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Report of The Study Group

For Review Of

Govt. Policy for Fixing Minimum Support Prices Of Selected Agriculture Commodities With Reference To Maharashtra State, India

Study Group

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Chapter 1

Introduction

1.1 Backdrop:

In India, the role of agricultural price policy and its instruments have time and again been reviewed and undergone changes depending upon the dynamics in the agricultural sector. Infact, India's price policy can be traced back to World War II, when the economy was facing severe food shortage which was accelerated by the Bengal famine, and the primary role of policy measures was to make food available to consumers at reasonable prices. The policy measures were mainly in the form of fixation of ceiling prices, procurement prices, zonal restrictions, stock restrictions, etc. Price policy was mainly consumer oriented and aimed at providing foodgrains to consumers at affordable prices so as to maintain the cost of living and control inflation.

With the setting up of the Planning Commission in 1950 soon after independence and the institutions of Five Year Plans, agricultural development assumed great significance. This was mainly due to the fact that the country was reeling under food shortage which had to be partially satisfied by emergency imports. Fortunately, a major breakthrough came about in technology in the mid sixties which came to the rescue of the food situation that was marked by acute scarcity. Agricultural researchers sought to reconstruct the structure of grain plants to promote higher yields. The new high-yielding, short duration, short-stem, fertilizer responsive, photo-insensitive varieties of seeds of wheat and rice had proved their potential and became available for cultivation. Hybrid varieties of maize, sorghum and bajra were also released and by 1966, high-yielding varieties of India's five major cereals had been introduced. These new varieties primarily based on irrigation and fertilizers increased the grain yield and not the stalks and were also short maturing which facilitated multiple cropping. The use of these high-yielding varieties of seeds along with complementary inputs signaled the beginning of a more dynamic agriculture, mainly described as "Green Revolution" which brought about dramatic increases in productivity of major cereals in 1970s and 1980s. Gradually, high yielding varieties were developed for fibre and oilseed crops also.

The use of new technology described above required heavy investment in agriculture and although its use led to huge productivity increase, the risk involved was equally high. The role of the government was to induce the farmers to adopt the new technology so as to accelerate food production and promote agricultural growth. Hence a number of measures were adopted such as massive investment in infrastructure, creation of appropriate financial institutions to provide credit to farmers and also equally important was price support by promoting a sound agricultural policy. There was thus a clear shift in the thinking of the policy makers with regard to price policy which was now marked by the producer's ascendancy so as to encourage use of scientific farm practices. However, although adoption of new technology had potential to greatly increase

yield levels, it could also create glut conditions in the market and thus depress prices. Therefore, it was thought that a long term policy on the price front would provide more assured income to farmers and thus encourage production response in desired directions. The government accordingly evolved a price support mechanism in the shape of an Agricultural Price Commission which was constituted in 1965. An important function of the Agricultural Price Commission since inception in 1965 was the announcement of Minimum Support Price (MSP) for major agricultural crops in advance of the planting season. MSP is viewed by the Commission as being in the nature of long term guarantee to the producers that any glut in the market which may be caused by excess production will not be able to depress their incomes to unduly low levels. Once the minimum price of a crop is announced, it is implied that the government is committed to purchase, at the announced level of support price, unlimited quantities of the crop concerned, irrespective of the size of the harvest and the level of market prices. Purchases by government agencies at minimum support prices is thus open ended and these prices set a floor below which market prices cannot fall. The price policy also aimed to check the rise in the cost of living, level of wages and industrial cost structure.

The underlying theoretical basis for the guaranteed support price has several elements such as price stabilization, improvement in agriculture's terms of trade and provision of insurance to the agricultural producer. The main purpose of declaration of MSP was to assure reasonable prices to the farmers, motivating them to adopt new technology and make investment in agriculture. In 1985, Agricultural Price Commission was renamed as Commission for Agricultural Costs and Prices (CACP).

1.2 Determination of Support Prices :

The Government of India fixes the support prices for 24 agricultural commodities with a guarantee to farmers that if market prices fall below the support level, government agencies such as Food Corporation of India, Cotton Corporation of India, NAFED, etc. would enter the market and purchase any amount of quantities that are offered at support price. Presently, about 24 major crops are covered under minimum support price programme (paddy/rice, wheat, five coarse cereals, four pulses, eight oilseeds, cotton, jute, tobacco and sugarcane). In case of sugarcane, the minimum support price has been assigned a statutory status and has been called the Statutory Minimum Price (SMP). Market intervention is also another form of support policy of the government, where support is extended to horticultural crops whenever there is drastic fall in prices of these commodities.

The minimum support prices for major agricultural products are announced each year after taking into account the recommendations of the CACP. The CACP while recommending prices takes into account all important factors including cost of production, changes in input prices, input-output price parity, trends in market prices, inter-crop price parity, demand and supply situation of the crop, parity between prices paid and prices received by farmers, effect on industrial cost structure, effect on general price level, effect on cost of living and international

price situation. Thus the MSP is fixed by taking both demand and supply factors and the price structure finally evolved aims at developing a production pattern that should suit national requirements and also lead to rational utilization of land, water and other production resources. The CACP analyses the cost of production data for various states with respect to various agricultural commodities in consultation with the states. After a meeting with State Chief Ministers, the MSP is declared.

The support prices fixed by the government would not be considered as incentive prices to farmers unless prices are fixed at levels which would provide a sufficient margin of profit over total cost. Therefore the unit cost of production is an important consideration in the determination of support prices. The Commission mainly relies on the estimates of cost of cultivation/production generated under the Comprehensive Scheme for studying the cost of cultivation of Principal Crops by Directorate of Economics and Statistics. Under this scheme, state level estimates are generated from holding-wise data obtained from a sample. For the selection of holdings, a multi-stage stratified sampling design is used. While the data collection and tabulation are done by the designated State Agricultural Universities or Agro-Economic Research centres, final analysis of the data and generation of cost estimates are done by Directorate of Economics and Statistics. Since the 1984-85 season, the aggregate sample size is 9000 holdings. The cost estimates include both paid-out and imputed costs. The following are the cost concepts used by CACP:

Cost A₁:

This cost includes all actual expenses in cash and kind incurred in production by the owner. The following are its components:

- i) Value of hired human labour;
- ii) Value of hired animal labour;
- iii) Value of owned animal labour;
- iv) Value of owned machinery labour;
- v) Charges of hired machinery;
- vi) Value of seed (farm grown and purchased);
- vii) Value of insecticides and pesticides;
- viii) Value of manure (owned and purchased);
- ix) Value of fertilizer;
- x) Depreciation on implements and farm buildings;
- xi) Irrigation charges
- xii) Land revenue and other taxes;
- xiii) Interest on working capital;
- xiv) Miscellaneous expenses like artisan payments

Cost A₂: Cost A₁+ rent paid for leased land

Cost A₂+ FL : Cost A₂ + imputed value of family labour.

Cost B₁: Cost A₁+interest on value of owned fixed capital (other than land)

Cost B₂: Cost B₁+ rented value of owned land (net of land revenue) +rent paid for leased land

Cost C₁: Cost B₁+ Imputed value of family labour (evaluated at wages of attached farm servant)

Cost C₂: Cost B₂+ Imputed value of family labour (evaluated at wages of attached farm servant)

Cost C₂*: Same as C₂ excepting all labour valued at actual wages or statutory wages whichever is higher

Cost C₃: Cost C₂* + 10 percent of cost C₂* to account for the value of management input of the farmer.

The rental value of owned land is estimated on the basis of the prevailing rent in the village for identical land subject to the ceiling of fair rent given in the land legislation of the concerned state. The interest on owned fixed capital is worked out at the rate of 10 per cent per annum. The cost of production per quintal is worked out as the ratio of cost of cultivation per hectare to the yield on the farm. The total cost of cultivation per hectare is apportioned to the main product in proportion to the value of the main product in the gross value of output. The estimates are first generated for each size group of holding (simple average of individual holding in the size group) in each village cluster and then weighted average at the state level is worked out.

While determining the level of support prices for the next crop season, the cost estimates concerned by the commission pertain to the previous season or even to two or three earlier years. These cost estimates are projected for the year for which the price is determined. The cost of production is based on the projection of price indices for different inputs which are aggregated by assigning weights. The weights are the shares of input in total cost for the year for which cost estimates are available. In the case of inputs such as fertilizers, electricity's, diesel and irrigation, the prices of which are administratively determined, the latest rates are taken and it is assumed that these will prevail in the ensuing season, whereas in the case of other inputs, the prices are assumed to increase in line with recent trends. The changes in input prices are taken into account by building up input prices indices and combining these into a composite input price index. The prices have to be announced before the commencement of the sowing season but at this information on input prices which farmers will be required to pay is not available. Therefore the commission uses the latest information on input prices and projects them for the ensuing season. The commission monitors the changes in input prices, particularly the administrated prices after the submission of its report. In case revision in the price of some input takes place which is likely, the commission revises recommendation on support prices.

1.3 Objectives and Methodology of the study:

From the above sections, the concept of MSP is clearly defined. The method used by CACP to calculate cost of production of agricultural commodities is also indicated. In the light of the above an attempt is made in this study to "initiate a research based policy advocacy on MSP of selected agricultural commodities". The state of Maharashtra is selected for the study. The main

objective of the paper would be to compare MSP with cost of production of selected major crops in Maharashtra. Further, the Maharashtra Agricultural Prices Committee Cell (APC) recommends MSP for crops produced in the state to CACP, New Delhi. An attempt would be made to compare these prices with the prices finally recommended by CACP.

After the Agricultural Price Commission was set up in 1965, several states formed their own price committees. The state of Maharashtra also followed suit and accordingly the Maharashtra State Agricultural Prices Committee Cell was established in 1970. The main objective of this committee is to recommend MSP for crops produced in Maharashtra to CACP after taking into consideration their cost of cultivation. In order to obtain data for working out the cost of cultivation of each crop, permanent machinery was created in four agricultural universities in the state in 1979. A three stage stratified random sampling technique followed under the Centrally Sponsored Comprehensive scheme is adopted under the state sponsored scheme. There are 280 clusters and each cluster consists of three villages. The operation-wise day to day data on cost of cultivation is collected from ten cultivators (two from each village) of each cluster. Usually, a period of three to four years is selected for data collection. While estimating the cost of cultivation, the state APC considers items of direct and indirect expenditure. The ten items of direct expenditure are hired human labor, bullock labor, machinery, seeds, fertilizers, expenditure on irrigation, insecticides, land revenue, insurance premium and other incidental charges. The items on indirect expenditure include depreciation on agricultural implements, rental value of land, interest on fixed and working capital, family human labor at 25 percent more than hired human labor, and 10 percent supervision charges on direct expenditure. There is a difference in methodology adopted by state APC as compared to CACP for calculating cost of cultivation. Some inputs such as interest on working capital, family human labor, margin on cost are given higher imputed values by state APC as compared to CACP. While fixing state support prices, transport and marketing charges are also included.

The study is based on primary and secondary data. A field survey is conducted in order to observe the cost of production of selected crops. The crops selected are paddy, jowar, redgram (arhar or tur), gram, cotton and soyabean. From Table 1.1, the share of crops in the cropping pattern in Maharashtra can be observed. It can be observed that the share of these crops in the cropping pattern of the state is 69.04 percent.

Table 1.1 Share of Area (00 hectares) Crop wise in Maharashtra 2010-11

SL No.	Crop	State Total	Percentage
1	Kharif Rice	14862	7.05
2	Summer Rice	319	0.15
3	Kharif Jowar	10317	4.89
4	Bajra	10346	4.90
5	Ragi	1200	0.57
6	Kharif Maize	7306	3.46
7	Maize	1151	0.55

8	Summer Maize	223	0.11
9	Other Kh Cereals	536	0.25
10	Tur	13018	6.17
11	Mung	5538	2.63
12	Udid	4818	2.28
13	Other Kh Pulses	1294	0.61
14	Rabi Jowar	26462	12.55
15	Wheat	13246	6.28
16	Other Rabi Cereals	52	0.02
17	Gram	14230	6.75
18	Other Rabi Pulses	1330	0.63
19	Sugarcane	9645	4.57
20	Cotton (Lint)	39419	18.69
21	Kh Groundnut	2752	1.30
22	Summer Groundnut	824	0.39
23	Kh Sesamum	526	0.25
24	Rabi Sesamum	34	0.02
25	Nigerseed	347	0.16
26	Kharif Sunflower	688	0.33
27	Sunflower	911	0.43
28	Summer Sunflower	96	0.05
29	Soyabean	27291	12.94
30	Castorseed	98	0.05
31	Safflower	1560	0.74
32	Linseed	413	0.20
33	Other Rabi Oilseeds	77	0.04
	Total	210929	100

Source: Commissionerate of Agriculture, Government of Maharashtra, Pune.

After selecting the above mentioned six crops, data on cost of production was collected from selected districts which can be observed from Table 1.2 (also refer Appendix A.1). For each crop, data was collected from a sample of farmers in the selected districts. Data was collected for the period November and December 2011.

Table 1.2 Crop, District selected for Field Survey:

Sr. No.	Crop	Districts	Number of farmers (sample size)
1	Paddy	Raigad	20
2	Jowar (Kharif and rabi)	Pune, Satara,	22
3	Red gram (tur)	Latur,	16
4	Gram	Latur,	14
5	Cotton	Amravati,	20
6	Soyabean	Amravati,	21

Secondary data for the study is collected from various sources such as Commissionerate of Agriculture, Government of Maharashtra and Report of The Commission of Agricultural Costs and Prices, Ministry of Agriculture, New Delhi.

Data is compiled using tabular analysis. Graphs are presented to compare MSP with cost of production.

While framing conclusions, discussions with concerned government officials would also be made to understand their views on fixation of MSP. Chapter 1 which is an introductory chapter, is followed by chapter 2 which compares MSP fixed by the CACP with cost of production of selected crops. Chapter 3 deals with field survey and compares the cost of production of selected crops of sample farmers with MSP and price prevailing in regulated markets. In chapter 4 the broad policy recommendations have been highlighted.

Appendix A.1 District wise Area (00) hectares and Production (00 tonnes, cotton in 00 bales of 170 kg each) and share in state total (2010-2011)

Sr.	District	Kh Rice				Kh Jowar			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	1360	9.15	2753	10.49	0	0.00	0	0.00
3	Raigad	1246	8.38	2948	11.23	0	0.00	0	0.00
4	Ratnagiri	780	5.25	2231	8.50	0	0.00	0	0.00
5	Sindhudurg	739	4.97	1970	7.50	0	0.00	0	0.00
	Konkan Dn.	4125	27.76	9901	37.72	0	0.00	0	0.00
6	Nasik	591	3.98	240	0.92	18	0.17	21	0.15
7	Dhule	50	0.34	67	0.25	245	2.37	539	3.94
8	Nandurbar	234	1.57	247	0.94	276	2.68	450	3.29
9	Jalgaon	0	0.00	0	0.00	1173	11.37	2712	19.83
	Nasik Dn.	875	5.89	554	2.11	1712	16.59	3722	27.22
10	Ahmednagar	75	0.50	70	0.27	0	0.00	0	0.00
11	Pune	609	4.10	719	2.74	87	0.84	83	0.60
12	Solapur	7	0.05	2	0.01	4	0.04	2	0.01
	Pune Dn.	691	4.65	792	3.02	91	0.88	84	0.62
13	Satara	508	3.42	822	3.13	446	4.32	761	5.57
14	Sangli	202	1.36	539	2.05	872	8.45	1087	7.95
15	Kolhapur	1115	7.50	3216	12.25	80	0.78	151	1.10
	Kolhapur Dn.	1825	12.28	4577	17.43	1398	13.55	1999	14.62
16	Aurangabad	0	0.00	0	0.00	71	0.69	148	1.08
17	Jalna	0	0.00	0	0.00	42	0.41	52	0.38
18	Beed	8	0.05	3	0.01	336	3.26	436	3.18
	Aurangabad Dn.	8	0.05	4	0.01	449	4.35	636	4.65
19	Latur	63	0.42	28	0.11	1236	11.98	1767	12.92
20	Osmanabad	112	0.75	34	0.13	514	4.98	412	3.01
21	Nanded	52	0.35	27	0.10	1265	12.26	1335	9.76
22	Parbhani	40	0.27	18	0.07	623	6.04	778	5.69
23	Hingoli	11	0.07	7	0.02	408	3.95	469	3.43
	Latur Dn.	278	1.87	114	0.43	4046	39.22	4761	34.82
24	Buldhana	0	0.00	0	0.00	494	4.79	614	4.49
25	Akola	0	0.00	0	0.00	512	4.96	394	2.88
26	Washim	0	0.00	0	0.00	265	2.57	300	2.19
27	Amravati	38	0.26	28	0.11	484	4.69	517	3.78
28	Yavatmal	0	0.00	0	0.00	685	6.64	524	3.83
	Amravati Dn.	38	0.26	28	0.11	2440	23.65	2348	17.17
29	Wardha	0	0.00	0	0.00	31	0.30	15	0.11
30	Nagpur	714	4.80	701	2.67	129	1.25	95	0.69
31	Bhandara	1815	12.21	2588	9.86	0	0.00	0	0.00
32	Gondia	1782	11.99	3060	11.66	0	0.00	0	0.00
33	Chandrapur	1143	7.69	1601	6.10	21	0.20	13	0.10
34	Gadchiroli	1568	10.55	2332	8.88	0	0.00	0	0.00
	Nagpur Dn.	7022	47.25	10282	39.17	181	1.75	123	0.90
	State Total	14862	100.00	26250	100.00	10317	100.00	13674	100.00

Sr.	District	Bajra				Ragi			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	158	13.16	80	6.81
3	Raigad	0	0.00	0	0.00	108	9.03	83	7.07
4	Ratnagiri	0	0.00	0	0.00	170	14.13	207	17.61
5	Sindhudurg	0	0.00	0	0.00	32	2.67	35	2.98
	Konkan Dn.	0	0.00	0	0.00	468	38.99	405	34.48
6	Nasik	1712	16.55	2163	19.25	275	22.91	123	10.43
7	Dhule	1094	10.57	1713	15.25	30	2.50	36	3.07
8	Nandurbar	162	1.57	241	2.15	4	0.33	2	0.17
9	Jalgaon	358	3.46	498	4.43	0	0.00	0	0.00
	Nasik Dn.	3326	32.15	4615	41.08	309	25.74	161	13.67
10	Ahmednagar	1960	18.94	1868	16.63	28	2.33	26	2.20
11	Pune	486	4.70	430	3.83	94	7.84	86	7.32
12	Solapur	184	1.78	96	0.85	0	0.00	0	0.00
	Pune Dn.	2630	25.42	2394	21.31	122	10.17	112	9.52
13	Satara	756	7.31	592	5.27	81	6.75	88	7.50
14	Sangli	749	7.24	625	5.56	1	0.11	2	0.17
15	Kolhapur	0	0.00	0	0.00	219	18.24	407	34.66
	Kolhapur Dn.	1505	14.55	1217	10.83	301	25.10	497	42.33
16	Aurangabad	898	8.68	1265	11.26	0	0.00	0	0.00
17	Jalna	413	3.99	443	3.94	0	0.00	0	0.00
18	Beed	1225	11.84	1128	10.04	0	0.00	0	0.00
	Aurangabad Dn.	2536	24.51	2836	25.24	0	0.00	0	0.00
19	Latur	43	0.42	22	0.20	0	0.00	0	0.00
20	Osmanabad	166	1.60	67	0.60	0	0.00	0	0.00
21	Nanded	0	0.00	0	0.00	0	0.00	0	0.00
22	Parbhani	75	0.72	49	0.44	0	0.00	0	0.00
23	Hingoli	2	0.02	1	0.01	0	0.00	0	0.00
	Latur Dn.	286	2.76	139	1.24	0	0.00	0	0.00
24	Buldhana	36	0.35	19	0.17	0	0.00	0	0.00
25	Akola	6	0.06	3	0.03	0	0.00	0	0.00
26	Washim	5	0.05	2	0.02	0	0.00	0	0.00
27	Amravati	3	0.03	2	0.02	0	0.00	0	0.00
28	Yavatmal	13	0.13	7	0.06	0	0.00	0	0.00
	Amravati Dn.	63	0.61	33	0.29	0	0.00	0	0.00
29	Wardha	0	0.00	0	0.00	0	0.00	0	0.00
30	Nagpur	0	0.00	0	0.00	0	0.00	0	0.00
31	Bhandara	0	0.00	0	0.00	0	0.00	0	0.00
32	Gondia	0	0.00	0	0.00	0	0.00	0	0.00
33	Chandrapur	0	0.00	0	0.00	0	0.00	0	0.00
34	Gadchiroli	0	0.00	0	0.00	0	0.00	0	0.00
	Nagpur Dn.	0	0.00	0	0.00	0	0.00	0	0.00
	State Total	10346	100.00	11234	100.00	1200	100.00	1174	100.00

Sr.	District	Kh Maize				Other Kh Cereals			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	114	21.27	60	22.27
3	Raigad	0	0.00	0	0.00	38	7.09	17	6.44
4	Ratnagiri	0	0.00	0	0.00	70	13.06	43	15.94
5	Sindhudurg	0	0.00	0	0.00	3	0.56	2	0.64
	Konkan Dn.	0	0.00	0	0.00	225	41.98	123	45.29
6	Nasik	1641	22.46	5356	24.25	111	20.71	64	23.73
7	Dhule	460	6.30	1565	7.08	7	1.31	3	1.21
8	Nandurbar	284	3.89	720	3.26	56	10.45	31	11.35
9	Jalgaon	750	10.27	2490	11.27	5	0.93	2	0.83
	Nasik Dn.	3135	42.91	10131	45.86	179	33.40	101	37.12
10	Ahmednagar	453	6.20	1395	6.32	11	2.05	2	0.61
11	Pune	105	1.43	245	1.11	23	4.29	7	2.75
12	Solapur	205	2.81	348	1.57	10	1.87	7	2.43
	Pune Dn.	763	10.44	1988	9.00	44	8.21	16	5.79
13	Satara	122	1.67	172	0.78	6	1.12	2	0.70
14	Sangli	262	3.59	816	3.69	8	1.49	2	0.88
15	Kolhapur	32	0.44	83	0.37	23	4.29	9	3.18
	Kolhapur Dn.	416	5.70	1071	4.85	37	6.90	13	4.76
16	Aurangabad	1384	18.94	5082	23.00	6	1.12	3	1.00
17	Jalna	608	8.32	1757	7.95	2	0.37	1	0.26
18	Beed	54	0.74	84	0.38	10	1.87	4	1.47
	Aurangabad Dn.	2046	28.01	6922	31.33	18	3.36	7	2.73
19	Latur	45	0.62	39	0.18	7	1.31	1	0.52
20	Osmanabad	156	2.13	136	0.62	6	1.12	1	0.52
21	Nanded	7	0.10	6	0.03	4	0.75	1	0.51
22	Parbhani	14	0.19	12	0.06	2	0.37	1	0.34
23	Hingoli	6	0.08	5	0.02	1	0.19	0.2	0.08
	Latur Dn.	228	3.12	200	0.90	20	3.73	5	1.97
24	Buldhana	662	9.06	1641	7.43	1	0.19	0.5	0.17
25	Akola	11	0.15	27	0.12	1	0.19	1	0.18
26	Washim	4	0.05	10	0.04	0	0.00	0	0.00
27	Amravati	16	0.22	40	0.18	5	0.93	2	0.88
28	Yavatmal	4	0.05	10	0.04	0	0.00	0	0.00
	Amravati Dn.	697	9.54	1728	7.82	7	1.31	3	1.23
29	Wardha	0	0.00	0	0.00	1	0.19	1	0.18
30	Nagpur	1	0.01	2	0.01	1	0.19	1	0.18
31	Bhandara	0	0.00	0	0.00	0	0.00	0	0.00
32	Gondia	1	0.01	2	0.01	0	0.00	0	0.00
33	Chandrapur	0	0.00	0	0.00	3	0.56	2	0.55
34	Gadchiroli	19	0.26	46	0.21	1	0.19	1	0.18
	Nagpur Dn.	21	0.28	51	0.23	6	1.12	3	1.11
	State Total	7306	100.00	22092	100.00	536	100.00	271	100.00

Sr.	District	Tur				Mung			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	34	0.26	16	0.16	8	0.14	6	0.17
3	Raigad	13	0.10	6	0.06	3	0.05	2	0.06
4	Ratnagiri	7	0.05	3	0.03	2	0.04	2	0.04
5	Sindhudurg	0	0.00	0	0.00	1	0.02	1	0.02
	Konkan Dn.	54	0.42	25	0.26	14	0.25	11	0.29
6	Nasik	101	0.78	62	0.64	86	1.55	79	2.12
7	Dhule	92	0.71	82	0.84	206	3.72	202	5.43
8	Nandurbar	201	1.54	146	1.50	140	2.53	98	2.63
9	Jalgaon	160	1.23	143	1.46	432	7.80	291	7.81
	Nasik Dn.	554	4.26	433	4.44	864	15.60	670	17.99
10	Ahmednagar	176	1.35	113	1.16	159	2.87	124	3.34
11	Pune	29	0.22	18	0.18	68	1.23	69	1.86
12	Solapur	418	3.21	156	1.60	29	0.52	20	0.53
	Pune Dn.	623	4.78	287	2.94	256	4.62	213	5.73
13	Satara	53	0.41	18	0.19	64	1.16	42	1.13
14	Sangli	113	0.86	39	0.40	103	1.86	66	1.78
15	Kolhapur	24	0.18	8	0.09	30	0.54	19	0.52
	Kolhapur Dn.	190	1.46	66	0.68	197	3.56	128	3.43
16	Aurangabad	608	4.67	534	5.48	111	2.00	104	2.78
17	Jalna	531	4.08	540	5.53	385	6.95	263	7.07
18	Beed	624	4.79	341	3.49	113	2.04	84	2.26
	Aurangabad Dn.	1763	13.54	1415	14.50	609	11.00	451	12.11
19	Latur	886	6.81	1033	10.58	263	4.75	167	4.49
20	Osmanabad	943	7.24	728	7.46	198	3.58	94	2.53
21	Nanded	683	5.25	404	4.14	355	6.41	234	6.28
22	Parbhani	676	5.19	395	4.05	455	8.22	317	8.51
23	Hingoli	291	2.24	223	2.29	199	3.59	103	2.76
	Latur Dn.	3479	26.72	2783	28.52	1470	26.55	915	24.57
24	Buldhana	768	5.90	425	4.35	536	9.68	351	9.43
25	Akola	615	4.73	521	5.34	558	10.07	412	11.06
26	Washim	625	4.80	450	4.61	320	5.78	174	4.67
27	Amravati	1196	9.19	629	6.45	554	10.01	313	8.39
28	Yavatmal	1216	9.34	904	9.26	138	2.49	77	2.06
	Amravati Dn.	4420	33.96	2928	30.01	2106	38.04	1326	35.61
29	Wardha	715	5.49	766	7.85	2	0.04	1	0.03
30	Nagpur	616	4.73	517	5.30	9	0.16	5	0.15
31	Bhandara	88	0.68	83	0.85	2	0.04	1	0.03
32	Gondia	53	0.41	50	0.51	0	0.00	0	0.00
33	Chandrapur	396	3.04	341	3.50	4	0.07	1	0.02
34	Gadchiroli	68	0.52	64	0.66	4	0.07	2	0.05
	Nagpur Dn.	1936	14.87	1822	18.67	21	0.38	10	0.27
	State Total	13018	100.00	9758	100.00	5538	100.00	3723	100.00

Sr.	District	Uddid				Other Kh Pulses			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	41	0.85	24	0.73	16	1.24	7	1.07
3	Raigad	6	0.12	3	0.11	3	0.23	1	0.21
4	Ratnagiri	5	0.10	3	0.09	8	0.62	4	0.72
5	Sindhudurg	2	0.04	1	0.04	11	0.85	5	0.82
	Konkan Dn.	54	1.12	31	0.96	38	2.94	17	2.81
6	Nasik	140	2.91	108	3.28	141	10.90	56	9.20
7	Dhule	102	2.12	97	2.96	23	1.78	9	1.39
8	Nandurbar	159	3.30	112	3.42	28	2.16	9	1.46
9	Jalgaon	444	9.22	310	9.44	11	0.85	4	0.63
	Nasik Dn.	845	17.54	628	19.10	203	15.69	78	12.68
10	Ahmednagar	121	2.51	77	2.34	52	4.02	9	1.53
11	Pune	21	0.44	20	0.61	119	9.20	42	6.80
12	Solapur	83	1.72	52	1.59	63	4.87	29	4.73
	Pune Dn.	225	4.67	149	4.54	234	18.08	80	13.05
13	Satara	54	1.12	31	0.95	370	28.59	188	30.68
14	Sangli	127	2.64	91	2.76	233	18.01	163	26.62
15	Kolhapur	25	0.52	17	0.51	37	2.86	11	1.87
	Kolhapur Dn.	206	4.28	139	4.22	640	49.46	363	59.17
16	Aurangabad	38	0.79	26	0.78	24	1.85	10	1.57
17	Jalna	148	3.07	97	2.96	4	0.31	1	0.20
18	Beed	137	2.84	120	3.66	47	3.63	19	3.07
	Aurangabad Dn.	323	6.70	243	7.39	75	5.80	30	4.83
19	Latur	598	12.41	434	13.19	7	0.54	1	0.23
20	Osmanabad	571	11.85	278	8.46	17	1.31	5	0.86
21	Nanded	575	11.94	440	13.38	8	0.62	3	0.53
22	Parbhani	113	2.35	67	2.02	11	0.85	6	0.91
23	Hingoli	163	3.38	98	2.98	3	0.23	1	0.14
	Latur Dn.	2020	41.93	1316	40.04	46	3.55	16	2.67
24	Buldhana	490	10.17	336	10.21	5	0.39	3	0.41
25	Akola	137	2.85	93	2.84	1	0.08	1	0.08
26	Washim	352	7.31	253	7.70	1	0.08	1	0.08
27	Amravati	57	1.19	30	0.93	6	0.46	3	0.49
28	Yavatmal	93	1.93	57	1.73	0	0.00	0	0.00
	Amravati Dn.	1130	23.45	770	23.41	13	1.00	7	1.06
29	Wardha	1	0.02	0.8	0.02	1	0.08	0.4	0.07
30	Nagpur	8	0.17	6	0.19	19	1.47	8	1.24
31	Bhandara	1	0.02	1	0.02	0	0.00	0	0.00
32	Gondia	1	0.02	1	0.02	1	0.08	0.4	0.07
33	Chandrapur	3	0.06	2	0.07	10	0.77	6	0.98
34	Gadchiroli	1	0.02	1	0.02	14	1.08	8	1.37
	Nagpur Dn.	15	0.31	11	0.35	45	3.48	23	3.72
	State Total	4818	100.00	3288	100.00	1294	100.00	613	100.00

Sr.	District	Kh Gr.Nut				Kh Sesamum			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	3	0.11	3	0.09	6	1.14	3	1.57
3	Raigad	1	0.04	1	0.03	2	0.38	1	0.52
4	Ratnagiri	2	0.07	2	0.06	1	0.19	0	0.26
5	Sindhudurg	20	0.73	20	0.59	1	0.19	0	0.26
	Konkan Dn.	26	0.94	26	0.76	10	1.90	5	2.62
6	Nasik	324	11.76	275	7.96	0	0.00	0	0.00
7	Dhule	211	7.67	279	8.06	38	7.22	18	9.31
8	Nandurbar	86	3.12	72	2.08	6	1.14	3	1.57
9	Jalgaon	19	0.69	24	0.68	147	27.95	74	39.26
	Nasik Dn.	640	23.24	649	18.78	191	36.31	95	50.14
10	Ahmednagar	42	1.53	36	1.04	5	0.95	1	0.56
11	Pune	357	12.97	459	13.28	17	3.23	4	1.90
12	Solapur	34	1.24	18	0.53	3	0.57	1	0.33
	Pune Dn.	433	15.73	513	14.86	25	4.75	5	2.79
13	Satara	501	18.20	816	23.61	1	0.19	0	0.11
14	Sangli	281	10.21	360	10.41	1	0.19	0	0.11
15	Kolhapur	583	21.18	884	25.58	0	0.00	0	0.00
	Kolhapur Dn.	1365	49.59	2060	59.60	2	0.38	0	0.22
16	Aurangabad	59	2.14	49	1.43	11	2.09	3	1.56
17	Jalna	5	0.18	4	0.13	9	1.71	2	1.28
18	Beed	49	1.78	30	0.88	24	4.56	6	3.41
	Aurangabad Dn.	113	4.11	84	2.43	44	8.37	12	6.25
19	Latur	27	0.98	15	0.42	36	6.84	8	4.12
20	Osmanabad	92	3.34	61	1.77	43	8.17	9	4.54
21	Nanded	3	0.11	2	0.06	29	5.51	8	4.39
22	Parbhani	1	0.04	1	0.02	41	7.79	9	4.92
23	Hingoli	0	0.00	0	0.00	11	2.09	3	1.32
	Latur Dn.	123	4.47	78	2.26	160	30.42	37	19.30
24	Buldhana	2	0.07	2	0.05	30	5.70	11	5.57
25	Akola	0	0.00	0	0.00	16	3.04	7	3.56
26	Washim	0	0.02	0	0.00	6	1.14	2	1.19
27	Amravati	8	0.29	6	0.18	6	1.14	2	1.19
28	Yavatmal	0	0.01	0	0.00	9	1.71	3	1.79
	Amravati Dn.	11	0.39	8	0.23	67	12.74	25	13.31
29	Wardha	2	0.07	1	0.04	0	0.00	0	0.00
30	Nagpur	40	1.45	35	1.02	1	0.19	0.4	0.20
31	Bhandara	0	0.00	0	0.00	4	0.76	2	0.80
32	Gondia	0	0.00	0	0.00	11	2.09	4	2.19
33	Chandrapur	0	0.00	0	0.00	4	0.76	2	0.80
34	Gadchiroli	0	0.00	0	0.00	7	1.33	3	1.39
	Nagpur Dn.	42	1.53	37	1.07	27	5.13	10	5.37
	State Total	2752	100.00	3455	100.00	526	100.00	189	100.00

Sr.	District	Nigerseed				Kharif Sunflower			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	23	6.62	3	4.52	0	0.00	0	0.00
3	Raigad	4	1.15	1	0.79	0	0.00	0	0.00
4	Ratnagiri	22	6.27	3	4.28	0	0.00	0	0.00
5	Sindhudurg	2	0.58	0	0.39	0	0.00	0	0.00
	Konkan Dn.	51	14.62	8	9.98	0	0.00	0	0.00
6	Nasik	123	35.47	18	24.16	2	0.29	1	0.24
7	Dhule	0	0.03	0	0.06	0	0.00	0	0.00
8	Nandurbar	0	0.00	0	0.00	3	0.44	1	0.35
9	Jalgaon	0	0.00	0	0.00	34	4.94	14	4.00
	Nasik Dn.	123	35.49	19	24.22	39	5.67	16	4.59
10	Ahmednagar	19	5.48	7	9.01	82	11.92	34	9.65
11	Pune	20	5.77	7	9.76	8	1.16	3	0.94
12	Solapur	1	0.29	0	0.15	85	12.35	35	10.01
	Pune Dn.	40	11.53	14	18.93	175	25.44	73	20.60
13	Satara	16	4.61	6	7.59	7	1.02	3	0.82
14	Sangli	2	0.58	1	0.95	15	2.18	6	1.77
15	Kolhapur	8	2.31	3	3.79	1	0.15	0	0.12
	Kolhapur Dn.	26	7.50	9	12.33	23	3.34	10	2.71
16	Aurangabad	1	0.29	0	0.34	23	3.34	13	3.79
17	Jalna	2	0.58	1	0.68	17	2.47	10	2.80
18	Beed	8	2.31	2	2.71	37	5.38	22	6.10
	Aurangabad Dn.	11	3.17	3	3.72	77	11.19	45	12.70
19	Latur	18	5.19	3	4.53	65	9.45	47	13.20
20	Osmanabad	46	13.26	12	16.02	202	29.36	98	27.81
21	Nanded	11	3.17	3	3.53	20	2.91	11	3.13
22	Parbhani	18	5.19	4	5.78	34	4.94	24	6.86
23	Hingoli	3	0.87	1	0.96	2	0.29	1	0.41
	Latur Dn.	96	27.68	24	30.82	323	46.95	182	51.41
24	Buldhana	0	0.00	0	0.00	8	1.16	4	1.25
25	Akola	0	0.00	0	0.00	37	5.38	20	5.79
26	Washim	0	0.00	0	0.00	0	0.00	0	0.00
27	Amravati	0	0.00	0	0.00	6	0.87	3	0.94
28	Yavatmal	0	0.00	0	0.00	0	0.00	0	0.00
	Amravati Dn.	0	0.00	0	0.00	51	7.41	28	7.99
29	Wardha	0	0.00	0	0.00	0	0.00	0	0.00
30	Nagpur	0	0.00	0	0.00	0	0.00	0	0.00
31	Bhandara	0	0.00	0	0.00	0	0.00	0	0.00
32	Gondia	0	0.00	0	0.00	0	0.00	0	0.00
33	Chandrapur	0	0.00	0	0.00	0	0.00	0	0.00
34	Gadchiroli	0	0.00	0	0.00	0	0.00	0	0.00
	Nagpur Dn.	0	0.00	0	0.00	0	0.00	0	0.00
	State Total	347	100.00	76	100.00	688	100.00	353	100.00

Sr.	District	Soyabean				Castorseed			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	0	0.00	0	0.00
3	Raigad	0	0.00	0	0.00	0	0.00	0	0.00
4	Ratnagiri	0	0.00	0	0.00	0	0.00	0	0.00
5	Sindhudurg	0	0.00	0	0.00	0	0.00	0	0.00
	Konkan Dn.	0	0.00	0	0.00	0	0.00	0	0.00
6	Nasik	569	2.08	809	1.87	34	34.69	12	29.19
7	Dhule	211	0.77	471	1.09	1	1.02	0	0.98
8	Nandurbar	331	1.21	536	1.24	11	11.22	4	10.04
9	Jalgaon	129	0.47	262	0.61	1	1.02	0	0.98
	Nasik Dn.	1240	4.54	2078	4.81	47	47.96	17	41.19
10	Ahmednagar	507	1.86	908	2.10	0	0.00	0	0.00
11	Pune	29	0.11	58	0.13	1	1.02	0	0.37
12	Solapur	43	0.16	53	0.12	1	1.02	1	2.38
	Pune Dn.	579	2.12	1019	2.36	2	2.04	1	2.75
13	Satara	401	1.47	654	1.52	0	0.00	0	0.00
14	Sangli	573	2.10	1196	2.77	0	0.00	0	0.00
15	Kolhapur	492	1.80	1371	3.18	2	2.04	1	1.47
	Kolhapur Dn.	1466	5.37	3221	7.46	2	2.04	1	1.47
16	Aurangabad	77	0.28	164	0.38	1	1.02	0	1.10
17	Jalna	493	1.81	800	1.85	3	3.06	1	2.94
18	Beed	704	2.58	966	2.24	9	9.18	4	8.83
	Aurangabad Dn.	1274	4.67	1929	4.47	13	13.27	5	12.88
19	Latur	1945	7.13	4318	10.01	0	0.00	0	0.00
20	Osmanabad	652	2.39	1114	2.58	5	5.10	1	3.50
21	Nanded	1812	6.64	2684	6.22	6	6.12	2	5.25
22	Parbhani	1079	3.95	1652	3.83	7	7.14	6	13.74
23	Hingoli	1483	5.43	2374	5.50	4	4.08	1	2.90
	Latur Dn.	6971	25.54	12142	28.13	22	22.45	10	25.39
24	Buldhana	2255	8.26	4161	9.64	4	4.08	2	5.40
25	Akola	1266	4.64	2384	5.52	1	1.02	1	1.35
26	Washim	2092	7.67	2987	6.92	0	0.00	0	0.00
27	Amravati	2733	10.01	4445	10.30	5	5.10	3	6.75
28	Yavatmal	1985	7.27	2731	6.33	0	0.00	0	0.00
	Amravati Dn.	10331	37.85	16707	38.71	10	10.20	6	13.49
29	Wardha	1378	5.05	1516	3.51	0	0.00	0	0.00
30	Nagpur	2424	8.88	2871	6.65	1	1.02	1	1.41
31	Bhandara	70	0.26	121	0.28	0	0.00	0	0.00
32	Gondia	0	0.00	0	0.00	0	0.00	0	0.00
33	Chandrapur	1483	5.43	1486	3.44	1	1.02	1	1.41
34	Gadchiroli	75	0.27	69	0.16	0	0.00	0	0.00
	Nagpur Dn.	5430	19.90	6062	14.05	2	2.04	1	2.82
	State Total	27291	100.00	43158	100.00	98	100.00	41	100.00

Sr.	District	Sugarcane				Cotton (Lint)			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	0	0.00	0	0.00
3	Raigad	0	0.00	0	0.00	0	0.00	0	0.00
4	Ratnagiri	0	0.00	0	0.00	0	0.00	0	0.00
5	Sindhudurg	0	0.00	0	0.00	0	0.00	0	0.00
	Konkan Dn.	0	0.00	0	0.00	0	0.00	0	0.00
6	Nasik	257	2.66	19892	2.32	505	1.28	1006	1.35
7	Dhule	53	0.55	4426	0.52	1331	3.38	3359	4.49
8	Nandurbar	102	1.06	7385	0.86	560	1.42	1166	1.56
9	Jalgaon	112	1.16	8770	1.02	5097	12.93	10971	14.68
	Nasik Dn.	524	5.43	40472	4.72	7493	19.01	16502	22.08
10	Ahmednagar	1260	13.06	115164	13.44	1017	2.58	2211	2.96
11	Pune	1115	11.56	110831	12.93	0	0.00	0	0.00
12	Solapur	1631	16.91	160001	18.67	18	0.05	52	0.07
	Pune Dn.	4006	41.53	385996	45.04	1035	2.63	2264	3.03
13	Satara	740	7.67	69634	8.13	16	0.04	13	0.02
14	Sangli	763	7.91	78513	9.16	35	0.09	41	0.05
15	Kolhapur	1399	14.50	125910	14.69	1	0.00	2	0.00
	Kolhapur Dn.	2902	30.09	274057	31.98	52	0.13	56	0.08
16	Aurangabad	233	2.42	19595	2.29	3329	8.45	8792	11.77
17	Jalna	193	2.00	11927	1.39	3033	7.69	7766	10.39
18	Beed	588	6.10	38749	4.52	2768	7.02	4222	5.65
	Aurangabad Dn.	1014	10.51	70272	8.20	9130	23.16	20781	27.81
19	Latur	330	3.42	22638	2.64	34	0.09	80	0.11
20	Osmanabad	432	4.48	31752	3.71	182	0.46	387	0.52
21	Nanded	137	1.42	8275	0.97	3021	7.66	4622	6.19
22	Parbhani	155	1.61	14152	1.65	2324	5.90	4048	5.42
23	Hingoli	46	0.48	3036	0.35	819	2.08	1333	1.78
	Latur Dn.	1100	11.40	79852	9.32	6380	16.18	10470	14.01
24	Buldhana	10	0.10	610	0.07	2515	6.38	4361	5.84
25	Akola	3	0.03	200	0.02	1678	4.26	2689	3.60
26	Washim	0	0.00	0	0.00	620	1.57	1287	1.72
27	Amravati	3	0.03	207	0.02	2043	5.18	3362	4.50
28	Yavatmal	45	0.47	3006	0.35	4798	12.17	7759	10.38
	Amravati Dn.	61	0.63	4023	0.47	11654	29.56	19459	26.04
29	Wardha	20	0.21	1368	0.16	1906	4.84	2630	3.52
30	Nagpur	3	0.03	62	0.01	808	2.05	1260	1.69
31	Bhandara	11	0.11	596	0.07	0	0.00	0	0.00
32	Gondia	4	0.04	216	0.03	0	0.00	0	0.00
33	Chandrapur	0	0.00	0	0.00	933	2.37	1263	1.69
34	Gadchiroli	0	0.00	0	0.00	28	0.07	43	0.06
	Nagpur Dn.	38	0.39	2243	0.26	3675	9.32	5196	6.95
	State Total	9645	100.00	856914	100.00	39419	100.00	74727	100.00

Sr.	District	Rabi Jowar				Wheat			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	0	0.00	0	0.00
3	Raigad	0	0.00	0	0.00	0	0.00	0	0.00
4	Ratnagiri	0	0.00	0	0.00	0	0.00	0	0.00
5	Sindhudurg	0	0.00	0	0.00	0	0.00	0	0.00
	Konkan Dn.	0	0.00	0	0.00	0	0.00	0	0.00
6	Nasik	143	0.54	107	0.59	755	5.70	1332	5.91
7	Dhule	126	0.48	221	1.21	406	3.07	854	3.79
8	Nandurbar	264	1.00	341	1.87	230	1.74	549	2.44
9	Jalgaon	345	1.30	560	3.07	487	3.68	1159	5.14
	Nasik Dn.	878	3.32	1229	6.73	1878	14.18	3894	17.29
10	Ahmednagar	4866	18.39	2921	16.00	1250	9.44	2241	9.95
11	Pune	3264	12.33	2317	12.69	650	4.91	1081	4.80
12	Solapur	5529	20.89	3200	17.52	607	4.58	825	3.66
	Pune Dn.	13659	51.62	8439	46.22	2507	18.93	4147	18.41
13	Satara	1282	4.84	1038	5.69	400	3.02	638	2.83
14	Sangli	1567	5.92	1125	6.16	251	1.89	505	2.24
15	Kolhapur	110	0.42	211	1.16	66	0.50	159	0.71
	Kolhapur Dn.	2959	11.18	2374	13.00	717	5.41	1301	5.78
16	Aurangabad	808	3.05	632	3.46	753	5.68	1553	6.89
17	Jalna	1034	3.91	769	4.21	343	2.59	589	2.61
18	Beed	1922	7.26	1401	7.67	537	4.05	760	3.37
	Aurangabad Dn.	3764	14.22	2803	15.35	1633	12.33	2901	12.88
19	Latur	254	0.96	197	1.08	426	3.22	631	2.80
20	Osmanabad	2435	9.20	1837	10.06	365	2.76	379	1.68
21	Nanded	292	1.10	271	1.48	490	3.70	794	3.53
22	Parbhani	1617	6.11	680	3.72	517	3.90	878	3.90
23	Hingoli	244	0.92	154	0.84	485	3.66	761	3.38
	Latur Dn.	4842	18.30	3137	17.18	2283	17.24	3444	15.29
24	Buldhana	218	0.82	199	1.09	694	5.24	1249	5.54
25	Akola	0	0.00	0	0.00	482	3.64	1110	4.93
26	Washim	5	0.02	4	0.02	392	2.96	621	2.76
27	Amravati	0	0.00	0	0.00	388	2.93	757	3.36
28	Yavatmal	2	0.01	1	0.01	593	4.48	869	3.86
	Amravati Dn.	225	0.85	204	1.12	2549	19.24	4606	20.45
29	Wardha	10	0.04	10	0.05	317	2.39	530	2.35
30	Nagpur	33	0.12	16	0.09	800	6.04	1175	5.22
31	Bhandara	0	0.00	0	0.00	131	0.99	127	0.56
32	Gondia	0	0.00	0	0.00	30	0.23	20	0.09
33	Chandrapur	51	0.19	24	0.13	389	2.94	369	1.64
34	Gadchiroli	41	0.15	23	0.12	12	0.09	9	0.04
	Nagpur Dn.	135	0.51	73	0.40	1679	12.68	2231	9.90
	State Total	26462	100.00	18259	100.00	13246	100.00	22524	100.00

Sr.	District	Maize				Other Rabi Cereals			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	2	3.85	2	7.39
3	Raigad	0	0.00	0	0.00	1	1.92	1	3.42
4	Ratnagiri	0	0.00	0	0.00	1	1.92	1	3.52
5	Sindhudurg	0	0.00	0	0.00	5	9.62	5	17.25
	Konkan Dn.	0	0.00	0	0.00	9	17.31	9	31.58
6	Nasik	36	3.13	117	4.22	4	7.69	2	8.45
7	Dhule	29	2.52	98	3.53	3	5.77	2	5.39
8	Nandurbar	13	1.13	29	1.05	0	0.00	0	0.00
9	Jalgaon	79	6.86	186	6.69	0	0.00	0	0.00
	Nasik Dn.	157	13.64	430	15.50	7	13.46	4	13.84
10	Ahmednagar	151	13.12	404	14.57	2	3.85	0.4	1.41
11	Pune	112	9.73	341	12.28	10	19.23	5	15.85
12	Solapur	228	19.81	441	15.92	6	11.54	3	9.51
	Pune Dn.	491	42.66	1186	42.77	18	34.62	8	26.76
13	Satara	65	5.65	200	7.20	0	0.00	0	0.00
14	Sangli	122	10.60	357	12.86	1	1.92	1	2.82
15	Kolhapur	56	4.87	117	4.23	2	3.85	1	2.82
	Kolhapur Dn.	243	21.11	674	24.29	3	5.77	2	5.63
16	Aurangabad	43	3.74	139	5.01	0	0.00	0	0.00
17	Jalna	45	3.91	116	4.18	0	0.00	0	0.00
18	Beed	20	1.74	26	0.94	0	0.00	0	0.00
	Aurangabad Dn.	108	9.38	281	10.13	0	0.00	0	0.00
19	Latur	16	1.39	9	0.33	3	5.77	1	4.23
20	Osmanabad	24	2.09	50	1.80	5	9.62	2	7.04
21	Nanded	4	0.35	2	0.08	0	0.00	0	0.00
22	Parbhani	8	0.70	4	0.14	4	7.69	2	5.63
23	Hingoli	2	0.17	1	0.04	2	3.85	1	3.52
	Latur Dn.	54	4.69	67	2.41	14	26.92	6	20.42
24	Buldhana	82	7.12	123	4.44	0	0.00	0	0.00
25	Akola	5	0.43	8	0.27	0	0.00	0	0.00
26	Washim	0	0.00	0	0.00	0	0.00	0	0.00
27	Amravati	0	0.00	0	0.00	1	1.92	1	1.76
28	Yavatmal	0	0.00	0	0.00	0	0.00	0	0.00
	Amravati Dn.	87	7.56	131	4.71	1	1.92	1	1.76
29	Wardha	0	0.00	0	0.00	0	0.00	0	0.00
30	Nagpur	0	0.00	0	0.00	0	0.00	0	0.00
31	Bhandara	0	0.00	0	0.00	0	0.00	0	0.00
32	Gondia	0	0.00	0	0.00	0	0.00	0	0.00
33	Chandrapur	1	0.09	1	0.02	0	0.00	0	0.00
34	Gadchiroli	10	0.87	5	0.18	0	0.00	0	0.00
	Nagpur Dn.	11	0.96	6	0.20	0	0.00	0	0.00
	State Total	1151	100.00	2773	100.00	52	100.00	28	100.00

Sr.	District	Gram				Other Rabi Pulses			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	42	0.30	35	0.27	48	3.61	28	4.88
3	Raigad	16	0.11	13	0.10	92	6.92	43	7.51
4	Ratnagiri	0	0.00	0	0.00	67	5.04	29	5.01
5	Sindhudurg	0	0.00	0	0.00	47	3.53	24	4.16
	Konkan Dn.	58	0.41	48	0.37	254	19.10	124	21.56
6	Nasik	427	3.00	309	2.37	15	1.13	11	1.82
7	Dhule	314	2.21	409	3.14	1	0.08	1	0.10
8	Nandurbar	178	1.25	176	1.35	0	0.00	0	0.00
9	Jalgaon	634	4.46	631	4.85	0	0.00	0	0.00
	Nasik Dn.	1553	10.91	1524	11.72	16	1.20	11	1.92
10	Ahmednagar	1000	7.03	811	6.24	55	4.14	44	7.65
11	Pune	476	3.35	428	3.29	86	6.47	39	6.72
12	Solapur	367	2.58	253	1.94	1	0.08	0.3	0.04
	Pune Dn.	1843	12.95	1492	11.47	142	10.68	83	14.41
13	Satara	271	1.90	235	1.81	10	0.75	6	1.04
14	Sangli	292	2.05	324	2.49	2	0.15	1	0.23
15	Kolhapur	72	0.51	72	0.55	17	1.28	6	1.03
	Kolhapur Dn.	635	4.46	631	4.85	29	2.18	13	2.30
16	Aurangabad	599	4.21	557	4.29	0	0.00	0	0.00
17	Jalna	272	1.91	204	1.57	0	0.00	0	0.00
18	Beed	511	3.59	358	2.75	14	1.05	7	1.22
	Aurangabad Dn.	1382	9.71	1119	8.61	14	1.05	7	1.22
19	Latur	751	5.28	692	5.32	8	0.60	4	0.63
20	Osmanabad	724	5.09	626	4.81	8	0.60	3	0.52
21	Nanded	529	3.72	468	3.60	0	0.00	0	0.00
22	Parbhani	588	4.13	377	2.90	18	1.35	10	1.75
23	Hingoli	429	3.01	289	2.22	5	0.38	2	0.35
	Latur Dn.	3021	21.23	2450	18.85	39	2.93	19	3.25
24	Buldhana	801	5.63	731	5.63	0	0.00	0	0.00
25	Akola	785	5.52	1150	8.85	0	0.00	0	0.00
26	Washim	784	5.51	853	6.56	0	0.00	0	0.00
27	Amravati	754	5.30	854	6.57	20	1.50	7	1.22
28	Yavatmal	590	4.15	617	4.75	0	0.00	0	0.00
	Amravati Dn.	3714	26.10	4206	32.35	20	1.50	7	1.22
29	Wardha	402	2.83	292	2.24	0	0.00	0	0.00
30	Nagpur	973	6.84	855	6.58	36	2.71	18	3.13
31	Bhandara	114	0.80	82	0.63	205	15.41	92	16.03
32	Gondia	51	0.36	27	0.21	142	10.68	50	8.64
33	Chandrapur	453	3.18	255	1.96	254	19.10	89	15.45
34	Gadchiroli	31	0.22	20	0.15	179	13.46	63	10.89
	Nagpur Dn.	2024	14.22	1531	11.78	816	61.35	312	54.12
	State Total	14230	100.00	13001	100.00	1330	100.00	576	100.00

Sr.	District	Safflower				Linseed			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	0	0.00	0	0.00
3	Raigad	0	0.00	0	0.00	0	0.00	0	0.00
4	Ratnagiri	0	0.00	0	0.00	0	0.00	0	0.00
5	Sindhudurg	0	0.00	0	0.00	0	0.00	0	0.00
	Konkan Dn.	0	0.00	0	0.00	0	0.00	0	0.00
6	Nasik	1	0.06	1	0.06	0	0.00	0	0.00
7	Dhule	0	0.00	0	0.00	0	0.00	0	0.00
8	Nandurbar	7	0.45	2	0.25	0	0.00	0	0.00
9	Jalgaon	3	0.19	3	0.34	0	0.00	0	0.00
	Nasik Dn.	11	0.71	6	0.65	0	0.00	0	0.00
10	Ahmednagar	65	4.17	44	4.92	5	1.21	1	1.15
11	Pune	19	1.22	7	0.80	1	0.24	0.3	0.28
12	Solapur	65	4.17	32	3.60	1	0.24	0.3	0.28
	Pune Dn.	149	9.55	84	9.32	7	1.69	2	1.71
13	Satara	23	1.47	8	0.90	0	0.00	0	0.00
14	Sangli	50	3.21	22	2.45	0	0.00	0	0.00
15	Kolhapur	0	0.00	0	0.00	0	0.00	0	0.00
	Kolhapur Dn.	73	4.68	30	3.34	0	0.00	0	0.00
16	Aurangabad	20	1.28	18	1.95	4	0.97	1	1.22
17	Jalna	76	4.87	49	5.48	2	0.48	0.8	0.78
18	Beed	84	5.38	40	4.48	14	3.39	3	3.18
	Aurangabad Dn.	180	11.54	107	11.91	20	4.84	6	5.18
19	Latur	154	9.87	103	11.52	9	2.18	3	2.49
20	Osmanabad	289	18.53	169	18.84	61	14.77	12	11.03
21	Nanded	56	3.59	45	4.99	0	0.00	0	0.00
22	Parbhani	349	22.37	162	18.00	15	3.63	5	4.15
23	Hingoli	257	16.47	172	19.13	5	1.21	2	1.38
	Latur Dn.	1105	70.83	651	72.48	90	21.79	21	19.06
24	Buldhana	19	1.22	12	1.32	0	0.00	0	0.00
25	Akola	13	0.83	3	0.36	0	0.00	0	0.00
26	Washim	4	0.26	3	0.30	0	0.00	0	0.00
27	Amravati	4	0.26	2	0.22	0	0.00	0	0.00
28	Yavatmal	1	0.06	1	0.06	0	0.00	0	0.00
	Amravati Dn.	41	2.63	20	2.26	0	0.00	0	0.00
29	Wardha	0	0.00	0	0.00	1	0.24	1	0.55
30	Nagpur	0	0.00	0	0.00	14	3.39	6	5.31
31	Bhandara	0	0.00	0	0.00	48	11.62	13	12.19
32	Gondia	0	0.00	0	0.00	102	24.70	24	22.22
33	Chandrapur	1	0.06	0.3	0.04	98	23.73	30	27.39
34	Gadchiroli	0	0.00	0	0.00	33	7.99	7	6.41
	Nagpur Dn.	1	0.06	0	0.04	296	71.67	80	74.06
	State Total	1560	100.00	898	100.00	413	100.00	108	100.00

Sr.	District	Rabi Sesamum				Sunflower			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	4	11.76	2	21.75	0	0.00	0	0.00
3	Raigad	0	0.00	0	0.00	0	0.00	0	0.00
4	Ratnagiri	0	0.00	0	0.00	0	0.00	0	0.00
5	Sindhudurg	0	0.00	0	0.00	0	0.00	0	0.00
	Konkan Dn.	4	11.76	2	21.75	0	0.00	0	0.00
6	Nasik	0	0.00	0	0.00	0	0.00	0	0.00
7	Dhule	0	0.00	0	0.00	0	0.00	0	0.00
8	Nandurbar	0	0.00	0	0.00	0	0.00	0	0.00
9	Jalgaon	0	0.00	0	0.00	8	0.88	5	0.76
	Nasik Dn.	0	0.00	0	0.00	8	0.88	5	0.76
10	Ahmednagar	1	2.94	0.3	3.26	8	0.88	6	0.93
11	Pune	4	11.76	1	13.05	14	1.54	5	0.83
12	Solapur	0	0.00	0	0.00	90	9.88	52	8.24
	Pune Dn.	5	14.71	2	16.31	112	12.29	63	10.00
13	Satara	0	0.00	0	0.00	3	0.33	2	0.38
14	Sangli	0	0.00	0	0.00	53	5.82	50	7.96
15	Kolhapur	0	0.00	0	0.00	5	0.55	6	0.91
	Kolhapur Dn.	0	0.00	0	0.00	61	6.70	59	9.25
16	Aurangabad	0	0.00	0	0.00	17	1.87	9	1.34
17	Jalna	0	0.00	0	0.00	4	0.44	2	0.35
18	Beed	0	0.00	0	0.00	17	1.87	9	1.38
	Aurangabad Dn.	0	0.00	0	0.00	38	4.17	19	3.07
19	Latur	0	0.00	0	0.00	183	20.09	130	20.53
20	Osmanabad	0	0.00	0	0.00	295	32.38	193	30.50
21	Nanded	2	5.88	1	5.44	44	4.83	28	4.38
22	Parbhani	0	0.00	0	0.00	58	6.37	37	5.87
23	Hingoli	0	0.00	0	0.00	25	2.74	14	2.14
	Latur Dn.	2	5.88	1	5.44	605	66.41	401	63.42
24	Buldhana	0	0.00	0	0.00	28	3.07	28	4.43
25	Akola	0	0.00	0	0.00	33	3.62	33	5.22
26	Washim	0	0.00	0	0.00	0	0.00	0	0.00
27	Amravati	0	0.00	0	0.00	22	2.41	22	3.48
28	Yavatmal	0	0.00	0	0.00	0	0.00	0	0.00
	Amravati Dn.	0	0.00	0	0.00	83	9.11	83	13.12
29	Wardha	0	0.00	0	0.00	0	0.00	0	0.00
30	Nagpur	0	0.00	0	0.00	3	0.33	2	0.28
31	Bhandara	0	0.00	0	0.00	1	0.11	1	0.09
32	Gondia	0	0.00	0	0.00	0	0.00	0	0.00
33	Chandrapur	1	2.94	0.4	4.35	0	0.00	0	0.00
34	Gadchiroli	22	64.71	5	52.15	0	0.00	0	0.00
	Nagpur Dn.	23	67.65	5	56.50	4	0.44	2	0.38
	State Total	34	100.00	9	100.00	911	100.00	633	100.00

Sr.	District	Other Rabi Oilseeds				Summer Rice			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	2	2.60	1	2.64	23	7.21	55	8.75
3	Raigad	1	1.30	0.4	1.25	16	5.02	41.8	6.67
4	Ratnagiri	1	1.30	0.4	1.35	1	0.31	3.1	0.50
5	Sindhudurg	1	1.30	0.4	1.39	40	12.54	81.8	13.05
	Konkan Dn.	5	6.49	2	6.64	80	25.08	182	28.96
6	Nasik	2	2.60	1	3.84	0	0.00	0	0.00
7	Dhule	5	6.49	2	6.77	0	0.00	0	0.00
8	Nandurbar	2	2.60	1	2.32	0	0.00	0	0.00
9	Jalgaon	1	1.30	1	2.36	0	0.00	0	0.00
	Nasik Dn.	10	12.99	5	15.29	0	0.00	0	0.00
10	Ahmednagar	0	0.00	0	0.00	0	0.00	0	0.00
11	Pune	1	1.30	0.5	1.52	0	0.00	0.0	0.00
12	Solapur	0	0.00	0	0.00	0	0.00	0	0.00
	Pune Dn.	1	1.30	0	1.52	0	0.00	0	0.00
13	Satara	6	7.79	3	10.16	0	0.00	0	0.00
14	Sangli	4	5.19	2	8.13	0	0.00	0	0.00
15	Kolhapur	0	0.00	0	0.00	5	1.57	15	2.45
	Kolhapur Dn.	10	12.99	5	18.29	5	1.57	15	2.45
16	Aurangabad	0	0.00	0	0.00	0	0.00	0	0.00
17	Jalna	6	7.79	2	7.11	0	0.00	0	0.00
18	Beed	4	5.19	1	4.74	0	0.00	0	0.00
	Aurangabad Dn.	10	12.99	4	11.85	0	0.00	0	0.00
19	Latur	7	9.09	2	7.11	0	0.00	0	0.00
20	Osmanabad	6	7.79	2	6.10	0	0.00	0	0.00
21	Nanded	1	1.30	0.3	1.02	0	0.00	0.0	0.00
22	Parbhani	5	6.49	2	7.62	0	0.00	0	0.00
23	Hingoli	0	0.00	0	0.00	0	0.00	0	0.00
	Latur Dn.	19	24.68	6	21.85	0	0.00	0	0.00
24	Buldhana	0	0.00	0	0.00	0	0.00	0	0.00
25	Akola	0	0.00	0	0.00	0	0.00	0	0.00
26	Washim	0	0.00	0	0.00	0	0.00	0	0.00
27	Amravati	3	3.90	1	2.54	0	0.00	0	0.00
28	Yavatmal	0	0.00	0	0.00	0	0.00	0	0.00
	Amravati Dn.	3	3.90	1	2.54	0	0.00	0	0.00
29	Wardha	0	0.00	0	0.00	0	0.00	0	0.00
30	Nagpur	1	1.30	0.4	1.19	1	0.31	1.8	0.29
31	Bhandara	3	3.90	1	3.56	79	24.76	157	25.04
32	Gondia	3	3.90	1	3.05	110	34.48	203	32.40
33	Chandrapur	3	3.90	2	5.08	19	5.96	26	4.20
34	Gadchiroli	9	11.69	3	9.14	25	7.84	42	6.66
	Nagpur Dn.	19	24.68	7	22.02	234	73.35	430	68.59
	State Total	77	100.00	30	100.00	319	100.00	627	100.00

Sr.	District	Summer Maize				Summer Groundnut			
		A	%	P	%	A	%	P	%
1	Mumbai								
2	Thane	0	0.00	0	0.00	2	0.24	4	0.30
3	Raigad	0	0.00	0.0	0.00	2	0.24	3.2	0.27
4	Ratnagiri	0	0.00	0.0	0.00	2	0.24	4.7	0.39
5	Sindhudurg	0	0.00	0.0	0.00	34	4.13	75.0	6.27
	Konkan Dn.	0	0.00	0	0.00	40	4.85	86	7.23
6	Nasik	14	6.28	19	6.01	19	2.31	24	1.97
7	Dhule	7	3.14	8	2.58	68	8.25	84	7.04
8	Nandurbar	11	4.93	14	4.60	83	10.07	131	10.92
9	Jalgaon	17	7.62	26	8.43	30	3.64	40	3.35
	Nasik Dn.	49	21.97	68	21.62	200	24.27	279	23.29
10	Ahmednagar	23	10.31	34	10.78	62	7.52	94	7.88
11	Pune	17	7.62	28.6	9.13	44	5.34	81.6	6.82
12	Solapur	22	9.87	36	11.54	43	5.22	54	4.49
	Pune Dn.	62	27.80	99	31.45	149	18.08	229	19.18
13	Satara	13	5.83	21	6.68	35	4.25	85	7.08
14	Sangli	15	6.73	23	7.44	6	0.73	12	1.00
15	Kolhapur	15	6.73	30	9.48	27	3.28	70	5.87
	Kolhapur Dn.	43	19.28	74	23.61	68	8.25	167	13.95
16	Aurangabad	3	1.35	4	1.22	2	0.24	2	0.20
17	Jalna	3	1.35	1	0.32	8	0.97	8	0.65
18	Beed	8	3.59	8	2.46	21	2.55	20	1.67
	Aurangabad Dn.	14	6.28	13	4.00	31	3.76	30	2.51
19	Latur	25	11.21	30	9.53	6	0.73	5	0.40
20	Osmanabad	9	4.04	7	2.34	38	4.61	46	3.87
21	Nanded	0	0.00	0.0	0.00	65	7.89	84.7	7.08
22	Parbhani	7	3.14	7	2.19	55	6.67	52	4.32
23	Hingoli	5	2.24	6	2.04	46	5.58	53	4.47
	Latur Dn.	46	20.63	50	16.10	210	25.49	241	20.15
24	Buldhana	3	1.35	4	1.39	6	0.73	6	0.51
25	Akola	2	0.90	1	0.36	13	1.58	15	1.26
26	Washim	0	0.00	0	0.00	4	0.49	5	0.39
27	Amravati	0	0.00	0	0.00	7	0.85	14	1.13
28	Yavatmal	4	1.79	5	1.48	71	8.62	93	7.74
	Amravati Dn.	9	4.04	10	3.23	101	12.26	132	11.04
29	Wardha	0	0.00	0	0.00	17	2.06	23	1.89
30	Nagpur	0	0.00	0.0	0.00	5	0.61	5.8	0.49
31	Bhandara	0	0.00	0	0.00	2	0.24	2	0.18
32	Gondia	0	0.00	0	0.00	0	0.00	0	0.00
33	Chandrapur	0	0.00	0	0.00	1	0.12	1	0.10
34	Gadchiroli	0	0.00	0	0.00	0	0.00	0	0.00
	Nagpur Dn.	0	0.00	0	0.00	25	3.03	32	2.65
	State Total	223	100.00	313	100.00	824	100.00	1196	100.00

Sr.	District	Summer Sunflower			
		A	%	P	%
1	Mumbai				
2	Thane	0	0.00	0	0.00
3	Raigad	0	0.00	0.0	0.00
4	Ratnagiri	0	0.00	0.0	0.00
5	Sindhudurg	0	0.00	0.0	0.00
	Konkan Dn.	0	0.00	0	0.00
6	Nasik	0	0.00	0	0.00
7	Dhule	0	0.00	0	0.00
8	Nandurbar	1	1.04	1	1.06
9	Jalgaon	4	4.17	4	4.54
	Nasik Dn.	5	5.21	4	5.59
10	Ahmednagar	1	1.04	1	1.23
11	Pune	4	4.17	3.4	4.35
12	Solapur	4	4.17	3	3.50
	Pune Dn.	9	9.38	7	9.08
13	Satara	0	0.00	0	0.00
14	Sangli	2	2.08	2	2.25
15	Kolhapur	6	6.25	9	10.97
	Kolhapur Dn.	8	8.33	10	13.22
16	Aurangabad	1	1.04	1	1.12
17	Jalna	1	1.04	1	1.28
18	Beed	6	6.25	3	4.39
	Aurangabad Dn.	8	8.33	5	6.80
19	Latur	5	5.21	3	3.79
20	Osmanabad	12	12.50	7	9.56
21	Nanded	17	17.71	12.3	15.81
22	Parbhani	6	6.25	3	4.45
23	Hingoli	2	2.08	2	1.93
	Latur Dn.	42	43.75	28	35.54
24	Buldhana	3	3.13	3	3.53
25	Akola	12	12.50	12	15.29
26	Washim	0	0.00	0	0.00
27	Amravati	1	1.04	1	1.02
28	Yavatmal	0	0.00	0	0.00
	Amravati Dn.	16	16.67	15	19.84
29	Wardha	0	0.00	0	0.00
30	Nagpur	7	7.29	7.0	8.91
31	Bhandara	1	1.04	1	1.02
32	Gondia	0	0.00	0	0.00
33	Chandrapur	0	0.00	0	0.00
34	Gadchiroli	0	0.00	0	0.00
	Nagpur Dn.	8	8.33	8	9.93
	State Total	96	100.00	78	100.00

Chapter 2

Comparison of Minimum Support Price and Cost of Production

Minimum Support prices can play an important role in the agricultural economy by providing stimulus to farmers regarding their farming decisions and also encourages them to invest more in agriculture. In this chapter an attempt has been made to compare the MSP with cost of production of selected crops in selected states in order to observe if MSP covers cost of production.

2.1 Minimum Support Price for Various commodities:

In Table 2.1, the MSP fixed for selected agricultural commodities is presented from 1990-91 to 2011-12.

Table 2.1 Minimum Support Prices (Rs per quintal) for selected crops (1990-91 to 2011-2012)

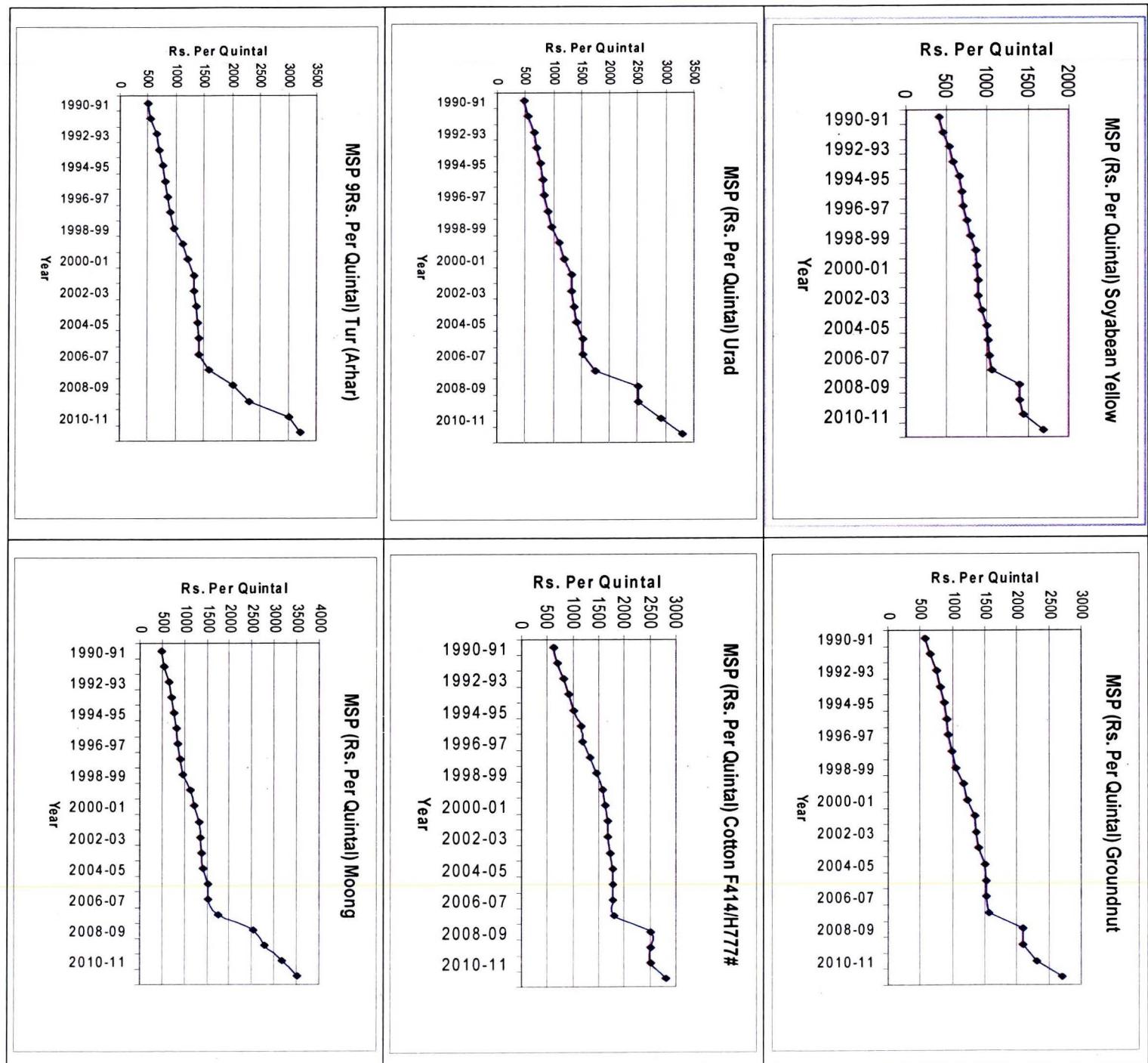
Crop	1990-91	1991-92	1992-93	1993-94	1994-95	1995-96	1996-97	1997-98	1998-99	1999-00
Paddy Common	205	230	270	310	340	360	380	415	440	490
Jowar hybrid	180	205	240	260	280	300	310	360	390	415
Bajara	180	205	240	260	280	300	310	360	390	415
Maize	180	210	245	265	290	310	320	360	390	415
Ragi	180	205	240	260	280	300	310	360	390	415
Tur(Arhar)	480	545	640	700	760	800	840	900	960	1105
Moong	480	545	640	700	760	800	840	900	960	1105
Urad	480	545	640	700	760	800	840	900	960	1105
Groundnut	580	645	750	800	860	900	920	980	1040	1155
Soyabean Black	350	395	475	525	570	600	620	670	705	755
Soyabean Yellow	400	445	525	580	650	680	700	750	795	845
Cotton F414/H777	620	695	800	900	1000	1150	1180	1330	1440	1575

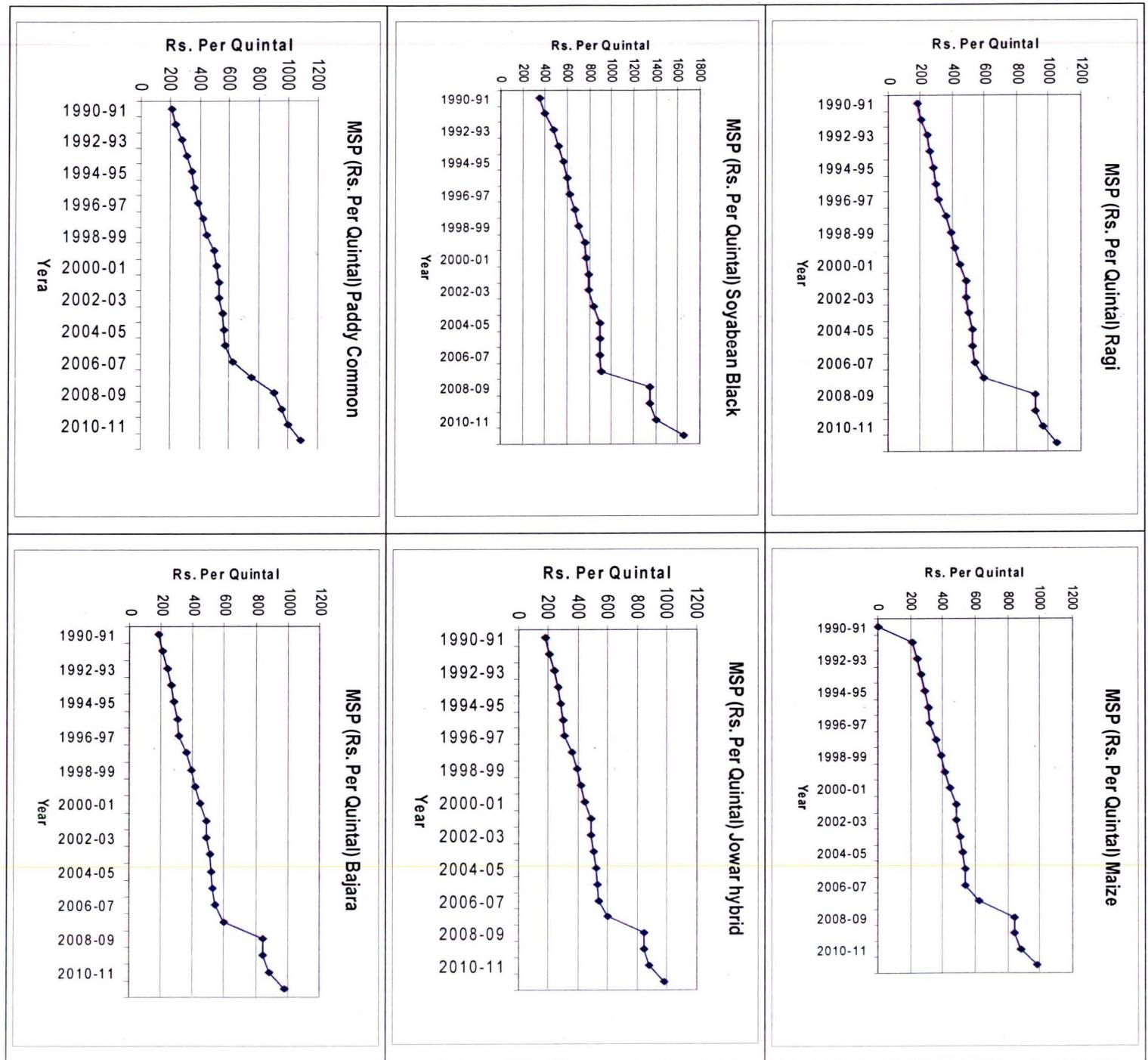
Report of the Study Group on Minimum Support Price of Selected Agriculture Produce in Maharashtra State

Crop	2000-01	2001-02	2002-03	2003-04	2004-05	2005-06	2006-07	2007-08	2008-09	2009-10	2010-11	2011-12
Paddy Common	510	530	530	550	560	570	620	745	900	950	1000	1080
Jowar hybrid	445	485	485	505	515	525	540	600	840	840	880	980
Bajara	445	485	485	505	515	525	540	600	840	840	880	980
Maize	445	485	485	505	525	540	540	620	840	840	880	980
Ragi	445	485	485	505	525	525	540	600	915	915	965	1050
Tur(Arh ar)	1200	1320	1320	1360	1390	1400	1410	1590	2000	2300	3000	3200
Moong	1200	1320	1330	1370	1410	1520	1520	1740	2520	2760	3170	3500
Urad	1200	1320	1330	1370	1410	1520	1520	1740	2520	2520	2920	3300
Ground nut	1220	1340	1355	1400	1500	1520	1520	1550	2100	2100	2300	2700
Soyabean Black	775	795	795	840	900	900	900	910	1350	1350	1400	1650
Soyabean Yellow	865	885	885	930	1000	1010	1020	1050	1390	1390	1440	1690
Cotton F414/H 777	1625	1675	1675	1725	1760	1760	1770	1800	2500	2500	2500	2800

Source : Reports of the Commission for Agricultural Costs and Prices, Dept. of Agriculture and Cooperation, Ministry of Agriculture, Government of India (Various issues)

From Table 2.1, it can be observed that over the 22 year period, i.e. from 1990-91 to 2011-12, there has been a continuous increase in MSP. The same can be observed in the graphs presented below:





In Table 2.2, the growth rate of MSP over the 22 year period is presented.

Table 2.2 Growth rate of MSP (1990-91 to 2011-12)

Variables	Growth Rate (percent per annum)
Paddy Common	7.22
Jowar hybrid	7.47
Bajara	7.47
Maize	7.39
Ragi	7.84
Tur(Arhar)	7.96
Moong	8.71
Urad	11.16
Groundnut	6.49
Soyabean Black	6.14
Soyabean Yellow	5.76
Cotton F414/H777	6.39

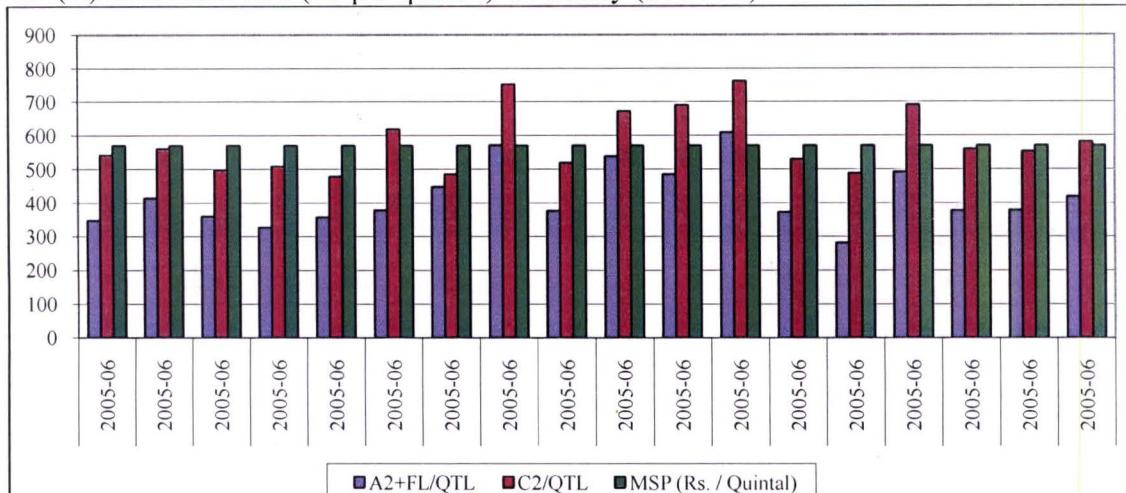
From Table 2.2, it can be observed that during the period 1990 -91 to 2011-12, MSPs grew at the rate of 6 to 8 percent by and large for most crops under consideration. Urad showed highest growth rate in MSP which was 11.16 percent per annum.

The cost of production of crops also showed an increase and comparison of MSP with cost is indicated in the next section for the years 2005-06, 2006-07 and 2009-10.

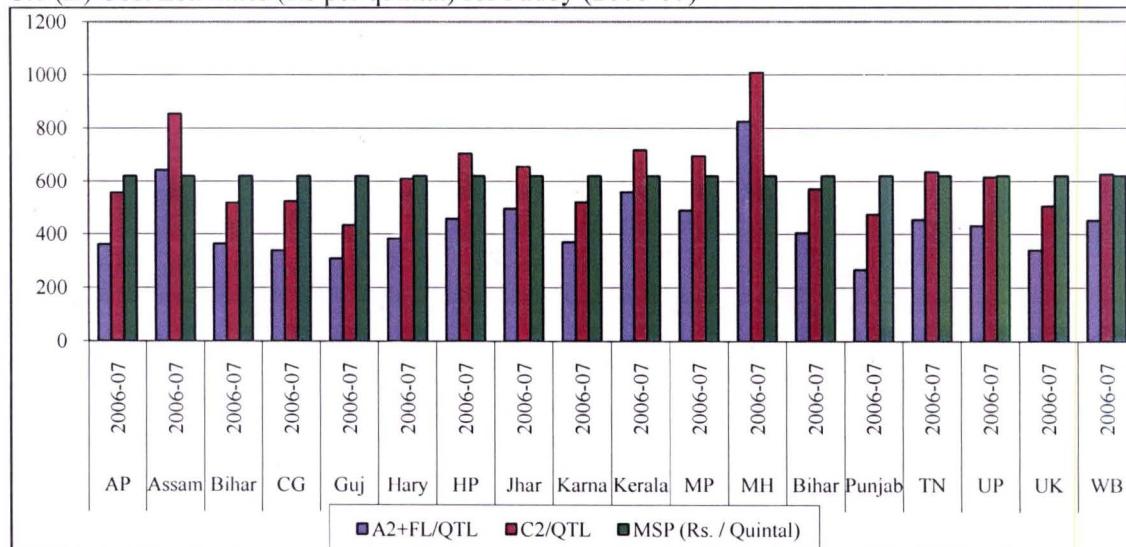
2.1 Comparison of MSP with Cost A2+FL and C2:

In this section, an attempt has been made to compare Cost A2+FL and C2 with MSP.

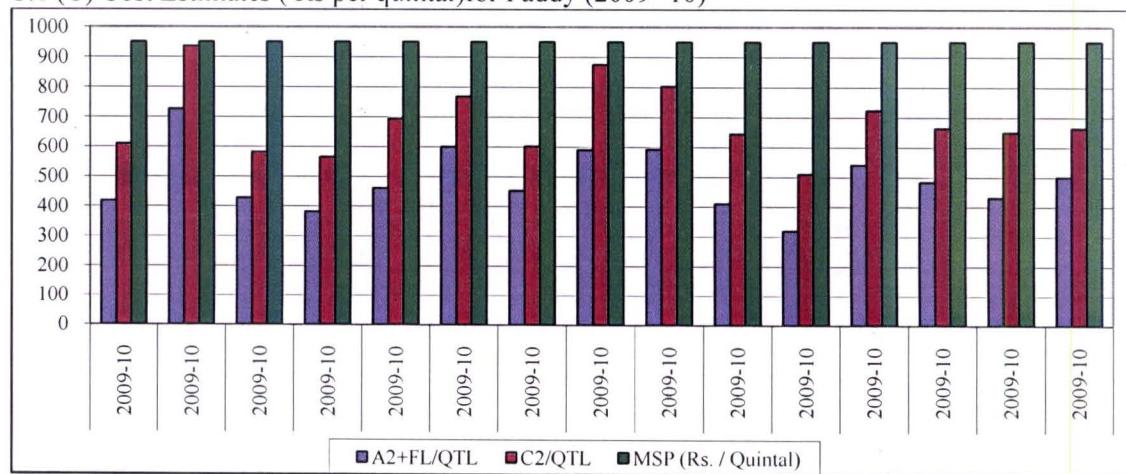
G.1 (A) Cost Estimates (Rs per quintal) for Paddy (2005-06)



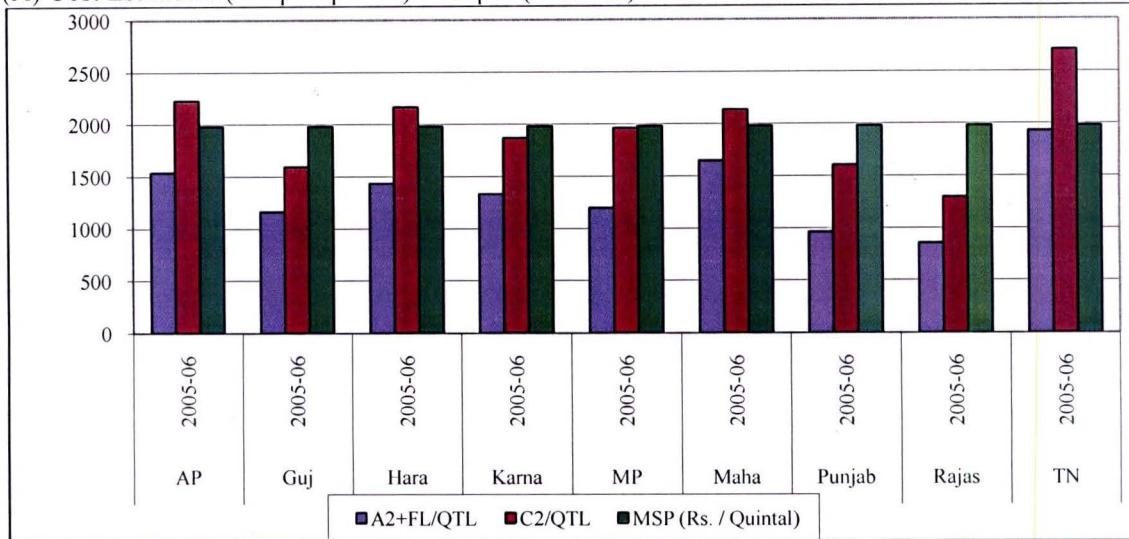
G.1 (B) Cost Estimates (Rs per quintal) for Paddy (2006-07)



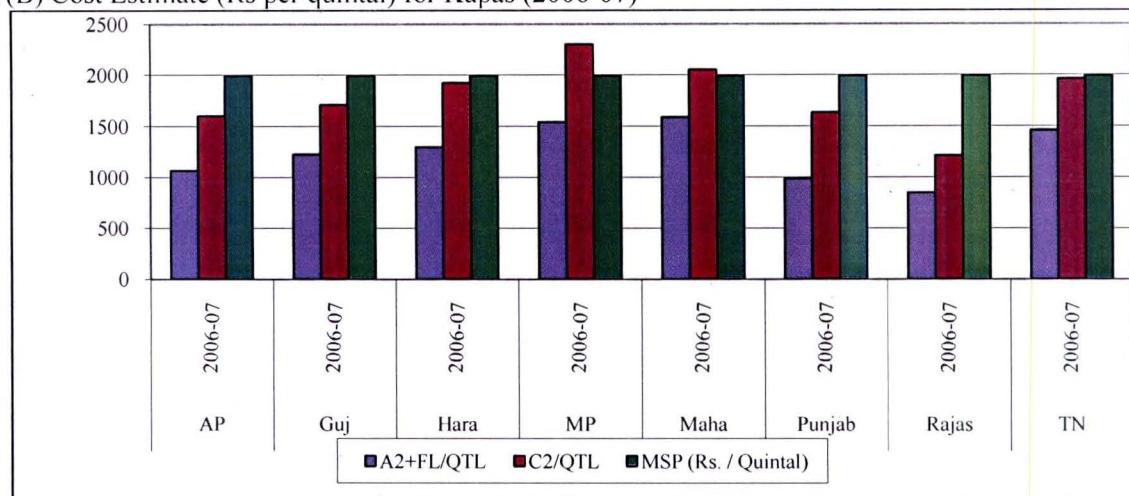
G.1 (C) Cost Estimates (Rs per quintal)for Paddy (2009- 10)



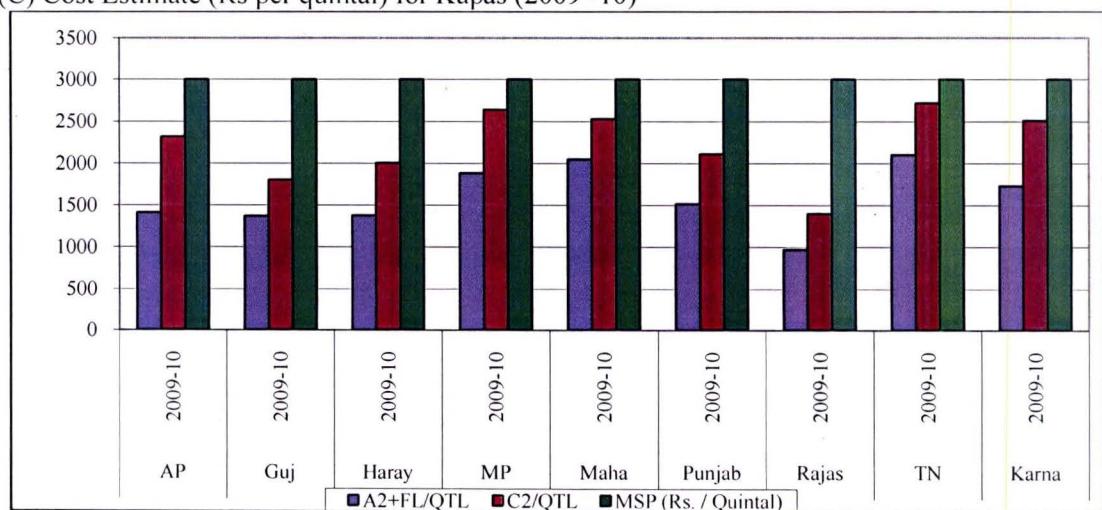
G2 (A) Cost Estimates (Rs per quintal)of Kapas (2005-06)



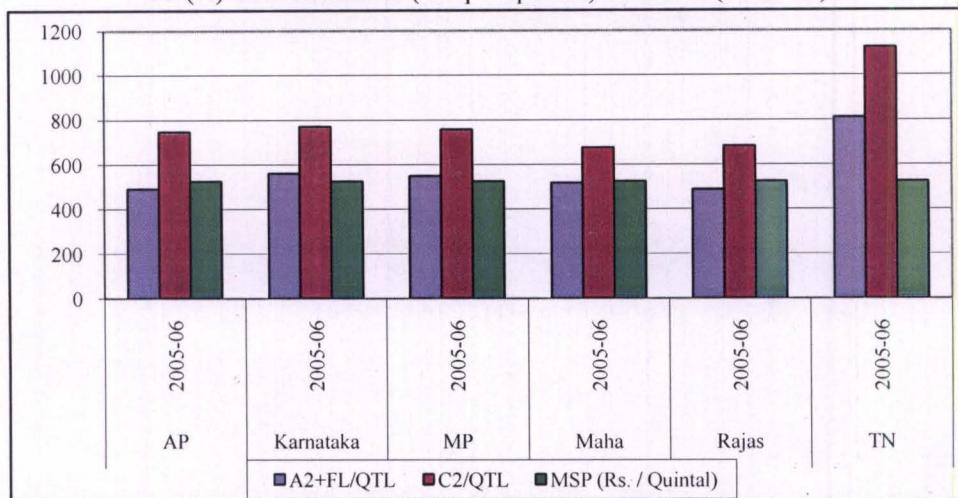
G2 (B) Cost Estimate (Rs per quintal) for Kapas (2006-07)



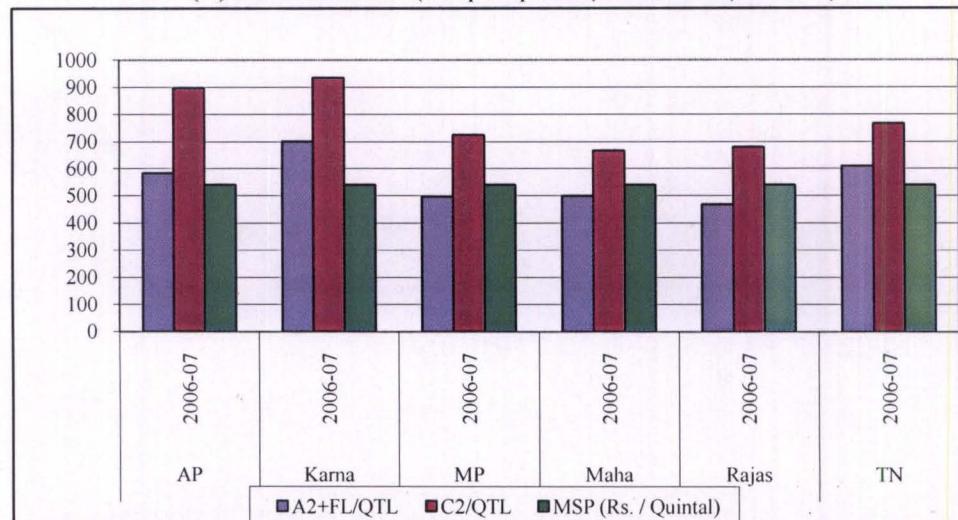
G 2 (C) Cost Estimate (Rs per quintal) for Kapas (2009 -10)



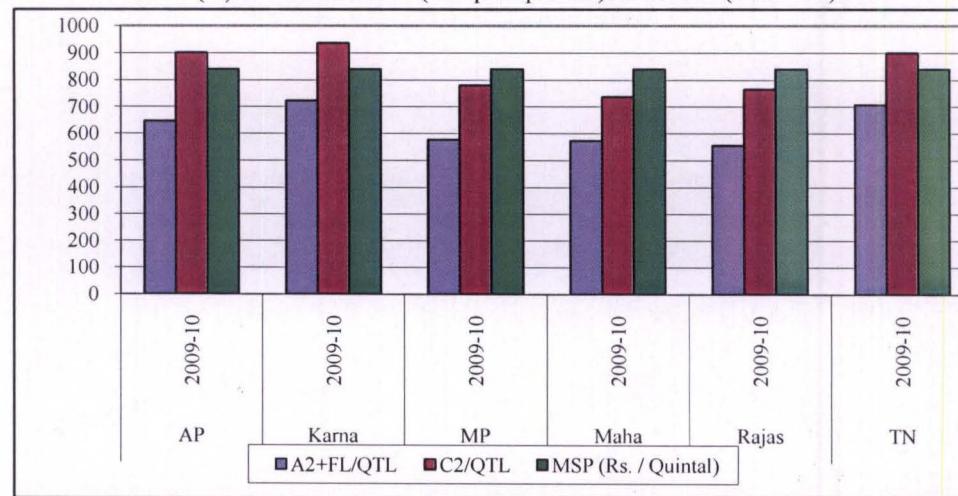
G3 (A) Cost Estimates (Rs per quintal)for Jowar (2005-06)



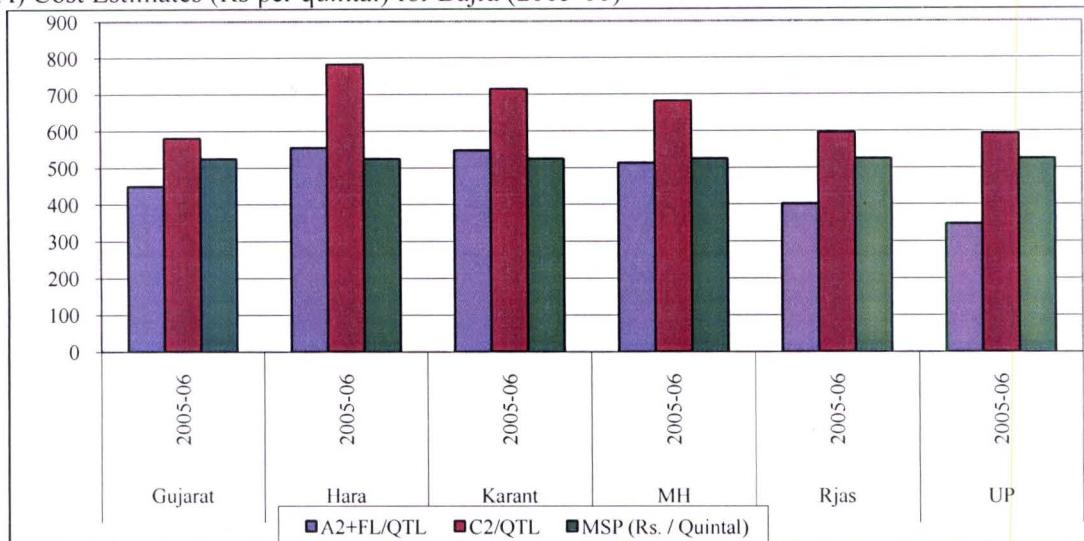
G 3 (B) Cost Estimates (Rs per quintal) for Jowar (2006-07)



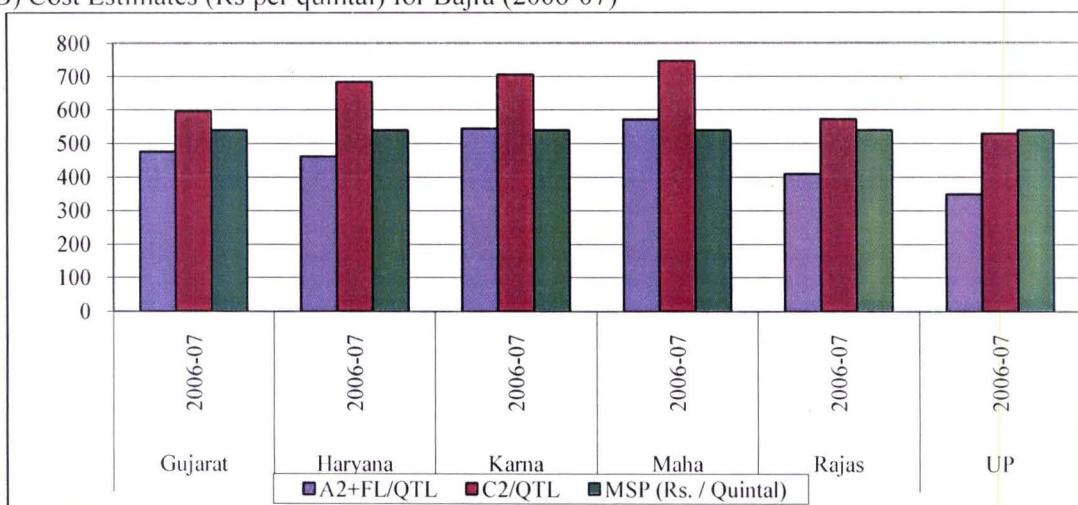
G 3 (C) Cost Estimates (Rs per quintal)for Jowar (2009-10)



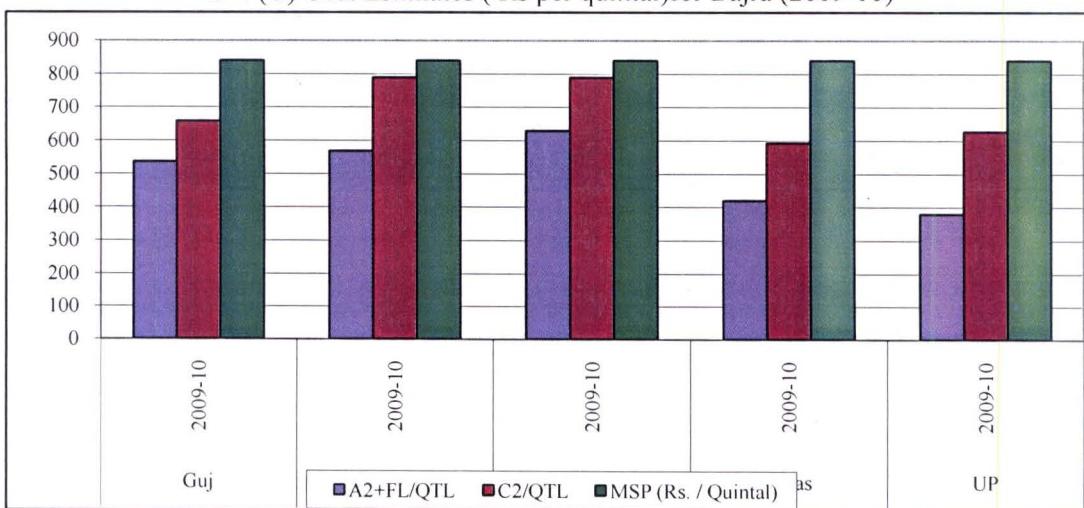
G 4 (A) Cost Estimates (Rs per quintal) for Bajra (2005-06)



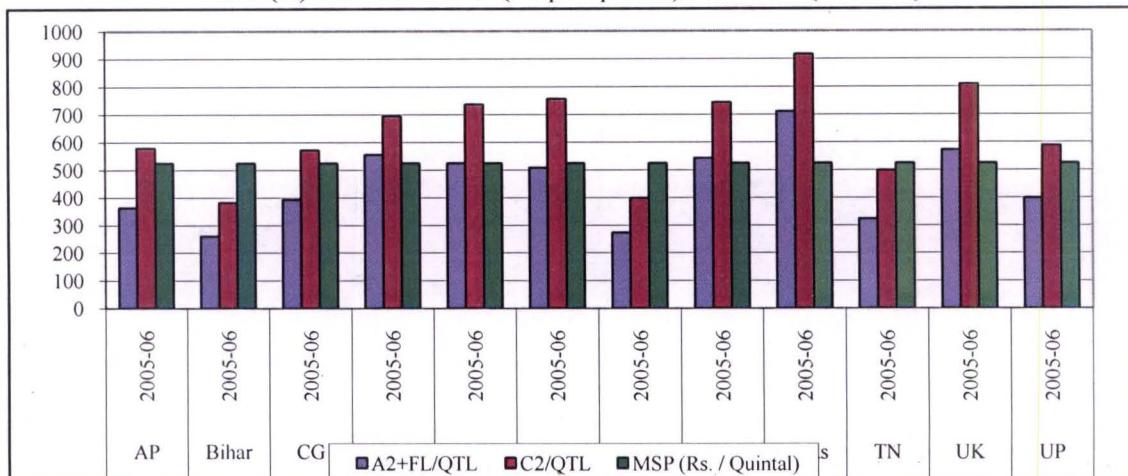
G 4 (B) Cost Estimates (Rs per quintal) for Bajra (2006-07)



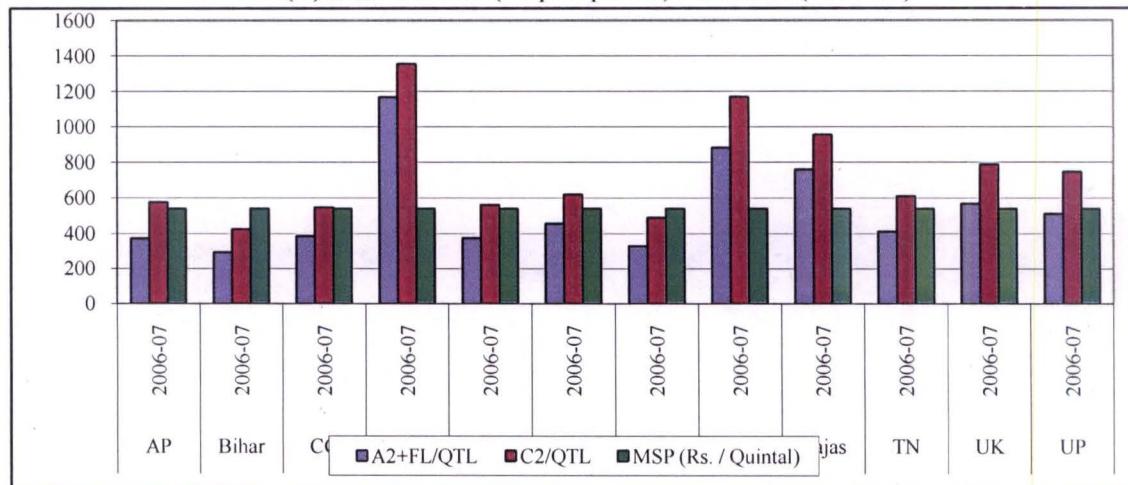
G-4 (C) Cost Estimates (Rs per quintal)for Bajra (2009-10)



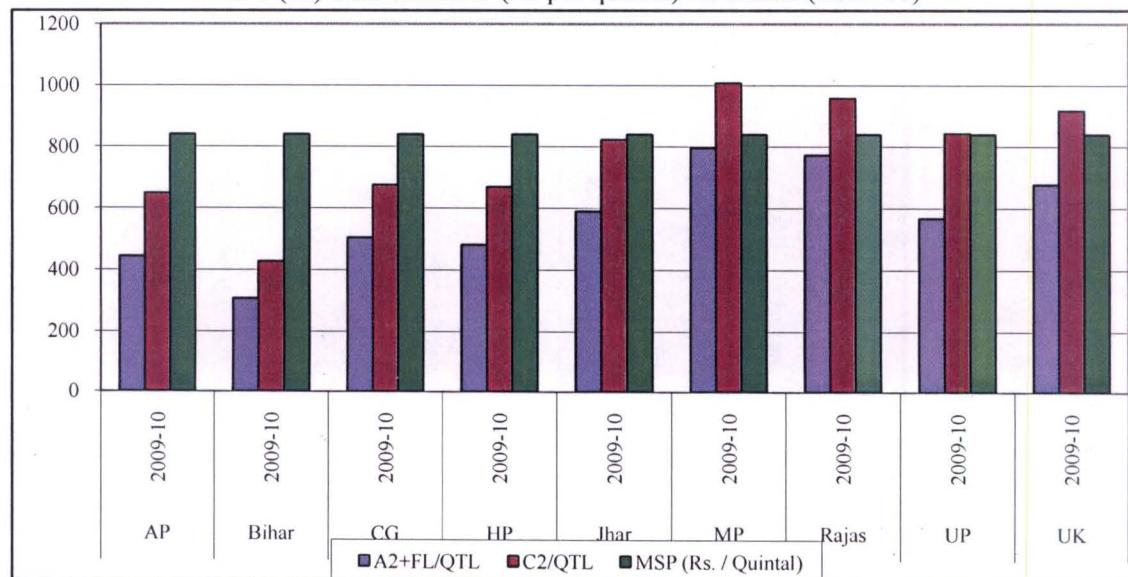
G-5 (A) Cost Estimates (Rs per quintal) for Maize (2005-06)



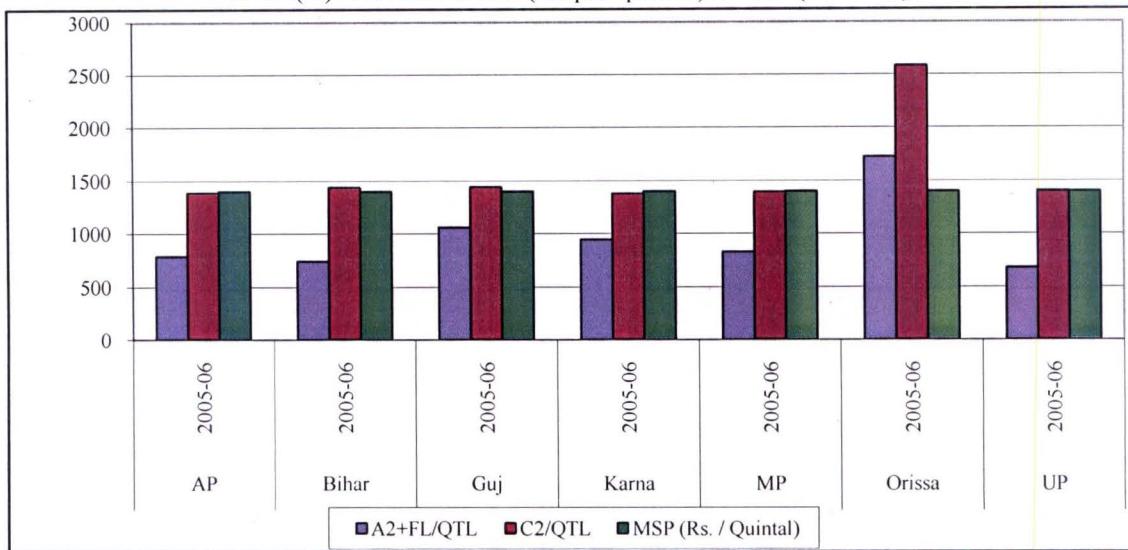
G-5 (B) Cost estimate (Rs per quintal) for Maize (2006-07)



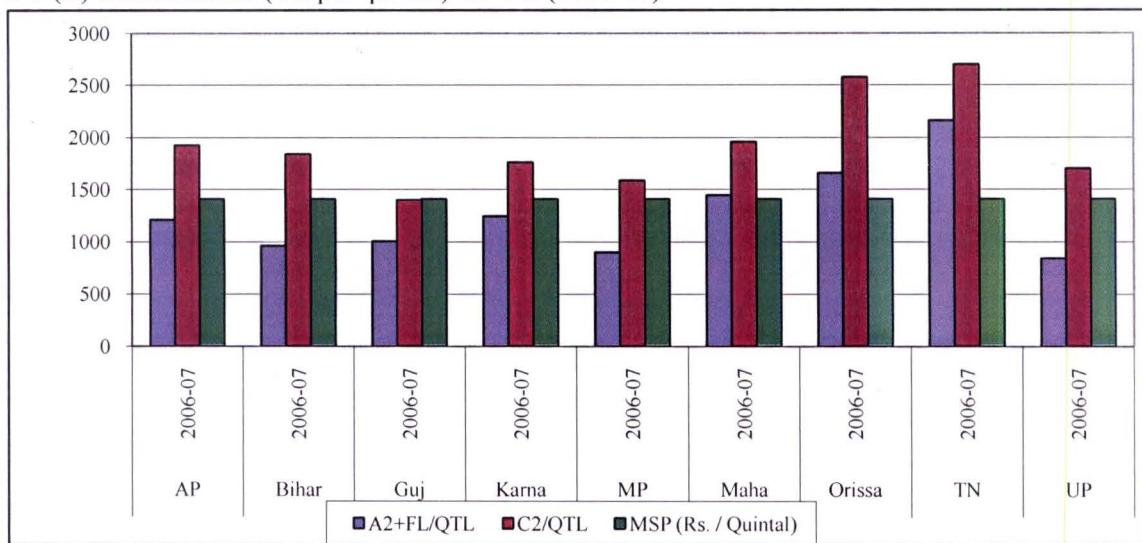
G 5 (C) Cost estimate (Rs per quintal) for Maize (2009-10)



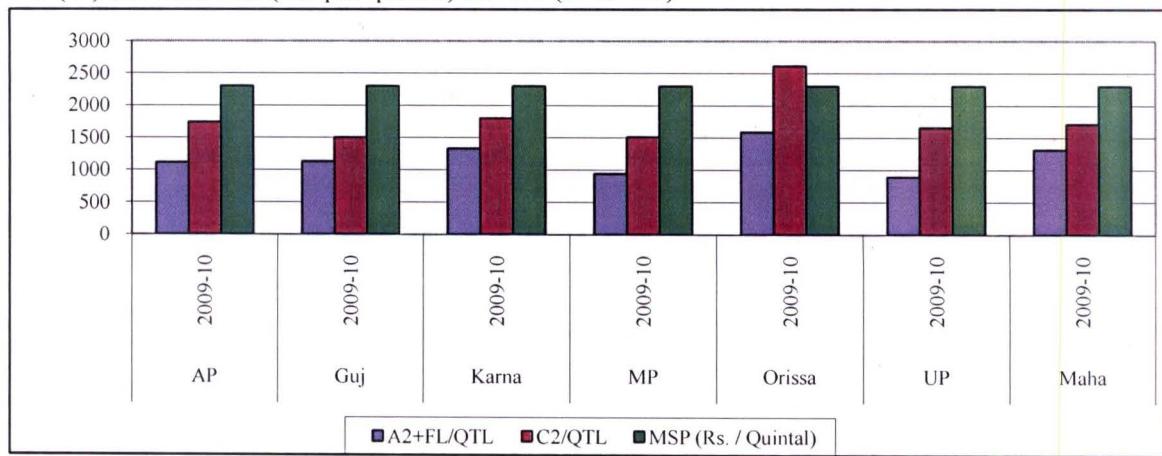
G -6 (A) Cost Estimates (Rs per quintal)for Tur (2005-06)



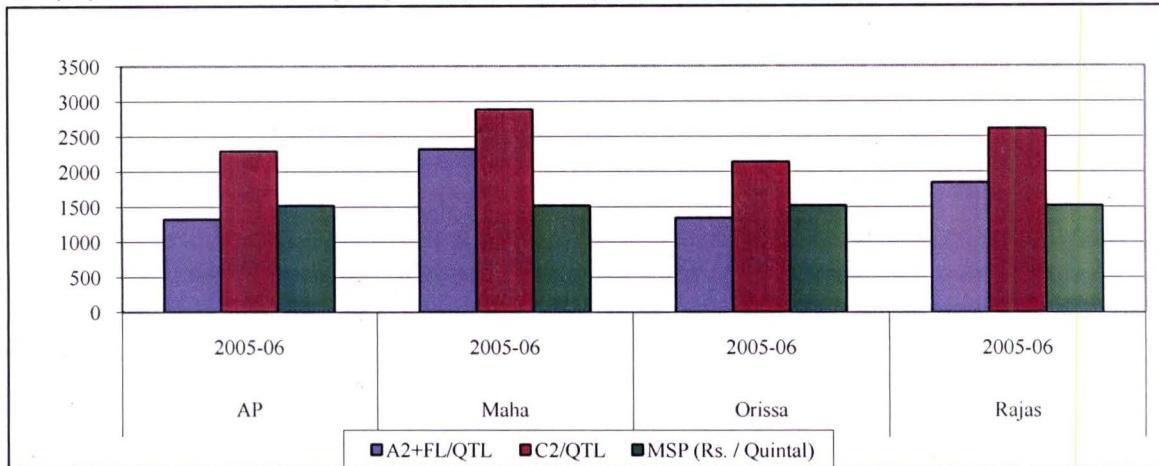
G 6 (B) Cost Estimate (Rs per quintal) for Tur (2006-07)



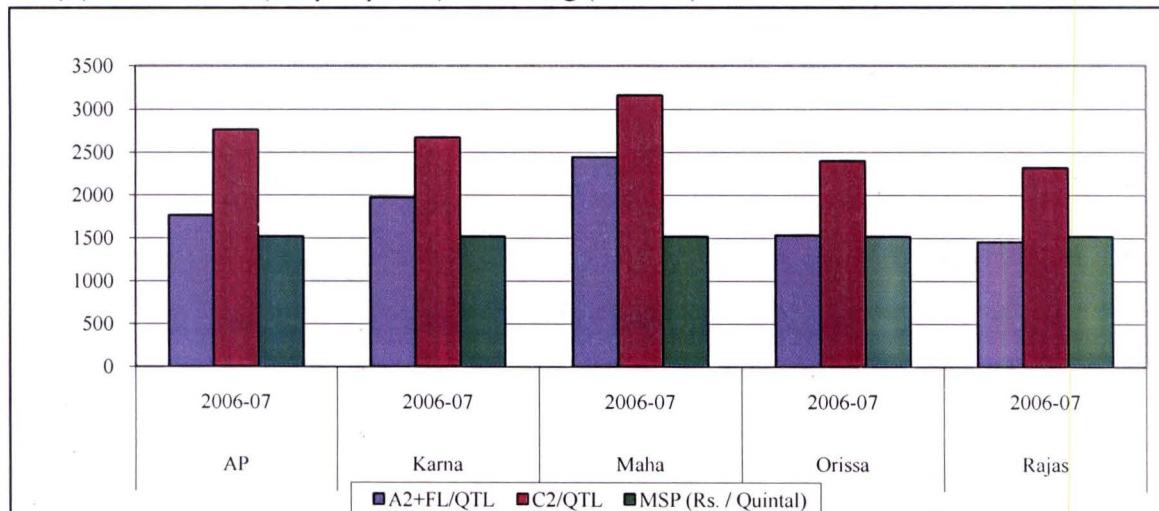
G-6 (C) Cost estimate (Rs per quintal) for Tur (2009- 10)



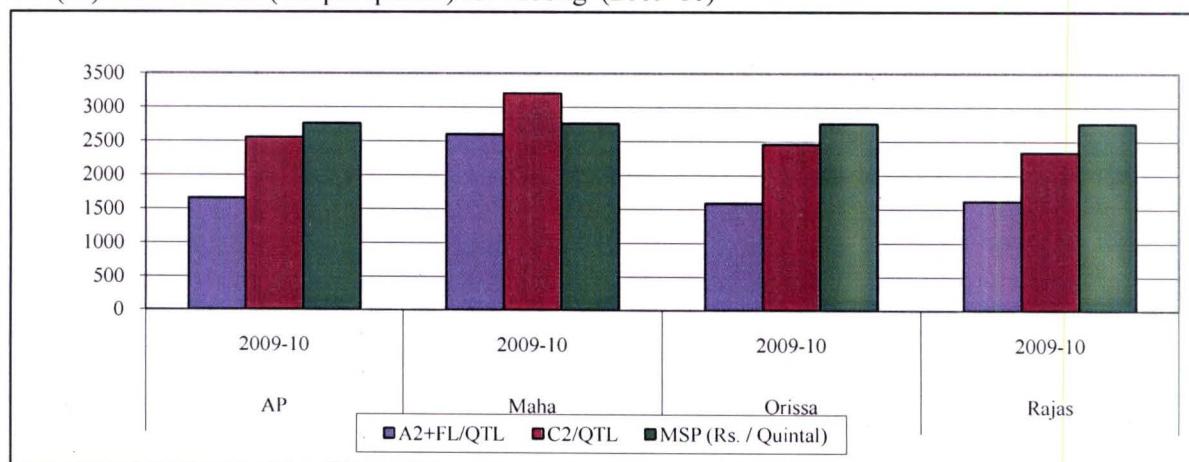
G 7 (A) Cost Estimates 9Rs per quintal) for Moong (2005-06)



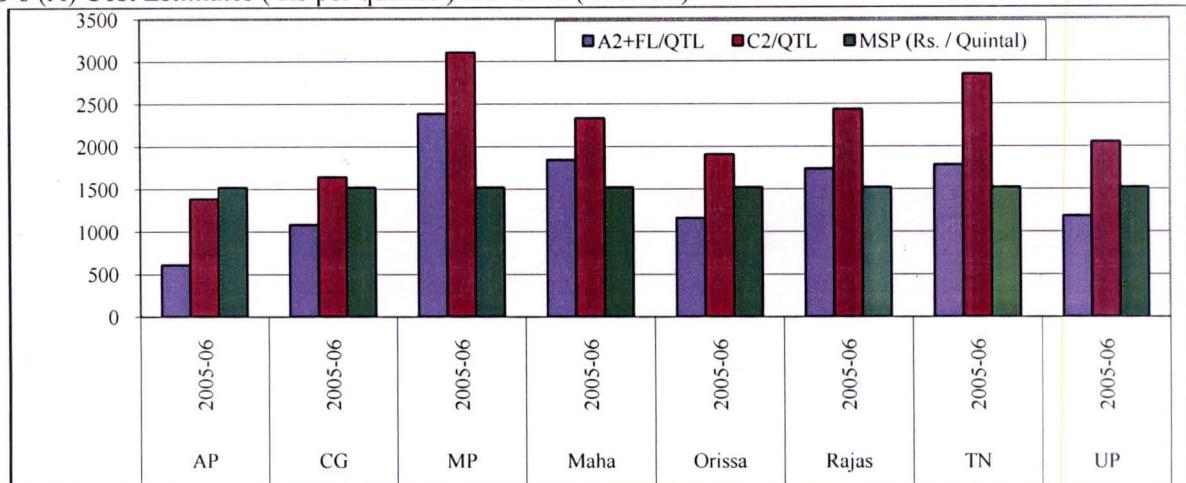
G 7 (B) Cost estimate (Rs per quintal) for Moong (2006-07)



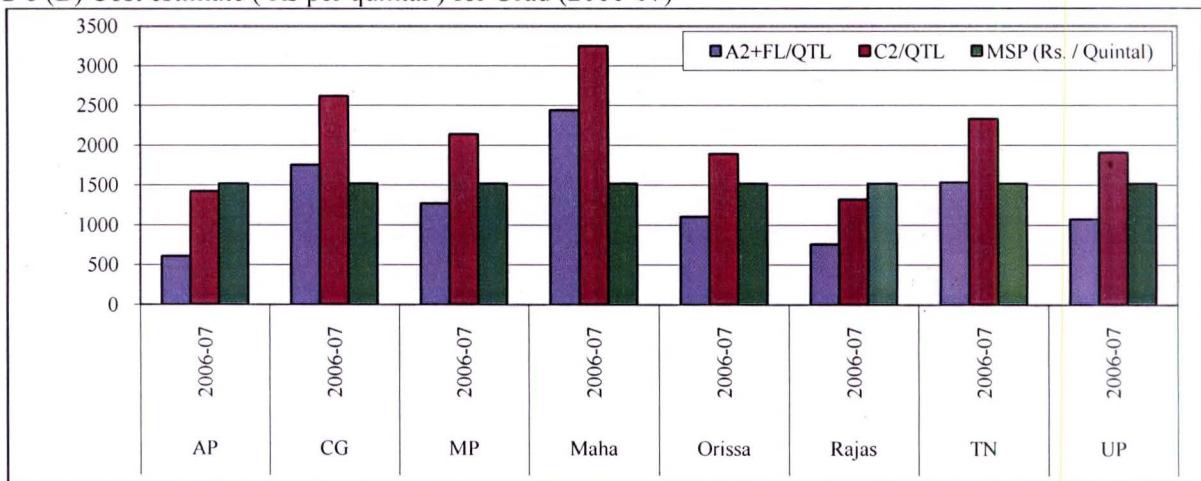
G 7 (C) Cost estimate (Rs per quintal) for Moong (2009-10)



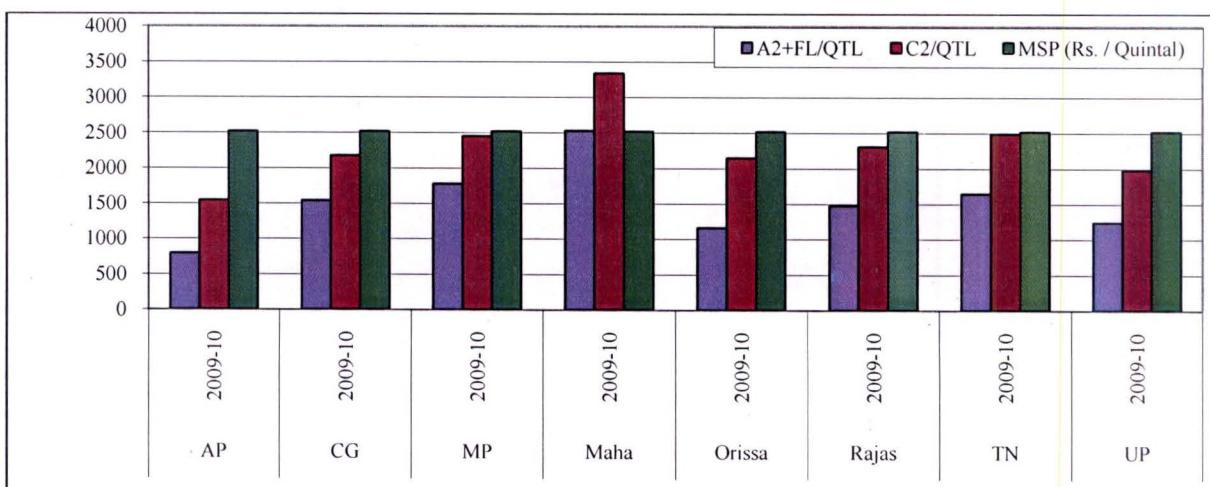
G 8 (A) Cost Estimates (Rs per quintal) for Urad (2005-06)



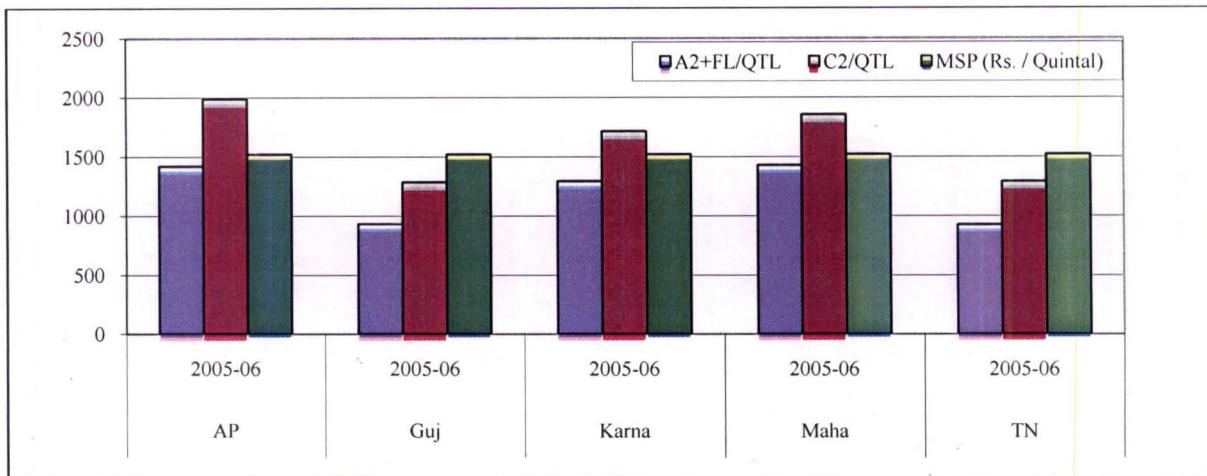
G 8 (B) Cost estimate (Rs per quintal) for Urad (2006-07)



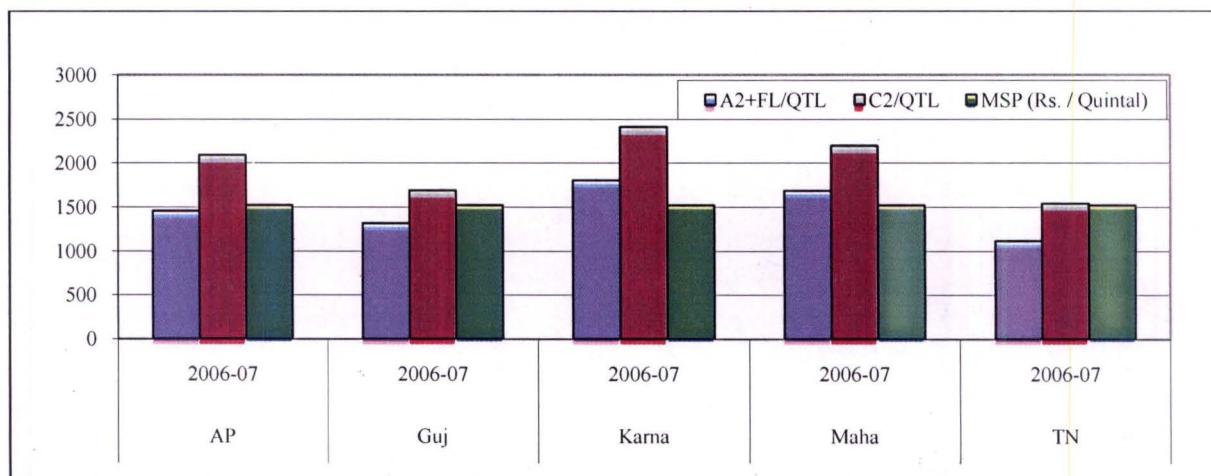
G 8 (C) Cost estimate (Rs per quintal) for Urad (2009-10)



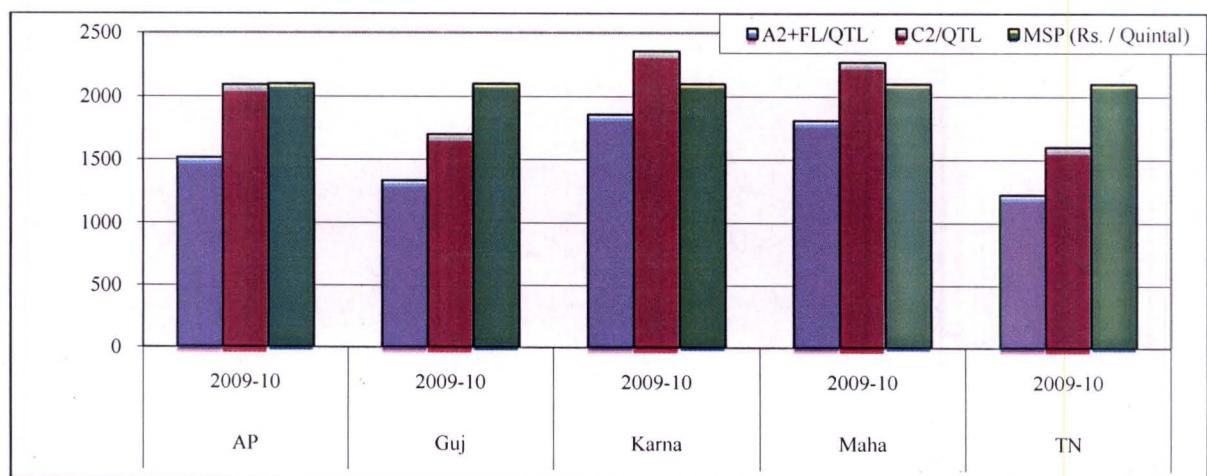
G 9 (A) Cost Estimate (Rs per quintal) for Groundnut (2005-06)



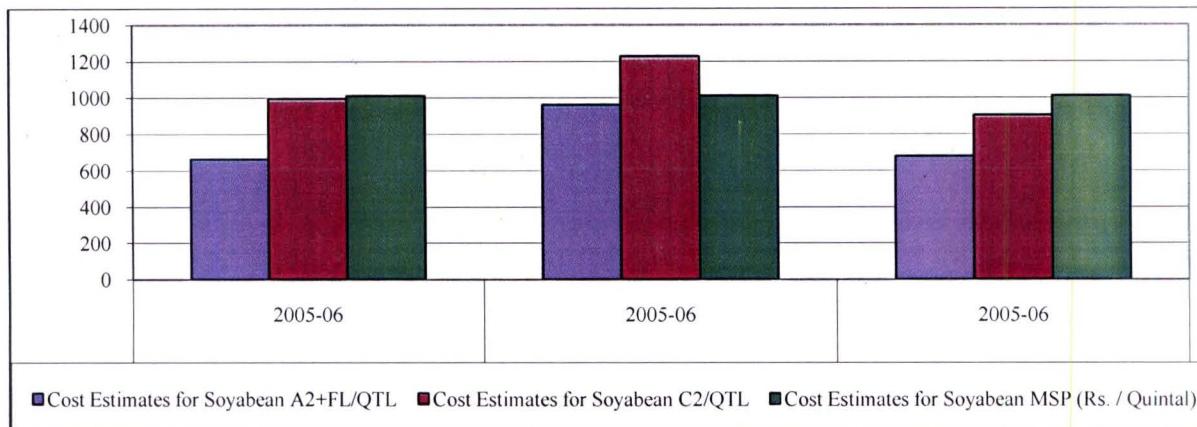
G 9 (B) Cost Estimate (Rs per quintal) for Groundnut (2006-07)



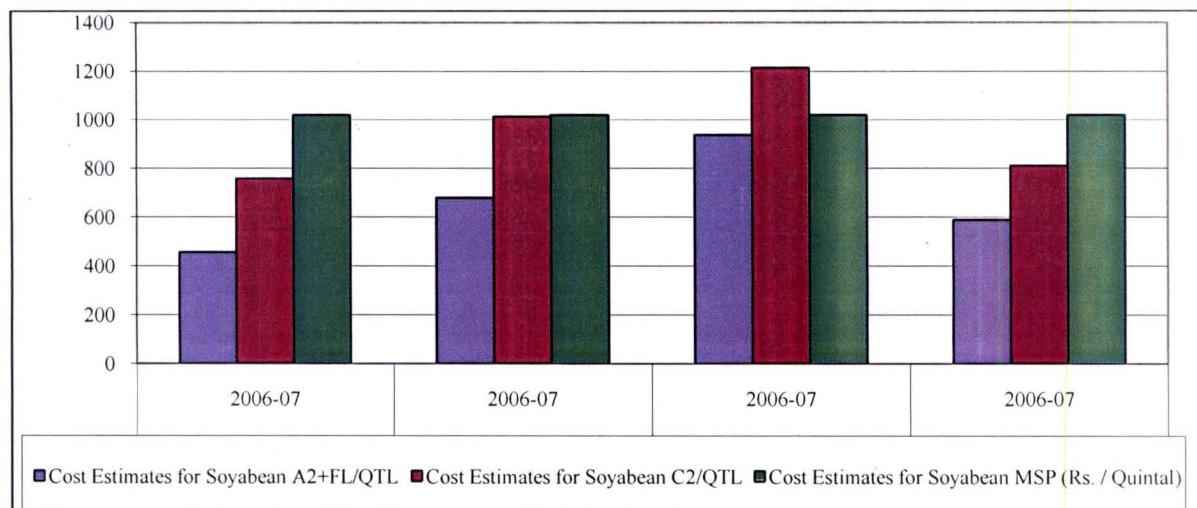
G 9 (C) Cost Estimate (Rs per quintal) for Groundnut (2009-10)



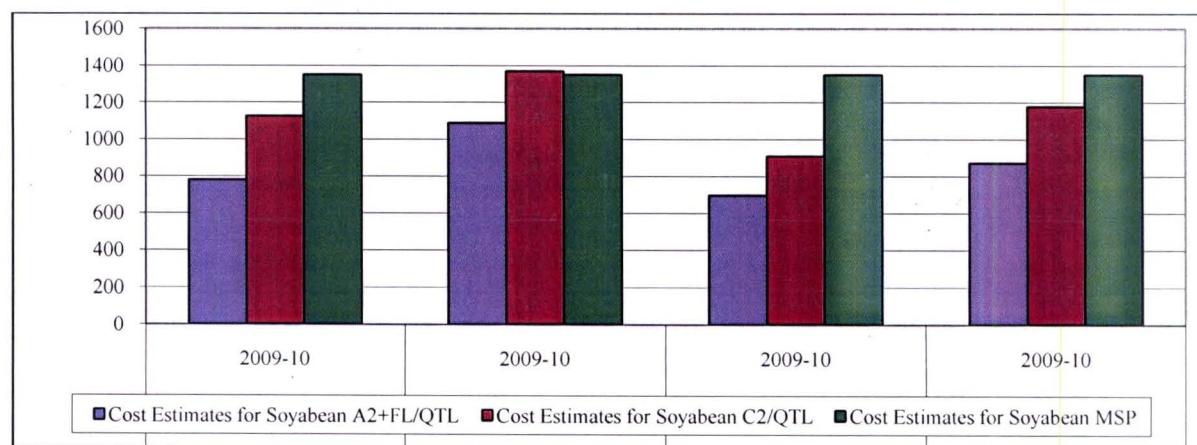
G 10 (A) Cost Estimate (Rs per quintal) for Soyabean (2005-06)



G 10 (B) Cost Estimate (Rs per quintal) for Soyabean (2006-07)



G 10 (C) Cost Estimate (Rs per quintal) for Soyabean (2009-10)



Source : Reports of the Commission of Agricultural Costs and Prices, Ministry of Agriculture, Government of India, 2009-10. Note; Data for the year 2009-10 are projected costs by CACP.

It can be observed from graphs G1 to G-10 and from Appendix A.2 that for 2005-06 and 2006-07, in case of cereals, by and large the MSP fixed by the government covered cost A2+FL. However, there are instances when A2+FL was not covered in some states such as bajra in Karnataka. Maharashtra also appeared to be a high cost state and cost A2+FL was not covered for paddy and bajra and ragi. With respect to maize also, cost A2+FL was not covered in 4 states in 2005-06.

In case of pulses, there are several states where cost A2+FL is not covered in 2005-06 and 2006-07. C2 is not covered in case of most crops for several states for 2005-06 and 2006-07. In Maharashtra in 2006-07, C2 cost is double that of MSP, for urad and moong. In case of tur, MSP did not cover A2 + FL or cost C2 in 2006-07 for the states of Maharashtra, Orissa, Tamil Nadu and Uttar Pradesh.

In case of groundnut in 2006-07, A2+FL was not covered in Karnataka and Maharashtra and in almost all cases for most selected states cost C2 was not covered. In case of soyabean, while A2+FL was covered in all selected states, cost C2 was not covered in Maharashtra. Since cost C2 is a larger cost concept and includes a number of cost items such as rental value of owned land, interest on value of owned fixed capital (other than land), it is obvious that these costs cannot always be covered while fixing MSP, especially in states which have low yields and high costs.

In view of the above, it may be noted that cost of production is not the only consideration in setting the MSP and it is also not feasible for the MSP to cover the cost of cultivation in states where this is too high. A consideration in setting the MSP is that it should encourage efficiency and its basic purpose is to guarantee that prices should not fall below some reasonable minimum. With this view, the CACP keeps certain parameters in mind and it is expected that the MSP recommended must cover cost A2+FL for all crops in every state and thus provide a floor which protects farmers against actual losses. However, there are instances when even cost A2+FL is not covered.

The CACP has projected the costs for 2009-10. It can be observed that for all crops and states in 2009-10, cost A2+FL is covered. In fact there are large instances when even cost C2 is

covered. This indicates that the government is making efforts to ensure that a floor price is assured to farmers so that their operational costs are atleast covered.

Appendix A.2 Cost Estimates (A2+FL, C2 and MSP in Rs per quintal) for selected crops

Crop: Paddy

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	347.82	540.96	570	61.02	94.91
Assam	2005-06	414.68	559.92	570	72.75	98.23
Bihar	2005-06	359.3	497.44	570	63.04	87.27
Chattisgarh	2005-06	326.35	508.21	570	57.25	89.16
Gujarat	2005-06	357.11	478.35	570	62.65	83.92
Haryana	2005-06	378.76	618.45	570	66.45	108.50
Himachal P	2005-06	448.42	484.64	570	78.67	85.02
Jharkhand	2005-06	570.44	751.95	570	100.08	131.92
Karnataka	2005-06	376.17	518.54	570	65.99	90.97
Kerala	2005-06	537.5	671.66	570	94.30	117.84
Madhya P	2005-06	485.1	689.82	570	85.11	121.02
Maharashtra	2005-06	608.41	762.76	570	106.74	133.82
Orissa	2005-06	373.15	528.9	570	65.46	92.79
Punjab	2005-06	280.16	487.28	570	49.15	85.49
Tamil nadu	2005-06	491.65	690.96	570	86.25	121.22
Uttar P	2005-06	377.06	559.19	570	66.15	98.10
Uttarakhand	2005-06	378.44	552.97	570	66.39	97.01
West Bengal	2005-06	418.68	581.02	570	73.45	101.93
States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	361.19	556.6	620	58.26	89.77
Assam	2006-07	640.93	852.76	620	103.38	137.54
Bihar	2006-07	363.93	518.5	620	58.70	83.63
Chattisgarh	2006-07	338.68	524.08	620	54.63	84.53
Gujarat	2006-07	308.56	434.21	620	49.77	70.03
Haryana	2006-07	382.44	609.03	620	61.68	98.23
Himachal P	2006-07	457.22	704.67	620	73.75	113.66
Jharkhand	2006-07	495.36	653.85	620	79.90	105.46
Karnataka	2006-07	369.49	520.29	620	59.60	83.92
Kerala	2006-07	559.38	717.34	620	90.22	115.70
Madhya P	2006-07	489.21	694.75	620	78.90	112.06
Maharashtra	2006-07	823.38	1007.57	620	132.80	162.51
Bihar	2006-07	403.65	570.35	620	65.10	91.99
Punjab	2006-07	266.53	474.42	620	42.99	76.52
Tamil Nadu	2006-07	454.08	634.32	620	73.24	102.31
Uttar Pradesh	2006-07	431	615.41	620	69.52	99.26
Uttarakhand	2006-07	339.32	505.38	620	54.73	81.51
West Bengal	2006-07	451.45	625.07	620	72.81	100.82
States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	418.43	608.66	950	44.05	64.07
Assam	2009-10	725.17	935.63	950	76.33	98.49
Bihar	2009-10	428.07	582.05	950	45.06	61.27
Chattisgarh	2009-10	381.57	564.71	950	40.17	59.44
Harayana	2009-10	460.77	693.14	950	48.50	72.96
Jharkhand	2009-10	599.76	767.82	950	63.13	80.82
Karnataka	2009-10	452.17	601.68	950	47.60	63.33
Kerala	2009-10	589.72	874.93	950	62.08	92.10
Madhya P	2009-10	592.27	802.54	950	62.34	84.48
Orissa	2009-10	410.44	644.55	950	43.20	67.85
Punjab	2009-10	319.01	509.15	950	33.58	53.59
Tamil Nadu	2009-10	540.54	722.04	950	56.90	76.00
Uttar P	2009-10	482.98	664.27	950	50.84	69.92
Uttarakhand	2009-10	431.47	649.21	950	45.42	68.34
West Bengal	2009-10	500.36	664.13	950	52.67	69.91

Crop: Kapas

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
AP	2005-06	1537.75	2227.2	1980	77.66	112.48
Gujarat	2005-06	1159.73	1594.55	1980	58.57	80.53
Harayana	2005-06	1433.91	2166.09	1980	72.42	109.40
Karnataka	2005-06	1331.4	1867.03	1980	67.24	94.29
Madhya P	2005-06	1193.97	1959.11	1980	60.30	98.94
Maharashtra	2005-06	1646.42	2137.15	1980	83.15	107.94
Punjab	2005-06	959.12	1606.12	1980	48.44	81.12
Rajasthan	2005-06	854.86	1295.69	1980	43.17	65.44
Tamil Nadu	2005-06	1929.64	2708.65	1980	97.46	136.80

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	1066.45	1598.16	1990	53.59	80.31
Gujarat	2006-07	1224.87	1708.81	1990	61.55	85.87
Harayana	2006-07	1295.84	1923.64	1990	65.12	96.67
Madhya P	2006-07	1541.86	2301.55	1990	77.48	115.66
Maharashtra	2006-07	1587.01	2051.94	1990	79.75	103.11
Punjab	2006-07	988.76	1630.07	1990	49.69	81.91
Rajasthan	2006-07	846.93	1211.3	1990	42.56	60.87
Tamil Nadu	2006-07	1460.37	1958.48	1990	73.39	98.42
States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	1408.37	2314.67	3000	46.95	77.16
Gujarat	2009-10	1368.32	1802.78	3000	45.61	60.09
Harayana	2009-10	1374.55	2002.81	3000	45.82	66.76
Madhya P	2009-10	1881.57	2638.26	3000	62.72	87.94
Maharashtra	2009-10	2046.24	2528.8	3000	68.21	84.29
Punjab	2009-10	1515.6	2108.69	3000	50.52	70.29
Rajasthan	2009-10	971.93	1399.57	3000	32.40	46.65
Tamil nadu	2009-10	2100.99	2718.85	3000	70.03	90.63
Karnataka	2009-10	1731.18	2510.29	3000	57.71	83.68

Crop: Jowar

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	491.34	746.64	525	93.59	142.22
Karnataka	2005-06	561.54	770.26	525	106.96	146.72
Madhya P	2005-06	548.97	757.02	525	104.57	144.19
Maharashtra	2005-06	518.06	676.07	525	98.68	128.78
Rajasthan	2005-06	487.56	683.5	525	92.87	130.19
Tamil Nadu	2005-06	810.76	1126.41	525	154.43	214.55

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	583.1	897.71	540	107.98	166.24
Karnataka	2006-07	701.04	934.63	540	129.82	173.08
Madhya P	2006-07	496.81	724.06	540	92.00	134.09
Maharashtra	2006-07	499.37	667.41	540	92.48	123.59
Rajasthan	2006-07	466.78	679.56	540	86.44	125.84
Tamil Nadu	2006-07	610.11	766.75	540	112.98	141.99

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	645.8	901.43	840	76.88	107.31
Karnataka	2009-10	722.82	936.23	840	86.05	111.46
Madhya P	2009-10	576.78	779.96	840	68.66	92.85
Maharashtra	2009-10	573.27	737.05	840	68.25	87.74
Rajasthan	2009-10	555.21	765.3	840	66.10	91.11
Tamil Nadu	2009-10	707.82	899.2	840	84.26	107.05

Crop: Bajra

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Gujarat	2005-06	448.45	579.99	525	85.42	110.47
Harayana	2005-06	554.94	782.21	525	105.70	148.99
Karnataka	2005-06	546.85	715.31	525	104.16	136.25
Maharashtra	2005-06	512.78	681.82	525	97.67	129.87
Rajasthan	2005-06	401.23	596.07	525	76.42	113.54
Uttar P	2005-06	346.42	592.66	525	65.98	112.89

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Gujarat	2006-07	475.17	595.13	540	87.99	110.21
Haryana	2006-07	461.46	683.37	540	85.46	126.55
Karnataka	2006-07	544.68	705.74	540	100.87	130.69
Maharashtra	2006-07	571.65	746.84	540	105.86	138.30
Rajasthan	2006-07	409.04	572.4	540	75.75	106.00
Uttar P	2006-07	348.02	528.93	540	64.45	97.95

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Gujarat	2009-10	536.03	657.53	840	63.81	78.28
Haryana	2009-10	568.4	788.9	840	67.67	93.92
Maharashtra	2009-10	629.47	789.13	840	74.94	93.94
Rajasthan	2009-10	420.29	593.21	840	50.03	70.62
Uttar P	2009-10	379.72	626.89	840	45.20	74.63

Crop: Maize

State	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	362.94	578.27	525	69.13	110.15
Bihar	2005-06	261.7	382.62	525	49.85	72.88
Chattisgarh	2005-06	393.14	571.22	525	74.88	108.80
Gujarat	2005-06	555.56	694.6	525	105.82	132.30
Himachal P	2005-06	524.2	736.27	525	99.85	140.24
Jharkhand	2005-06	508.73	756.39	525	96.90	144.07
Karnataka	2005-06	273.4	398.15	525	52.08	75.84
Madhya P	2005-06	543.41	743.56	525	103.51	141.63
Rajasthan	2005-06	710.45	916.28	525	135.32	174.53
Tamil Nadu	2005-06	323.26	498.42	525	61.57	94.94
Uttarakhand	2005-06	571.21	808.44	525	108.80	153.99
Uttar P	2005-06	399.09	588.03	525	76.02	112.01

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	371.41	575.65	540	68.78	106.60
Bihar	2006-07	293.37	424.62	540	54.33	78.63
Chattisgarh	2006-07	383.96	545.94	540	71.10	101.10
Gujarat	2006-07	1167.92	1355.65	540	216.28	251.05
Himachal P	2006-07	373.5	560.74	540	69.17	103.84
Jharkhand	2006-07	454.03	620.7	540	84.08	114.94
Karnataka	2006-07	329.87	488.93	540	61.09	90.54
Madhya P	2006-07	882	1169.96	540	163.33	216.66

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Rajasthan	2006-07	760.29	956.41	540	140.79	177.11
Tamil nadu	2006-07	411.11	610.93	540	76.13	113.14
Uttarakhand	2006-07	567.34	787.04	540	105.06	145.75
Uttar P	2006-07	510.76	748.33	540	94.59	138.58

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	443.48	648.56	840	52.80	77.21
Bihar	2009-10	306.93	427.68	840	36.54	50.91
Chattisgarh	2009-10	506.21	675.85	840	60.26	80.46
Himachal P	2009-10	481.63	669.85	840	57.34	79.74
Jharkhand	2009-10	589.98	823.15	840	70.24	97.99
Madhya P	2009-10	795.93	1007.25	840	94.75	119.91
Rajasthan	2009-10	773.94	958.12	840	92.14	114.06
Uttar P	2009-10	567.67	843.43	840	67.58	100.41
Uttarakhand	2009-10	677.97	917.4	840	80.71	109.21

Crop: Tur

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	784.24	1386.93	1400	56.02	99.07
Bihar	2005-06	739.86	1436.98	1400	52.85	102.64
Gujarat	2005-06	1061.34	1442.19	1400	75.81	103.01
Karnataka	2005-06	944.37	1378.82	1400	67.46	98.49
Madhya P	2005-06	824.53	1392.28	1400	58.90	99.45
Orissa	2005-06	1722.47	2583.43	1400	123.03	184.53
Uttar P	2005-06	676.63	1403.08	1400	48.33	100.22

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	1214.12	1924.28	1410	86.11	136.47
Bihar	2006-07	963.81	1839.67	1410	68.36	130.47
Gujarat	2006-07	1004.94	1400.62	1410	71.27	99.33
Karnataka	2006-07	1245.46	1764.12	1410	88.33	125.11
Madhya P	2006-07	900.22	1588.03	1410	63.85	112.63
Maharashtra	2006-07	1446.05	1956.68	1410	102.56	138.77
Orissa	2006-07	1659.21	2577.34	1410	117.67	182.79
Tamil Nadu	2006-07	2160.22	2698.2	1410	153.21	191.36
Uttar P	2006-07	840.56	1702.14	1410	59.61	120.72

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	1111.57	1734.71	2300	48.33	75.42
Gujarat	2009-10	1129.76	1497.62	2300	49.12	65.11
Karnataka	2009-10	1328.18	1798.16	2300	57.75	78.18
Madhya P	2009-10	941.62	1509.54	2300	40.94	65.63

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Orissa	2009-10	1582.84	2611.64	2300	68.82	113.55
Uttar P	2009-10	892.3	1658.59	2300	38.80	72.11
Maharashtra	2009-10	1315.61	1709.49	2300	57.20	74.33

Crop: Moong

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	1325.98	2294.22	1520	87.24	150.94
Maharashtra	2005-06	2319.46	2884.33	1520	152.60	189.76
Orissa	2005-06	1342.3	2141.61	1520	88.31	140.90
Rajasthan	2005-06	1843.79	2614.71	1520	121.30	172.02

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	1767.99	2764.12	1520	116.32	181.85
Karnataka	2006-07	1973.72	2671.54	1520	129.85	175.76
Maharashtra	2006-07	2444.55	3159.29	1520	160.83	207.85
Orissa	2006-07	1535.11	2400.68	1520	100.99	157.94
Rajasthan	2006-07	1456.9	2322.8	1520	95.85	152.82

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	1658.62	2556.64	2760	60.09	92.63
Maharashtra	2009-10	2601.1	3203.86	2760	94.24	116.08
Orissa	2009-10	1587.88	2455.01	2760	57.53	88.95
Rajasthan	2009-10	1620.99	2340.08	2760	58.73	84.79

Crop: Urad

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	611.93	1385.68	1520	40.26	91.16
Chattisgarh	2005-06	1083.58	1642.96	1520	71.29	108.09
Madhya P	2005-06	2382.18	3106.44	1520	156.72	204.37
Maharashtra	2005-06	1841.95	2331.37	1520	121.18	153.38
Orissa	2005-06	1162.08	1907.9	1520	76.45	125.52
Rajasthan	2005-06	1738.31	2434.11	1520	114.36	160.14
Tamil Nadu	2005-06	1784.1	2847.5	1520	117.38	187.34
Uttar P	2005-06	1189.37	2051.07	1520	78.25	134.94

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	606.07	1425.52	1520	39.87	93.78

Chattisgarh	2006-07	1753.24	2621.7	1520	115.34	172.48
Madhya P	2006-07	1270.81	2138.84	1520	83.61	140.71
Maharashtra	2006-07	2441.79	3249	1520	160.64	213.75
Orissa	2006-07	1104.09	1894.74	1520	72.64	124.65
Rajasthan	2006-07	757.35	1321.64	1520	49.83	86.95
Tamil Nadu	2006-07	1533.75	2330.48	1520	100.90	153.32
Uttar P	2006-07	1075.42	1907.16	1520	70.75	125.47

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	795.54	1540.72	2520	31.57	61.14
Chattisgarh	2009-10	1540	2174.21	2520	61.11	86.28
Madhya P	2009-10	1777.79	2451.92	2520	70.55	97.30
Maharashtra	2009-10	2529.25	3340.84	2520	100.37	132.57
Orissa	2009-10	1158.47	2148.1	2520	45.97	85.24
Rajasthan	2009-10	1476.75	2310.56	2520	58.60	91.69
Tamil nadu	2009-10	1646.87	2491.88	2520	65.35	98.88
Uttar P	2009-10	1239.07	1986.14	2520	49.17	78.82

Crop: Groundnut

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2005-06	1419.17	1989.42	1520	93.37	130.88
Gujarat	2005-06	932.79	1285.82	1520	61.37	84.59
Karnataka	2005-06	1294.92	1714.45	1520	85.19	112.79
Maharashtra	2005-06	1426.85	1855.77	1520	93.87	122.09
Tamil Nadu	2005-06	924.74	1291.83	1520	60.84	84.99

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2006-07	1457.19	2088.96	1520	95.87	137.43
Gujarat	2006-07	1316.27	1688.63	1520	86.60	111.09
Karnataka	2006-07	1803.54	2413.07	1520	118.65	158.75
Maharashtra	2006-07	1684.42	2198.46	1520	110.82	144.64
Tamil Nadu	2006-07	1117.77	1543.36	1520	73.54	101.54

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Andhra P	2009-10	1513.13	2092.19	2100	72.05	99.63
Gujarat	2009-10	1334.41	1698.55	2100	63.54	80.88
Karnataka	2009-10	1856.26	2355.38	2100	88.39	112.16
Maharashtra	2009-10	1807.42	2267.26	2100	86.07	107.96
Tamil Nadu	2009-10	1224.97	1599.2	2100	58.33	76.15

Crop: Soyabean

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Madhya P	2005-06	663.83	994.97	1010	65.73	98.51
Maharashtra	2005-06	959.69	1227.04	1010	95.02	121.49
Rajasthan	2005-06	679.32	902.06	1010	67.26	89.31

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Chattisgarh	2006-07	455.75	757.63	1020	44.68	74.28
Madhya P	2006-07	679.63	1012.94	1020	66.63	99.31
Maharashtra	2006-07	935.9	1213.36	1020	91.75	118.96
Rajasthan	2006-07	588.15	809.75	1020	57.66	79.39

States	Years	A2+FL	C2	MSP	A2+FL as % of MSP	C2 as % of MSP
Madhya P	2009-10	779.01	1123.47	1350	57.70	83.22
Maharashtra	2009-10	1086.81	1370.87	1350	80.50	101.55
Rajasthan	2009-10	695.64	908.29	1350	51.53	67.28
Chattisgarh	2009-10	871.68	1177.13	1350	64.57	87.19

Chapter 3

Economics of selected crops based on field survey in Maharashtra

In chapter 2, a comparison was made between MSP and cost of production for major crops across several states. It was observed that there are instances when MSP does not cover cost A2+FL in 2005-06 and 2006-07. C2 cost is also not covered in several cases. In this chapter, an attempt has been made to note the cost of production of sample farmers in the state of Maharashtra, for six important crops namely paddy, jowar, red gram (tur), gram, cotton and soyabean and observe the net returns received by them. The weighted average price received by sample farmers is also compared with MSP.

3.1 Cost of Production, MSP and Net Returns of sample farmers based on field survey:

As mentioned earlier, primary data has been collected for six crops in selected districts from sample farmers. In case of paddy, Raigad district was selected and for jowar, Pune and Satara districts were selected. Latur was selected for gram and tur and Amravati district was selected for data collection for cotton and soyabean. In Table 3.1, the net returns per hectare are indicated, and in Table 3.2 and Table 3.3, the cost per acre and per quintal are observed alongwith their percentage share for the selected crops. From Table 3.1, it can be observed that across all crops the weighted average price received by sample farmers was higher than MSP. However, the per quintal cost was also high. Among all items of cost, the share of human labor is highest and ranged between 22 percent for soyabean to 39.35 percent for paddy. In case of paddy, cost of human labor along with animal labor accounts for 55 percent of total cost. In case of tur, human and animal labor account for 49 percent of the total cost. Jowar had relatively high costs for machinery (20 percent) and preparatory tillage (25.3 percent).

As far as total cost per acre is concerned, the cost of paddy was highest which was Rs 19761.48 per acre, followed by kapas which was Rs 17891.79/- per acre. However, the per quintal cost presents another picture. The per quintal cost of kapas is Rs 4170.58/-, followed by that of tur which is Rs 3367.30/- per quintal. Since the yield of paddy and jowar are much higher than that of other crops, their per quintal cost is also relatively lower. In case of kapas, the cost of manures and fertilizers was 15.65 percent. Further, kapas is a crop which is easily affected by a

number of pests which increases the expenditure on plant protection measures. The cost of plant protection in case of kapas is 11.18 percent and is Rs 466.41 per quintal.

From Table 3.1 it can be observed, that net returns per acre are negative for kapas to the tune of Rs 3000/- per acre. This clearly indicates that farmers are making losses in the cultivation of cotton. The per quintal cost of production is Rs 4170.58/- while the weighted average price received by sample farmers is Rs 3474.75/- per quintal.

The net income per quintal is also observed to be very low in case of soyabean which is only Rs 175.97 per quintal. While the cost per quintal of soyabean is Rs 1816/- the weighted average price realized by sample farmers is Rs 1993 /- per quintal.

Overall, it can be observed that out of the six crops studied, the cost of production is higher than MSP for three crops, namely tur, cotton and soyabean. The cost of production is higher by 5.2 percent in case of tur, 26.4 percent in case of cotton and 7 percent in case of soyabean as compared to MSP. The important point to note is that MSP has not covered even the operational costs of the sample farmers and if cost C2 were considered, the difference between cost of production and MSP would be even higher. In case of gram the weighted average price realized by sample farmers is lower than MSP. However, since the cost per quintal is 28 percent lower than the realized price, the farmers received a net income of Rs 687.84 per quintal.

The overall conclusion that appears from the field survey is that MSP has not covered the operational cost of production for paddy, tur, raw cotton and soyabean. In case of paddy, tur and soyabean, since the market price realized by farmers is higher than cost of production, the farmers did not incur losses. The case of kapas is however, disturbing, the cultivation of which is causing huge losses to farmers as market price and MSP are lower than cost of production. The cost of production is 20 percent higher than the realized price which is making the cultivation of cotton unviable. In case of gram, the market price realized by the farmers is lower than MSP but since cost of production is lower than realized price farmers earned a net income of Rs 3494.25/- per acre.

Table 3.1 Cost of Production, MSP and Net Returns of sample farmers (Rs per acre)

Sr. No	Particulars	Paddy	Jowar	Tur	Gram	Kapas	Soyabean
1.	Gross Income /acre	25200	28984	10283.71	12572.92	14891.79	8207
2	Yield quintals /acre	12	11	2.7	5.08	4.29	4.12
3	Human labor	7776.53	4746	3513.4	3053.11	4718.21	1644.86
4	Animal Labor	3062.19	1039	936.07	683.33	2057.14	1143.53
5	Machinery cost	84.88	3016	1111.75	1397.91	889.29	770.59
6	Preparatory Tillage	1500	3789	635.05	490	3107.14	1458.82
7	Sowing &Seed Treatment	1000	159	489.28	1239	1003.57	1072.06
8	Manures & Fertilizers	2000	1129	1035.87	974.16	2800	467.79
9	Plant Protection	129.10	125	438.14	406.25	2000.89	466.18
10	Intertillage & Irrigation	--	557	189.69	241.66	107.14	--
11	Harvesting	2000	--	--	--	1176.79	--
12	Threshing	1200	--	--	12.5	--	443.24
13	Marketing	960	330	728.53	570.25	--	--
14	Land revenue	48.78	72	13.93	10.5	31.61	14.85
15	Total Cost /acre	19761.48	14963	9091.71	9078.67	17891.79	7481.91
16	Cost /quintal	1646.79	1360.27	3367.3	1787.14	4170.58	1815.99
17	Net Income/acre	5438.52	14021	1192	3494.25	-3000	725.00
18	Net Income/hectare	13433.14	34631.87	2944.24	8630.79	-7410	1790.75
19	Weighted Average price (Rs / quintal)	2100	2760.38	3711	2473.36	3474.75	1993
20	MSP Rs / quintal	1080	980	3200	2800	3300	1690
21	Net Income/quintal	453.21	1274.64	441.48	687.84	-699	175.97

Source : Field Survey

Table- 3.2 Per acre cost (Rs) and Percent share in total cost

Sr. No.	Particular	Paddy	%	Jowar	%	Tur	%	Gram	%	Kapas	%	Soyabean	%	
3	Human labor	7776.53	39.35	4746	31.72	3513.4	38.64	3053.11	33.63	4718.21	26.37	1644.86	21.98	
4	Animal Labor	3062.19	15.50	1039	6.94	936.07	10.30	683.33	7.53	2057.14	11.50	1143.53	15.28	
5	Machinery cost	84.88	0.43	3016	20.16	1111.75	12.23	1397.91	15.40	889.29	4.97	770.59	10.30	
6	Preparatory Tillage include	1500	7.59	3789	25.32	635.05	6.98	490	5.40	3107.14	17.37	1458.82	19.50	
7	Sowing & Seed Treatment	1000	5.06	159	1.06	489.28	5.38	1239	13.65	1003.57	5.61	1072.06	14.33	
8	Manures & Fertilizers	2000	10.12	1129	7.55	1035.87	11.39	974.16	10.73	2800	15.65	467.79	6.25	
9	Plant Protection	129.1	0.65	125	0.84	438.14	4.82	406.25	4.47	2000.89	11.18	466.18	6.23	
10	Intertillage & Irrigation	0	0.00	557	3.72	189.69	2.09	241.66	2.66	107.14	0.60	0	0.00	
11	Harvesting	2000	10.12	0	0.00	0	0.00	0	0.00	1176.79	6.58	0	0.00	
12	Threshing	1200	6.07	0	0.00	0	0.00	12.5	0.14	0	0.00	443.24	5.92	
13	Marketing	960	4.86	330	2.21	728.53	8.01	570.25	6.28	0	0.00	0	0.00	
14	Land Revenue	48.78	0.25	72	0.48	13.93	0.15	10.5	0.12	31.61	0.18	14.85	0.20	
15	Total Cost	19761.4	100.0	0	14963	100.0	9091.71	100.0	9078.67	100.00	17891.79	100.0	7481.91	100.00

Source: Field Survey

Table 3.3 Per quintal cost (Rs) and Percent share in total cost

Sr. No.	Particular	Paddy		Jowar		Tur		Gram		Kapas		Soyabean	
		per quintal cost	%										
1	Human labor	648.04	39.35	431.45	31.72	1301.26	38.64	601.01	33.63	1099.82	26.37	399.24	21.98
2	Animal Labor	255.18	15.50	94.45	6.94	346.69	10.30	134.51	7.53	479.52	11.50	277.56	15.28
3	Machinery cost	7.07	0.43	274.18	20.16	411.76	12.23	275.18	15.40	207.29	4.97	187.04	10.30
4	Preparatory Tillage include compost	125.00	7.59	344.45	25.32	235.20	6.98	96.46	5.40	724.28	17.37	354.08	19.50
5	Sowing & Seed Treatment	83.33	5.06	14.45	1.06	181.21	5.38	243.90	13.65	233.93	5.61	260.21	14.33
6	Manures & Fertilizers	166.67	10.12	102.64	7.55	383.66	11.39	191.76	10.73	652.68	15.65	113.54	6.25
7	Plant Protection Measures	10.76	0.65	11.36	0.84	162.27	4.82	79.97	4.47	466.41	11.18	113.15	6.23
8	Intertillage & Irrigation	0.00	0.00	50.64	3.72	70.26	2.09	47.57	2.66	24.97	0.60	0.00	0.00
9	Harvesting	166.67	10.12	0.00	0.00	0.00	0.00	0.00	0.00	274.31	6.58	0.00	0.00
10	Threshing	100.00	6.07	0.00	0.00	0.00	0.00	2.46	0.14	0.00	0.00	107.58	5.92
11	Marketing	80.00	4.86	30.00	2.21	269.83	8.01	112.25	6.28	0.00	0.00	0.00	0.00
12	Land Revenue	4.07	0.25	6.55	0.48	5.16	0.15	2.07	0.12	7.37	0.18	3.60	0.20
13	Total Cost	1646.79	100.00	1360.27	100.00	3367.30	100.00	1787.14	100.00	4170.58	100.00	1816.00	100.00

Source : Field Survey

In the above Tables (3.1 to 3.2), the per acre and per quintal costs for each crop were indicated. From labour costs, one can derive the daily wage rate paid to labor for the selected crops. The same is indicated in Table 3.4

Table 3.4 Crop wise Daily Wage rate (Rs) for Family and Hired Labor

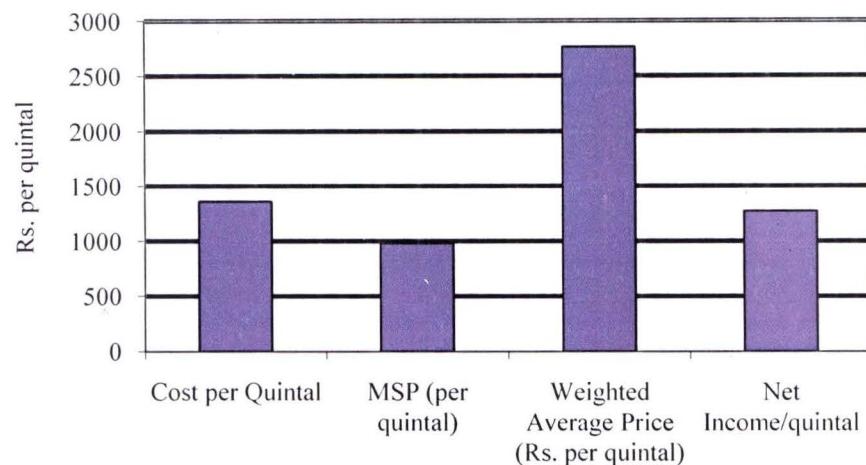
Crop	Family Labour	Hired Labour
Paddy	212	295
Jowar	163	161
Tur	210	147
Gram	170	151
Cotton	155	109
Soyabean	139	95

Source: Field Survey

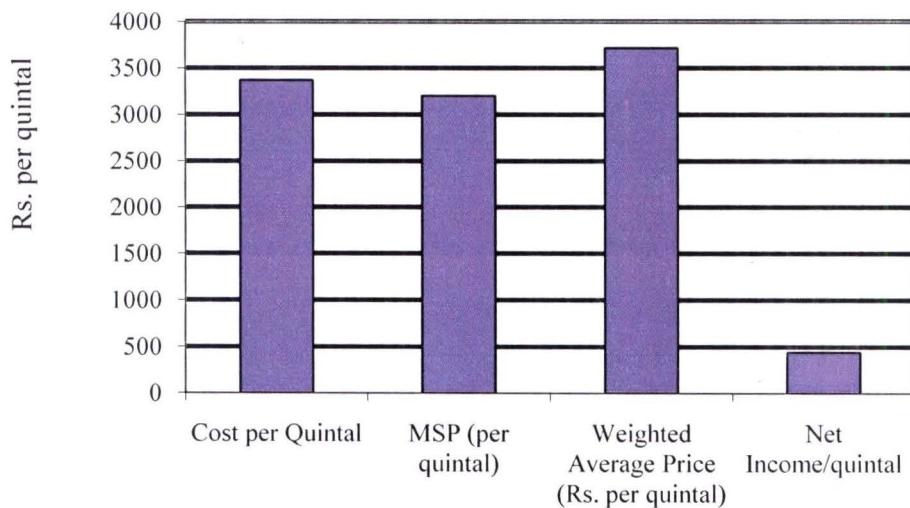
After having detailed discussion in a consultative workshop, it was felt that the cost of production should also be calculated taking into consideration Rs 300/- as daily wage rate just to understand what the potential cost of production could be. The same was attempted in the study. It was observed (see Appendix A.3.2) that after considering Rs 300/- as daily wage rate, the costs increased by 4 percent for paddy, 27 percent for jowar, 38 percent for tur, 33percent for gram, 45 percent for kapas and 41 percent for soyabean. Losses would therefore be incurred for tur, and soyabean while losses to cotton would further increase.

In the graphs presented below the cost of production, weighted average price of sample farmers, MSP and net income per quintal are indicated for the six selected crops in the field survey.

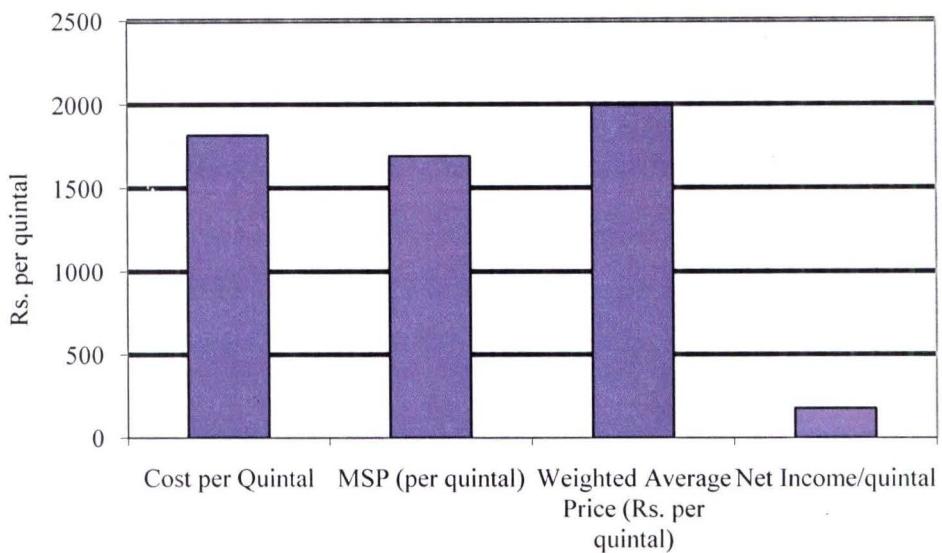
G.1 Jowar



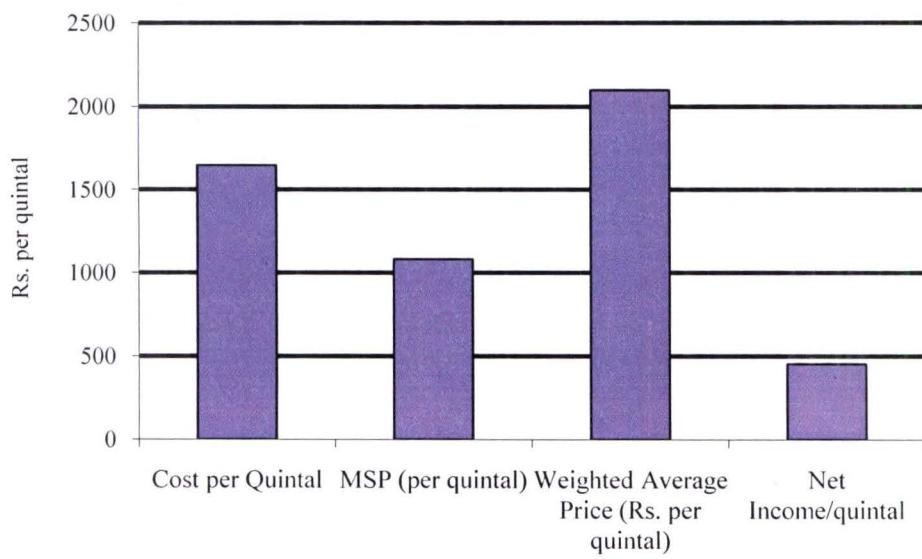
G.2 Tur

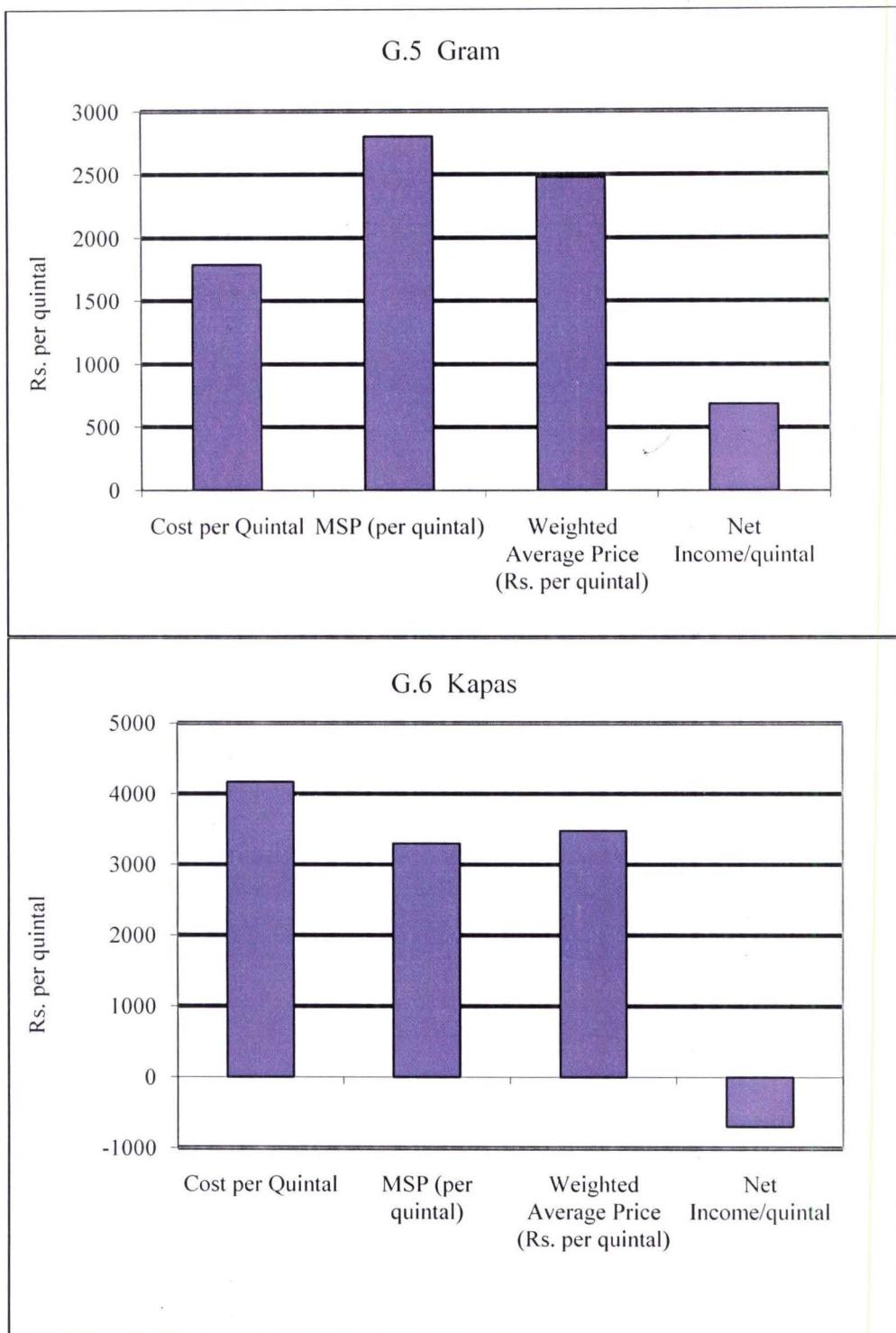


G.3 Soyabean



G.4 Paddy





3.2 Comparison of APMC prices with prices received by sample farmers and MSP:

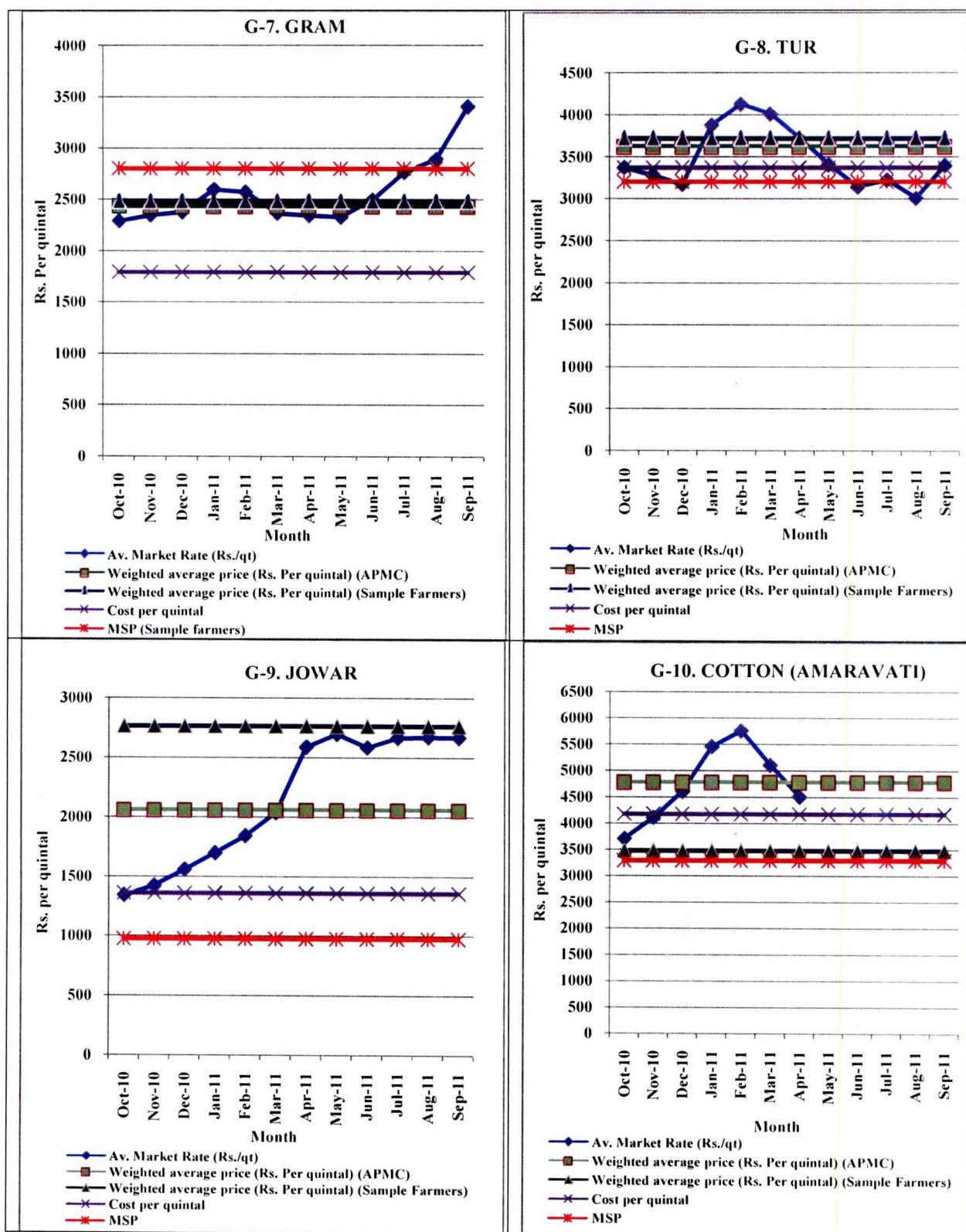
In Table 3.5 and graphs G 7 to G 13, a comparison is made between the price realized by sample farmers and the price ruling in the regulated markets.

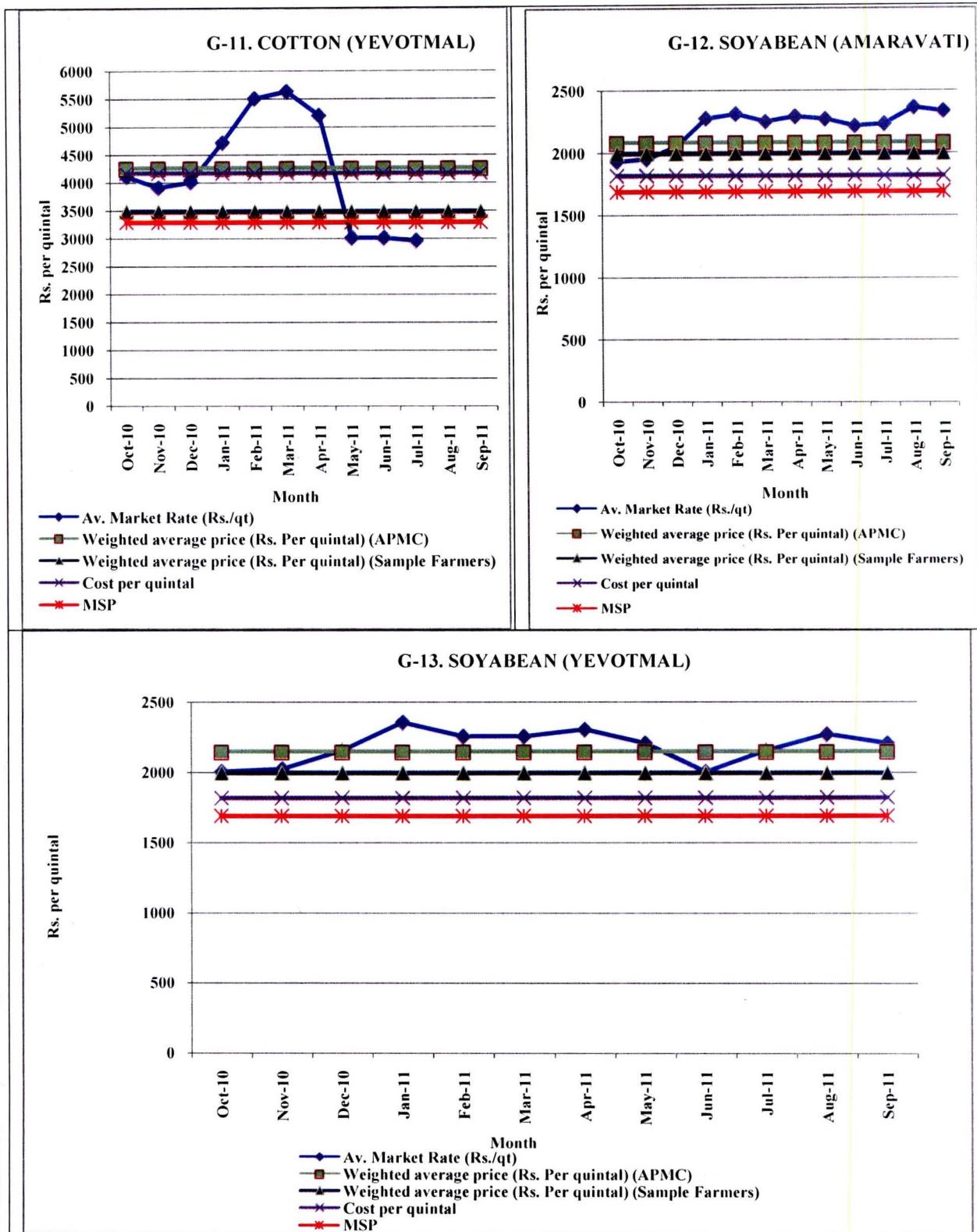
Table 3. Comparison of Price (Rs per quintal) realized by sample farmers with Regulated Market Price and MSP:

Price/crop	Paddy	Jowar	Tur	Gram	Kapas	Soyabean
MSP	1080	980	3200	2800	3300	1690
Weighted price of sample farmers	2100	2760	3711	2473	3474	1993
Weighted price in APMC	NA	2058 (Solapur)	3618 (Latur)	2428 (Latur)	4772 (Amravati)	2081 (Amravati)

Source: Field survey, APMCs and Report of CACP, Ministry of Agriculture, Govt. Of India

It can be observed from Table 3.5 that the price received by sample farmers in case of kapas and soyabean was lower than ruling market prices. Quality of produce may be one factor responsible for lower price or sale during peak season when prices are lower. In case of gram the price received by sample farmers was lower than MSP. It is possible that government agencies were not present in the market and hence farmers were forced to sell their produce at prices prevailing below MSP.

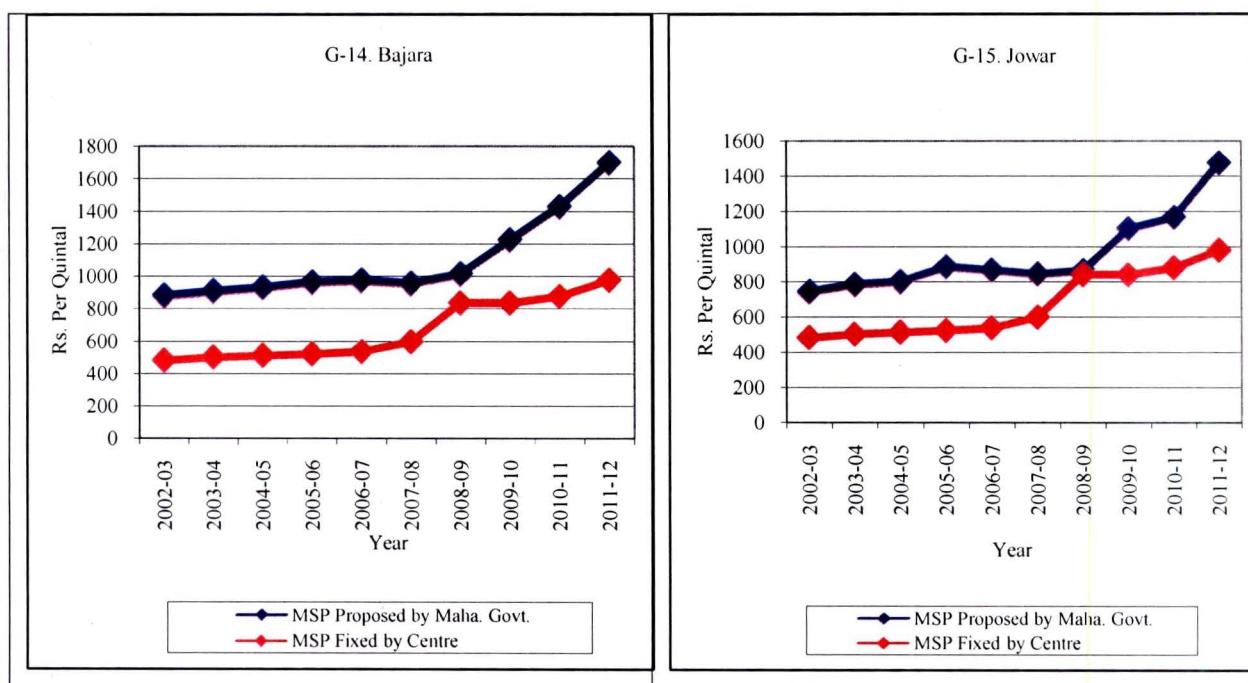


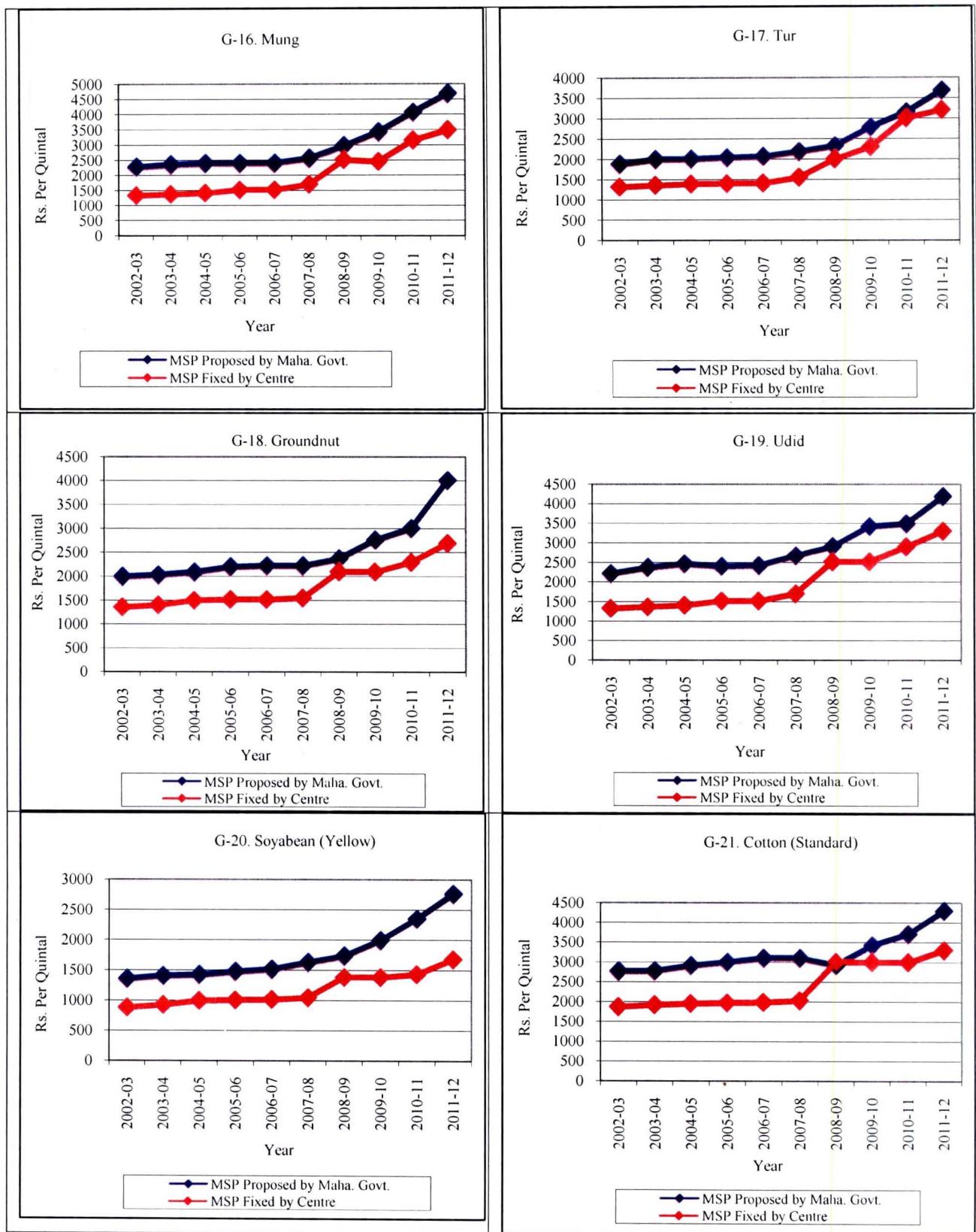


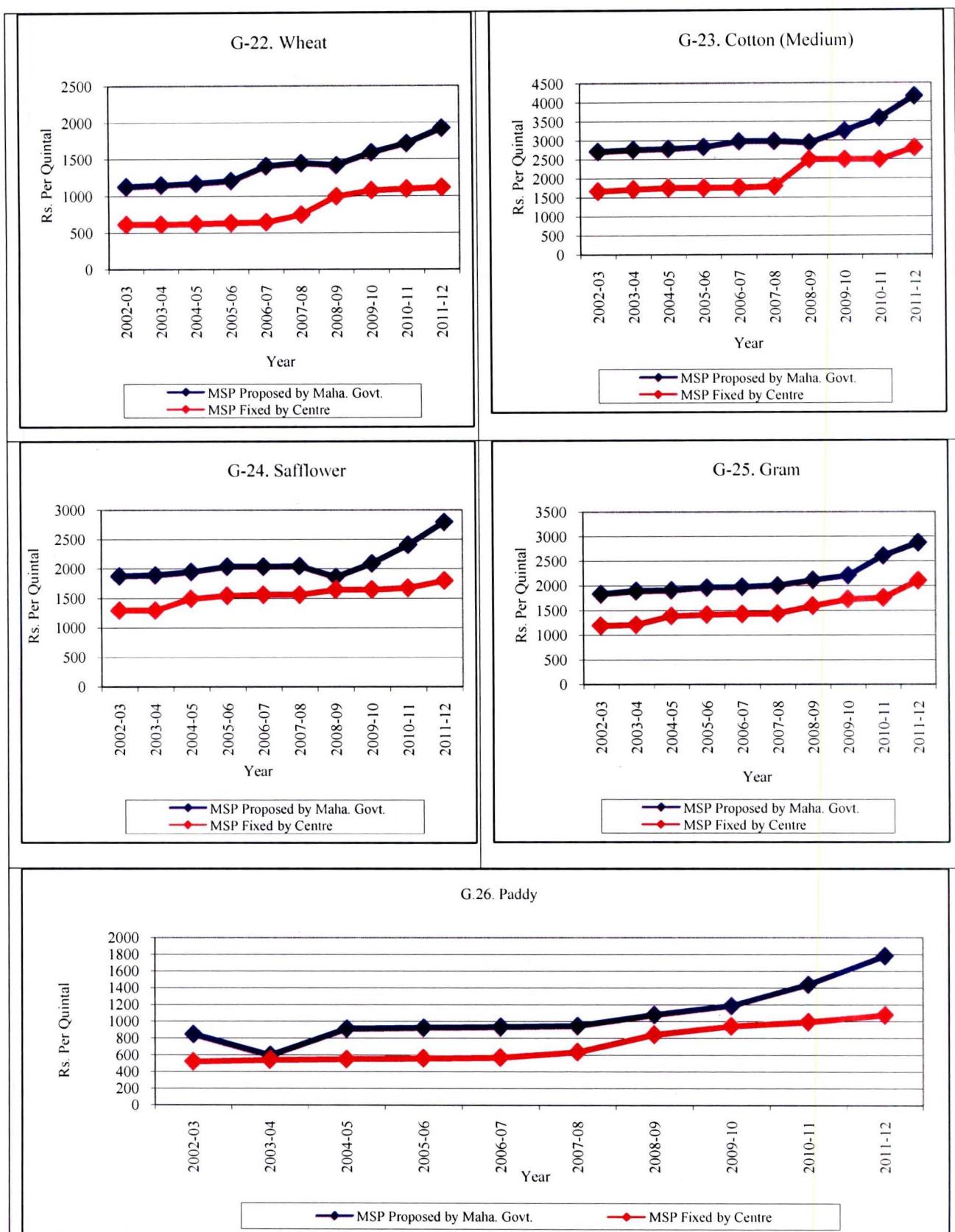
3.3 Comparison between MSP recommended by Maharashtra Agriculture Price Committee Cell and MSP fixed by CACP:

The main objective of the Maharashtra Agricultural Price Committee cell is to recommend MSP for crops produced in the state to CACP, New Delhi on the basis of cost of cultivation of crops produced in the state. Accordingly, the price recommended by Maharashtra state government to CACP for the period 2002-03 to 2011 -12, for 16 major crops is presented from graphs 14 to 26. It can be observed from the graphs that for every crop in every year, the price recommended by state to CACP is always much higher than that actually fixed. The percentage difference by which MSP declared by CACP is lower than price recommended by Maharashtra state is indicated in Appendix A.3.1. By and large the price recommended by Maharashtra state is 30 to 40 percent lower than that actually declared by Centre.

Graphs G14 -26: Price Proposed by Maharashtra Government to CACP and Actual MSP fixed (Rs per quintal)







Since the MSP fixed by CACP is much lower than that recommended by the state, it can be concluded that Maharashtra is a high cost state. Agriculture in the state is mainly rainfed and due to lack of irrigation facilities, yield rates of major crops are low. Consequently Maharashtra has higher cost of production as compared to other states which have irrigation facilities. Hence support prices declared for the country as a whole may not cover cost of production of crops grown in unirrigated states like Maharashtra.

3.4 Comparison between Cost of Production for selected crops in Maharashtra and MSP:

It was observed in the earlier section that Maharashtra is a high cost state. In this section an attempt is made to compare the cost of production of major crops in Maharashtra with MSP.

Table 3.6 Cost of Production for selected crops in Maharashtra and MSP (Rs per quintal)

Year	Cotton			Jowar			Tur		
	Cost of Production	MSP	% by which cost of production is higher than MSP	Cost of Production	MSP	% by which cost of production is higher than MSP	Cost of Production	MSP	% by which cost of production is higher than MSP
2002-03	2318.84	1675	38.44	599.09	485	23.52	1544.86	1320	17.03
2003-04	2348.17	1725	36.13	624.94	505	23.75	1635.55	1360	20.26
2004-05	2365.51	1760	34.40	637.84	515	23.85	1643.45	1390	18.23
2005-06	2403.29	1760	36.55	663.47	525	26.38	1654.81	1400	18.20
2006-07	2527.47	1770	42.79	662.35	540	22.66	1676.05	1410	18.87
2007-08	2463.6	1800	36.87	633.04	600	5.51	1727.52	1590	8.65
2008-09	2464.58	2500	-1.42	653.33	840	-22.22	1860.63	2000	-6.97
2009-10	2721	2500	8.84	807.16	840	-3.91	2224	2300	-3.30
2010-11	3067	2500	22.68	866.6	880	-1.52	2693	3000	-10.23

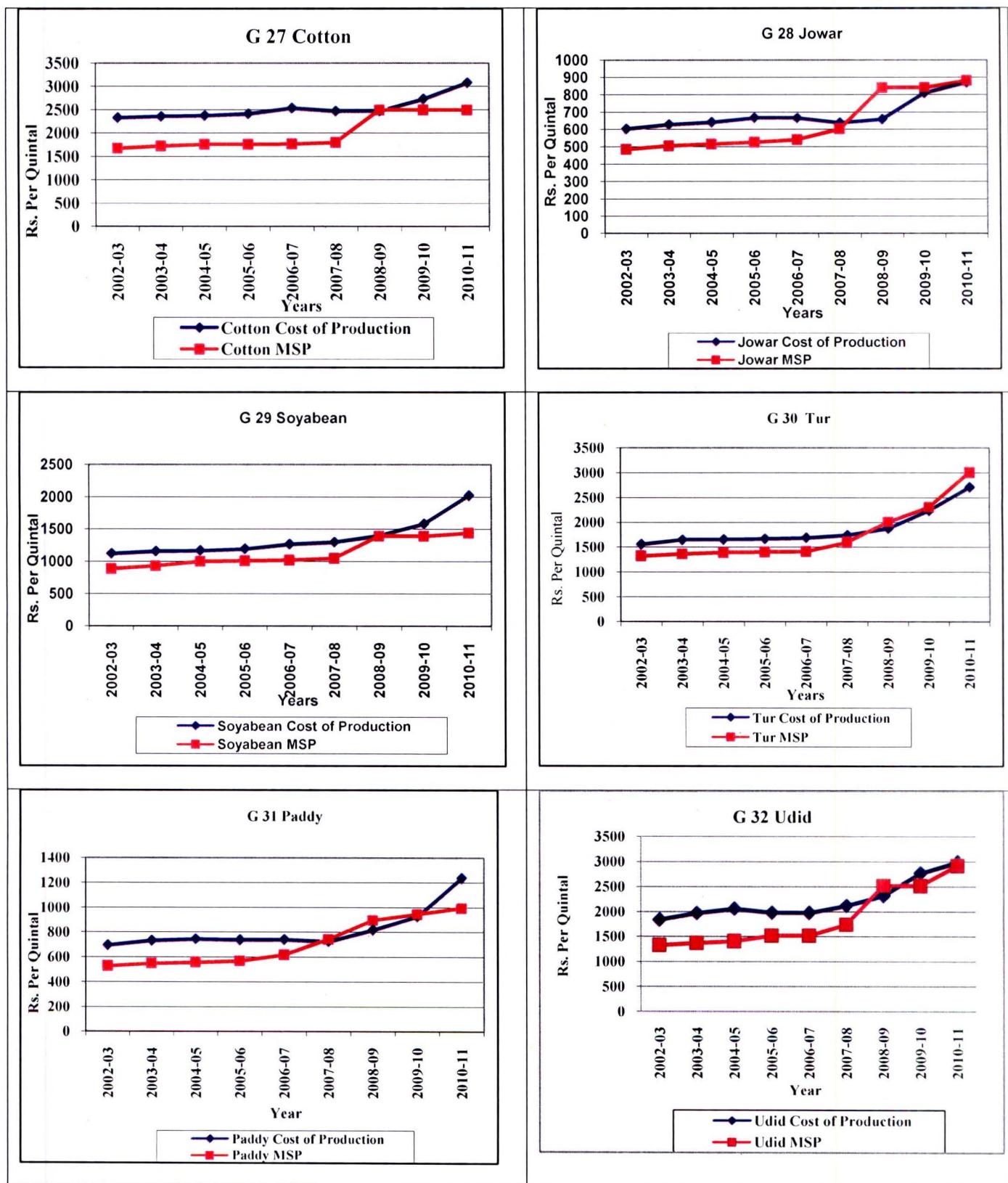
Year	Soyabean			Paddy			Udid		
	Cost of Production	MSP	% by which cost of production is higher than MSP	Cost of Production	MSP	% by which cost of production is higher than MSP	Cost of Production	MSP	% by which cost of production is higher than MSP
2002-03	1114	885	25.88	692.88	530	30.73	1831.46	1330	37.70
2003-04	1149.53	930	23.61	729.48	550	32.63	1966.92	1370	43.57
2004-05	1159.5	1000	15.95	742.16	560	32.53	2052.96	1410	45.60
2005-06	1186.21	1010	17.45	735.27	570	28.99	1976.21	1520	30.01
2006-07	1258.87	1020	23.42	738.62	620	19.13	1972.14	1520	29.75
2007-08	1290.75	1050	22.93	723.29	745	-2.91	2112.17	1740	21.39
2008-09	1393.32	1390	0.24	816.93	900	-9.23	2313.86	2520	-8.18
2009-10	1576	1390	13.38	926	950	-2.53	2764	2520	9.68
2010-11	2016	1440	40.00	1236	1000	23.60	2981	2920	2.09

Source: APC cell, Government of Maharashtra and Reports of CACP, Government of India.

The data related to cost of production in Maharashtra is obtained from Maharashtra APC cell collected under the Cost of Cultivation studies. The data is presented in Table 3.6 and also indicated in graphs G 27 to G 32. It can be observed that for all six selected crops in almost every case, the cost of production is higher than MSP.

In case of cotton, in 2010-11, the cost of production was 22.68 percent higher than MSP. With respect to jowar and tur, which are major crops in Maharashtra, during the last three years, i.e from 2008-09 to 2010-11, the cost of production is marginally lower than MSP. In case of paddy, from 2007-08 to 2009-10, the cost of production in Maharashtra was lower than MSP fixed by the centre. However, the cost increased in 2010-11 and was about 24 percent higher than MSP. In case of soyabean in every year, the cost of production was higher than MSP and in 2010-11, the cost was as much as 40 percent higher than MSP.

A comparison between the cost of production in Maharashtra as indicated above with that of our sample farmers reveals that our sample farmers had a much higher cost for cotton, jowar, tur, and paddy as compared to the overall picture in the state. This indicates that the extent by which costs are higher than MSP in Maharashtra as indicated in Table 3.5, is only an underestimate. MSP therefore does not provide sufficient protection to farmers against crash in prices and Maharashtra is a high cost state due to low yield levels of major crops. The main purpose of MSP is to ensure reasonable prices to farmers, motivating them to adopt new technology and make investment in agriculture. Agriculture as an economic activity is however proving to be unviable for farmers in Maharashtra and if prices reach support levels, farmers will not cover their operational costs. Administration of MSP is equally inefficient and state agencies are not always present at the appropriate time. MSP therefore has its own limitations for states like Maharashtra.



Appendix A.3.1

Comparison between Price Recommended by Maharashtra APC cell and MSP fixed by Centre (Rs per quintal)

SL. No.	Crop	2002-03			2003-04			2004-05		
		Price recommend ed by Maharashtra APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtra a state	Price recommend ed by Maharashtra APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtra a state	Price recommend ed by Maharashtra APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtra a state
1	Paddy (Dhaan)	850	530	-37.65	601	550	-8.49	916	560	-38.86
2	Jowar	742	485	-34.64	783	505	-35.50	800	515	-35.63
3	Bajara	878	485	-44.76	906	505	-44.26	929	515	-44.56
5	Tur	1869	1320	-29.37	1985	1360	-31.49	1996	1390	-30.36
6	Mung	2261	1330	-41.18	2342	1370	-41.50	2379	1410	-40.73
7	Udid	2203	1330	-39.63	2363	1370	-42.02	2461	1410	-42.71
8	Groundnut	1983	1355	-31.67	2017	1400	-30.59	2076	1500	-27.75
9	Soyabean (Yellow)	1352	885	-34.54	1402	930	-33.67	1420	1000	-29.58
12	Cotton (Standered)	2760	1875	-32.07	2775	1925	-30.63	2910	1960	-32.65
	Cotton (Medium)	2707	1675	-38.12	2758	1725	-37.45	2781	1760	-36.71
14	Wheat	1124	620	-44.84	1147	620	-45.95	1167	630	-46.02
15	Gram	1831	1200	-34.46	1892	1220	-35.52	1908	1400	-26.62
16	Saflower	1869	1300	-30.44	1887	1300	-31.11	1943	1500	-22.80

SL. No.	Crop	2005-06			2006-07			2007-08		
		Price recommend ed by Maharashtra APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtra a state	Price recommend ed by Maharashtra APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtra a state	Price recommend ed by Maharashtra APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtra a state
1	Paddy (Dhaan)	928	570	-38.58	937	580	-38.10	951	645	-32.18
2	Jowar	85	525	517.65	865	540	-37.57	843	600	-28.83
3	Bajara	962	525	-45.43	973	540	-44.50	954	600	-37.11
5	Tur	2032	1400	-31.10	2058	1410	-31.49	2176	1550	-28.77
6	Mung	2386	1520	-36.30	2392	1520	-36.45	2549	1700	-33.31
7	Udid	2395	1520	-36.53	2414	1520	-37.03	2666	1700	-36.23
8	Groundnut	2188	1520	-30.53	2212	1520	-31.28	2209	1550	-29.83
9	Soyabean (Yellow)	1473	1010	-31.43	1512	1020	-32.54	1626	1050	-35.42
12	Cotton (Standered)	2992	1980	-33.82	3094	1990	-35.68	3095	2030	-34.41
	Cotton (Medium)	2826	1760	-37.72	2971	1770	-40.42	2977	1800	-39.54
14	Wheat	1204	640	-46.84	1404	650	-53.70	1444	750	-48.06
15	Gram	1962	1425	-27.37	1974	1435	-27.30	2000	1445	-27.75
16	Saflower	2031	1550	-23.68	2031	1565	-22.94	2040	1565	-23.28

Report of the Study Group on Minimum Support Price of Selected Agriculture Produce in Maharashtra State

SL. No.	Crop	2008-09			2009-10			2010-11		
		Price recommend ed by Maharashtr a APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtr a state	Price recommend ed by Maharashtr a APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtr a state	Price recommend ed by Maharashtr a APC cell	MSP fixed by CAC P	% by which MSP declared by CACP is lower than price recommend ed by Maharashtr a state
1	Paddy (Dhaan)	1082	850	-21.44	1190	950	-20.17	1442	1000	-30.65
2	Jowar	861	840	-2.44	1101	840	-23.71	1164	880	-24.40
3	Bajara	1013	840	-17.08	1224	840	-31.37	1427	880	-38.33
5	Tur	2312	2000	-13.49	2769	2300	-16.94	3137	3000	-4.37
6	Mung	2959	2520	-14.84	3414	2460	-27.94	4062	3170	-21.96
7	Udid	2901	2520	-13.13	3409	2520	-26.08	3479	2900	-16.64
8	Groundnut	2357	2100	-10.90	2753	2100	-23.72	2994	2300	-23.18
9	Soyabean (Yellow)	1735	1390	-19.88	1990	1390	-30.15	2351	1440	-38.75
12	Cotton (Standered)	2917	3000	2.85	3414	3000	-12.13	3697	3000	-18.85
	Cotton (Medium)	2936	2500	-14.85	3247	2500	-23.01	3581	2500	-30.19
14	Wheat	1415	1000	-29.33	1590	1080	-32.08	1715	1100	-35.86
15	Gram	2112	1600	-24.24	2203	1730	-21.47	2607	1760	-32.49
16	Safflower	1855	1650	-11.05	2084	1650	-20.83	2402	1680	-30.06

SL. No.	Crop	2011-12		
		Price recommended by Maharashtra APC cell	MSP fixed by CACP	% by which MSP declared by CACP is lower than price recommended by Maharashtra state
1	Paddy (Dhaan)	1780	1080	-39.33
2	Jowar	1471	980	-33.38
3	Bajara	1697	980	-42.25
5	Tur	3672	3200	-12.85
6	Mung	4675	3500	-25.13
7	Udid	4174	3300	-20.94
8	Groundnut	4004	2700	-32.57
9	Soyabean (Yellow)	2763	1690	-38.83
12	Cotton (Slandered)	4285	3300	-22.99
	Cotton (Medium)	4149	2800	-32.51
14	Wheat	1921	1120	-41.70
15	Gram	2868	2100	-26.78
16	Safflower	2791	1800	-35.51

Appendix A.3.2

Alternative Cost of production (Rs per acre) considering Rs 300 as wage rate per day

Sr. No	Particulars	Paddy	Jowar	Tur	Gram	Kapas	Soyabean
1.	Gross Income /acre	25200	28984	10283.71	12572.92	14891.79	8207
2	Yield quintals /acre	12	11	2.7	5.08	4.29	4.12
3	Human labor	8579	8775	6952	6025	12728	4720
4	Animal Labor	3062.19	1039	936.07	683.33	2057.14	1143.53
5	Machinery cost	84.88	3016	1111.75	1397.91	889.29	770.59
6	Preparatory Tillage	1500	3789	635.05	490	3107.14	1458.82
7	Sowing &Seed Treatment	1000	159	489.28	1239	1003.57	1072.06
8	Manures & Fertilizers	2000	1129	1035.87	974.16	2800	467.79
9	Plant Protection	129.10	125	438.14	406.25	2000.89	466.18
10	Intertillage & Irrigation	--	557	189.69	241.66	107.14	--
11	Harvesting	2000	--	--	--	1176.79	--
12	Threshing	1200	--	--	12.5	--	443.24
13	Marketing	960	330	728.53	570.25	--	--
14	Land revenue	48.78	72	13.93	10.5	31.61	14.85
15	Total Cost /acre	20564	18992	12531	12050	25902	10557
16	Cost /quintal	1714	1726	4641	237	6038	2562
17	Net Income/acre	4637	9992	-2247	523	-11010	-2350
18	Net Income/hectare	13433.14	34631.87	2944.24	8630.79	-7410	1790.75
19	Weighted Average price (Rs / quintal)	2100	2760.38	3711	2473.36	3474.75	1993
20	MSP Rs / quintal	1080	980	3200	2800	3300	1690
21	Net Income/quintal	386	908	-832	103	-2566	-570

Source : Field Survey

Chapter 4

Broad Conclusions and Policy Implications

In order to promote agricultural growth and increase food production, the government of India has resorted to a number of policy measures. Such measures comprised of massive investment in irrigation (major, medium and minor irrigation), creation of appropriate financial institutions to provide timely short-term as well as long term- credit to farmers, and by and large investment in rural infrastructure. Equally important was also a price support policy and producer's ascendancy while framing price policy so as to induce him to use new technology. Accordingly the Agricultural Price Commission since inception in 1965 (renamed as Commission on Agricultural Costs and Prices in 1984) began announcing Minimum Support Prices for major agricultural crops in advance of the planting season. MSP is viewed by the Commission as being in the nature of long term guarantee to the producers that any glut in the market which may be caused by excess production will not be able to depress their incomes to unduly low levels. Once the minimum price of a crop is announced, it is implied that the government is committed to purchase, at the announced level of support price, unlimited quantities of the crop concerned, irrespective of the size of the harvest and the level of market prices. Purchases by government agencies at minimum support prices is thus open ended and these prices set a floor below which market prices cannot fall.

In view of the above, an attempt was made in this paper to observe if the MSP declared by the CACP, covered atleast operational costs in major states for major crops. Further, the focus of the study was Maharashtra on Maharashtra state in order to observe the cost of production of sample farmers and compare it with MSP as well as prices prevailing in the regulated markets. Further, the prices recommended by Maharashtra APC cell to CACP were compared to the MSP actually announced.

The following policy implications emerge from the study:

1. When the MSP for a crop is fixed, it is expected that it should atleast cover cost A2+FL, but not necessarily cover the full costs of the relatively high cost states. However, from the secondary data collected from the reports of CACP, it was observed that there are cases when cost A2+FL are not covered. For example, in case of pulses in 2005-06 and 2006-07, cost

A2+FL is not covered in several states. Thus in cases where MSP is lower than A2+FL even a floor is not provided to farmers which protects them against losses. The very purpose of MSP is to prevent any cash losses to farmers even in years of glut, so as to encourage them to use new technology. The CACP must therefore take necessary steps to ensure that atleast operational costs of farmers are covered.

2. The field survey conducted in several districts in Maharashtra for five crops, showed that MSP did not cover the operational cost of production for paddy, tur, raw cotton, and soyabean for sample farmers. In case of paddy, tur and soyabean, since the market price realized by farmers is higher than cost of production, the farmers did not incur losses. However, in the event of prices falling below MSP, the farmers would have incurred losses. Such situations must not arise and CACP should take into consideration such situations while recommending MSP to the Central government.
3. The field survey in Amravati district, showed that cultivation of *kapas* is causing losses to farmers as market price and MSP are lower than cost of production. The cost of production was observed to be 20 percent higher than realized price which is making the cultivation of cotton unviable. In fact, in 2011-12, there was an increase in acreage of cotton in the country by 9 percent as compared to the previous year i.e 2010-11. The state of Maharashtra has highest area under cotton in the country and accounted for 33.6 percent of country's area. The cotton area in Maharashtra is mostly concentrated in Vidarbha which is recently known as a "suicide belt". However, with decline in prices in 2011-12, farmers are likely to face falling profits or even incur losses. There is also a sharp decline in international prices as compared to 2010-11. There is a strong agitation by cotton farmers in Maharashtra for increase in MSP of cotton and they are reluctant to bring their produce for sale in hope of higher prices. High cost of production of cotton is therefore a cause of concern and is often quoted as a major cause of agrarian crisis in Maharashtra. In 2011-12 while the MSP recommended by state government was Rs 4285/ per quintal, the price fixed by centre was Rs 3300/-per quintal for long staple cotton while in case of medium staple the price fixed by centre was 32 percent lower than that recommended by state APC cell to centre. The cost of production in Maharashtra has also observed to be much higher than MSP. There therefore appears to be a case to increase MSP of cotton. Equally important is the need to increase productivity so as to reduce cost. Cotton cultivation in the state is mainly rainfed and due to

lack of irrigation facilities, the yield is very low. While yield of cotton in Maharashtra in 2010-11 is 351 kg per hectare, it is 659 kg per hectare in neighboring state of Gujarat. Other cotton growing states have also shown much higher yields than Maharashtra.

4. The field survey showed that in case of gram, the market price realized by sample farmers is lower than MSP, but since cost of production was lower than realized prices farmers earned a positive net income. However, this indicates that state agencies were not present in the markets to make purchases when prices fell below MSP. In case there was presence of state agencies, the farmers would have an opportunity to sell their produce at higher prices as MSP was higher than ruling market prices. Sale at MSP would have increased their net income. It is therefore necessary that when prices fall below MSP, the state agency such as National Agricultural Co-operative Marketing Federation, designated for pulses should enter the market and conduct procurement operations.
5. By and large, Maharashtra is a high cost state for all crops and prices recommended by State are far higher than MSP actually fixed by Centre. The state has highest area in the country for tur, which is almost 30 percent of the country's area and also contributes highest to the country's production. The net returns to farmers are however very low. Efforts must therefore be made to increase productivity of pulses by improving irrigation facilities besides providing price incentive to farmers.
6. Maharashtra has second highest area under soyabean, followed by Madhya Pradesh, but the cost of production is higher than MSP. Soyabean is an important non conventional oilseed in the state and contributes to about 13 percent of gross cropped area in the state. It is therefore necessary to increase productivity of the crop along with price support so as to induce farmers to cultivate the crop. It may be noted here that about a decade ago, the government had to rationalize duty structures to harmonize the interests of domestic oilseeds producers, consumers and processors. To protect the growers of oilseeds, import tariffs had to be increased so that domestic price could compete with international prices. With rise in incomes, demand for edible oils is increasing, and it is therefore important to increase productivity of soyabean. Besides increasing MSP, technology must also play a role in increasing productivity.
7. Technology is necessary for increasing production and building a sound agricultural economy. However, after production, marketing of produce is equally important and it is in

this context that MSP plays an important role. In order to ensure price stability, infrastructure facilities must be made available to farmers. Hence adequate number of procurement centres throughout the country must be set up so that farmers do not have to make distress sales. There are several states in the country where there is inadequate coverage of procurement operations and only limited farmers in certain states are able to benefit from the price policy of the centre. Further, there must be timely intervention by designated government agencies to purchase the produce at support prices in case open market prices fall below support level. If appropriate infrastructure is not available, farmers are denied the benefit of MSP and declaration of MSP remains merely a notional concept. Hence the government must ensure that there is timely intervention by state agencies whenever required.

Overall the study concludes that although MSP aims at setting a floor price below which market prices must not fall and it must cover atleast cost A2+FL, this has always not been the case. Maharashtra is a high cost state and prices recommended by state APC cell to Centre are much higher than that finally announced by centre. Infrastructure bottlenecks must also be removed so as to facilitate implementation of price policy and prevent distress sales.