on of Shri Ramdev Cotspin (P)	Ltd.
Sr. No.	Particulars		Percentage
1.	Capacity of ginning mill(qtl/day)	37.8	
2.	Number of working days	250	
3.	Quantity of Cotton bales produced	9450	
	per Annum (qtl)		
	Quantity of main	product obtained (qtl)	
1.	Main product	9450	35.00
	Quantity of by p	product obtained (qtl)	
2.	Cotton Seeds	17550	65.00
	Total	27000	100.00

Sr. No.	Particulars	Amount(Lac)
Α.	Buildings	
1.	Gin Building	65.00
2.	Pressing Building	20.00
3.	Foundation of Press	0.8
4.	Raw Cotton Shed	1.2
5.	Fire Hydrant and Pool	2.00
6.	Electric substation	3.00
7.	Water Arrangement	1.00
8.	Office Building	15.00
	Total Cost of Building	108
В.	Machinery	
1.	Double Roller Gin	40.00
2.	Pneumatic Feeding	7.00
3.	Cotton Seed Cleaner	30.00
4.	Cotton Conveying Machine	25.00
5.	Auto Feeder to DIR Gin	10.00
6.	Lint Transport System	15.00
7.	Cotton Belling Press	70.00
8.	Weighing Scale	5.00
C.	Office Furniture	2.00
	Total	204

Sr. No.	Particulars	Amount (Lac)	Percent Share
1.	Cotton (raw material)	2025	98.52
2.	Casual labour charges	5.66	0.28
3.	Diesel and Lubricants	3.05	0.15
4.	Repair and Maintenance	2.50	0.12
5.	Packaging Charges	0.55	0.03
6.	Transportation Charges	0.68	0.03
7.	Permanent labour charges	1.06	0.52
8.	Stationary Charges	0.305	0.01
9.	Miscellaneous Charges	1.05	0.05
10.	Electricity Charges	6.00	0.29
	Total Variable Charges	2055.45	100

Γ	able No. 4: Fixed Cost of Ginned Cotton at St	ri Ramdev Cotspin (I	P) Ltd.
Sr. No	Particulars	Amount (Lac)	Percent Share
1	Land	1.00	1.52
2	Building	14.90	22.72
3	Machinery	32.99	50.29
4	Furniture	1.13	1.73
5	License Fees	0.28	0.45
6	Insurance	10.00	15.24
7	Income Taxes	5.30	8.08
	Total	65.61	100
	Land	1.00	1.53
	Total Fixed Cost with Appreciation	64.61	98.47

	Table No. 5: Profitability of Shri. Ramdev Cotspin (P) Ltd.				
Sr. No.	Particulars	Amount (Lac)	Percentage		
1.	Variable cost	2055.45	96.95		
2.	Fixed Cost	64.61	3.04		
3.	Total Cost	2120.06	100.00		

	Table No 6 :Ro	eturns of gin	ned cottor	at Shri Ramo	dev Cotspin (P) Ltd.	
Sr. No	Product	Unit	Sales	Rate (Rs)	Amount (Lac)	Percentage
1.	Cotton bales	Quintal	9350	33760	1856.8	64.99
2.	Seeds	Quintal	17550	5682	997.19	34.90
3.	Cotton Wastage	Quintal	1012	300	3.04	0.001
	Total				2857.03	100.00

	<u> </u>	
Sr. No	Particulars	Amount
1.	Fixed cost (Lac)	6461118
2.	Variable cost	205545000
3.	Total Cost	212006118
3.	Variable cost per quintal (Rs)	7641
4.	Selling Price per quintal (Rs)	10621
5.	Break-even point (Qtl)	2168.16
6.	B:C ratio	1.35
7.	Net Profit (Crore)	73696582
8.	Gross return (crore)	285702700

V. MARKETING OF COTTON BALES OF SHRI RAMDEV COTSPIN (P) LTD.

Marketing of cotton is a specialized activity by itself involving handling, packing, movement of cotton bales, grading quality tests and problems of payment. As compare to other crops, the cotton has to pass through multiple number of intermediary agencies, as cotton has to traverse through a long route before reaching the end user.

➤ *Marketing Channels:*

There are three marketing channels for the marketing of cotton bales at Shri Ramdev Cotspin (P) Ltd.

Channel - I: Producer - Consumer

Channel - II: Producer - Trader - Retailer - Consumer

Channel – III: Producer – Cooperatives

Wholesaler/ Commission Agent

Retailer – Consumer

	Table No. 8: Marketing Cost, Gross Returns and Margin in		
Sr. No.	Particulars	Cost (Rs) / Bale	Total cost (lac
Α.	Price received by producer/Price paid by Trader	33760	844
	Bale sales by Producer		2500
2.	Marketing cost of wholesaler-		
	a. Packing Cost	50	1.25
	b. Market fees	20	0.50
	c. Loading & unloading charges	50	1.25
	d. Commission of trader	100	2.50
	e. Miscellaneous charges	50	1.25
	Total	270	6.75
3.	Total cost incurred by trader	33980	849.50
4.	Net profit margin of trader	850	21.25
			21.25
4. 5.	Selling price of trader/Purchasing price of retailer Bales sales by trader	34880	2500
	· ·	225(0	2500
B.	Selling price of producer to cooperative	33760	2000
	Bale Sales by Producer to Cooperative		3000
	Cost incurred by Cooperative		
	a. Loading and unloading charges	50	1.5
	b. Packing Cost	50	1.5
	c. Market Fees	20	0.6
	d. Commission of Cooperatives	150	4.5
	e. Miscellaneous Charges	50	1.5
	Total	320	9.6
	Market Margin of Cooperatives	950	28.5
		950	
~	Bale Sales By Cooperatives	25000	2700
C.	Selling price of Cooperatives to wholesaler	35030	
1	Moulesting cost of wholesolow		
1.	Marketing cost of wholesaler	50	1.35
	a. Transportation Charges b. Packing Cost	50	1.35
	c. Packing Material Cost	50	1.35
	d. Market Fees	20	0.54
	e. Loading & Unloading Charges	50	1.3
	f. Miscellaneous Charges	20	0.54
	g. Weighing Charges	50	1.35
	h. Commission Charges	150	4.05
	Total	440	11.88
2.	Cost Incurred By Wholesaler	35470	957.6
	Market Margin of Wholesaler	850	22.95
	Selling Price of Wholesaler	36320	22.50
	Bale Sales By Wholesaler	20220	2500
D.	Purchasing price of retailer	36320	2000
1.	Price paid by retailer	00020	
	Marketing cost of retailer-		
	a. Weighing charges	20	0.5
	b. Loading and unloading	50	1.25
	c. Town charges	20	0.5
	d. Carriage up to shop	20	0.5
	e. Miscellaneous charges	50	1.25
	Total	160	4.00
2.	Total marketing cost of retailer	36480	912.00
3.	Market margin of retailer	850	21.25

ISSN No:-2456-2165

4.	Selling price of retailer/ Purchasing Price of	37330	
	Consumer		

	Table No. 9: Price Spread By Marketing Channel			
Sr. no.	Particulars	Cost/ Bale	Percentage	
1.	Price received by producer	33760	90.43	
2.	Total marketing cost	920	2.46	
3.	Total marketing margin	2550	6.83	
4.	Price paid by consumer	37330	100	

	Item	Cost
1	Price Received by Producer	33760
2	Selling Price of Cooperatives	35030
3	Selling price Wholesaler	36320
4	Selling Price of Retailer	37330

Sr. No	Types of Constraints	Frequency of response	Percent ofresponse	Ranks
1.	Inadequate Raw Material	3	25.00	VI
2.	Manpower	5	41.50	IV
3.	Unskilled labour	2	16.00	VII
4.	Machinery and Technology	7	58.33	II
5.	Electricity	8	66.00	I
6.	Transportation	6	50.00	III

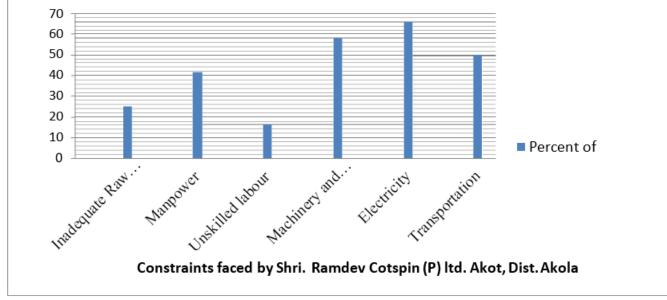


Fig 1 Constraints faced by Shri. Ramdev Cotspin (P) ltd. Akot, Dist.

VI. CONCLUSIONS

On the basis of study, findings and result of the project in Shri Ramdev Cotspin (P) Ltd. following conclusion are drawn.

- The major ginning cost component was the cost of raw material. Hence price fluctuations of raw material have profound influence on the economics of cotton ginning factory.
- Break even quantity estimated is 2168.16 quintal. That means factory should process at least 2168.16 quintal to run the ginning. And this year actual quantity produced is 5500 bales.
- The total return is estimated is more than total cost of ginned cotton so the Shri Ramdev Cotspin (P) Ltd. is in profit.
- The Net profit of company is 73696582 and B:C ratio is 1:1.35
- The estimated gross return of cotton ginning factory is Rs 285702700

REFERENCES

- [1]. Antony, W. S., 1994. Overview of ginning process. Cotton Ginners Handbook. United States Department of Agriculture (USDA). Agricultural Handbook 503: 43-46.
- [2]. Antony, W. S., Van Doorn, D.W. and Herber, D. 1994. Packing of lint cotton. Cotton Ginners Handbook. United States Department of Agriculture (USDA). Agricultural Handbook 503: 119-123
- [3]. Kumari R V, Radhika E, 2015, An economic analysis of processing of cotton crop produce in International journal of Economic...2015, indianjournals.com
- [4]. Patil P G. Arunde YG, 2014, Recent advances in cotton ginning technology in India, International Cotton Advisory Committee, 2014-staging.icac.org