

# Wheat Production, Marketing And Export



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# Foreword


Improved Agricultural Marketing Information system is key to the development of Pakistan's Agrarian Economy. Fully cognizant of the fact, Government of the Punjab in Agriculture Department is implementing a Programme for improvement of Agricultural Marketing Information System to facilitate Agribusiness with special emphasis on exports. The objectives are as follows:

- **Collection of data on domestic production to monitor the crop situation to find out estimation Marketable and Exportable Surplus.**
- **To collect information on International Production and Trade.**
- **To provide Information to the policy maker to facilitate export of Agriculture Crop/Produce to find out potential export markets to accelerate export.**
- **Maintenance of database on vital information regarding domestic and International Production, Trade, Consumption needs and quarantine requirements/ standards of Agriculture Crop.**
- **To discuss the WTO issues and Constraints under its regime.**

This report relate to Wheat through a planed effort, keeping in view the above objective. Available information is updated, further required data has been collected and processed.

The information collected has been compiled into a booklet form to be used as reference/benchmark by all the stakeholders' viz. producers, processors, traders and exporters to enable them to plan an effective role in the World's production, productivity and export. The efforts made by Mr. Liaqat Ali Raza Extra Assistant Director of Agriculture (Economics & Marketing) Headquarter office & Mr. Muhammad Irfan Bhatti analyses and composition to compile the information is highly acknowledged.

To update the information is regular activities All the stakeholders can obtain the latest information from the Directorate through toll free telephone Number (0800-51111). Any suggestion for improving the format and the content of this publication would be welcome.

  
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## WHEAT PRODUCTION, MARKETING AND EXPORT

### INTRODUCTION

Wheat demand by 2020 is expected to be 40% greater than its current level of 552 million tons (CYMMIT), but the resources available for wheat production are likely to be significantly lower. Viewed in this light, the challenge for increasing wheat supplies in the developing world is as great today as it was three decades ago at the start of the Green Revolution. The strategies that developing countries adopt to meet future demand for wheat will depend a great deal on how they are affected by the changes that are sweeping the world economy and transforming the way we conduct research. As global food markets become increasingly integrated, the premium once placed on food self-sufficiency is being superseded by an emphasis on economic competitiveness and comparative advantage.

Agricultural resources are increasingly diverted from cereal crop production to other agricultural and nonagricultural activities. Research systems, national as well as international, face declining budgets and uncertain futures. The free international movement of germplasm and information, which was an important force behind the Green Revolution, is increasingly circumscribed by plant quarantine restrictions and intellectual property protection.



What strategy should the global wheat research system pursue in this world? The answer explored here is for the research system to focus on sustaining the competitiveness of wheat production in developing countries. This goal can be achieved through a shift in the yield frontier, a constant drive to stabilize yields, and enhanced input use efficiency and input responsiveness in wheat varieties. The emphasis on

improving the profitability of wheat production should not be restricted to irrigated, favorable environments; similar opportunities ought to be explored for marginal, rain fed environments.

In exploring these issues, we focus on the roles that global wheat research and germplasm exchange have played and should play in sustaining growth in wheat productivity over the next two decades. After discussing past trends in wheat productivity, we review potential technological advances for favorable and marginal wheat environments. We conclude by discussing how the integration of world food markets, economic liberalization, and greater intellectual property protection are likely to affect the chief source of gains in wheat productivity: the global system of germplasm and information exchange.

## WORLD WHEAT SENARIO

About 120 countries in the world produce wheat. But a major share is concentrated in few countries. Ten countries produce about 68% of the total wheat. Below given table indicate the share of major wheat producing countries. Pakistan stands at sr. No. 9 in wheat producing countries.

Sr. No.	Countries	Metric Tones	Percentage Share
1	China	96160250	15.47
2	India	72000000	11.58
3	United States of America	57105552	9.19
4	Russian Federation	45500000	7.32
5	France	36922000	5.94
6	Canada	255469000	4.11
7	Australia	24067000	3.87
8	Germany	23578000	3.79
<b>9</b>	<b>Pakistan</b>	<b>21591400</b>	<b>3.47</b>
10	Turkey	21000000	3.38
<b>Sub Total</b>			<b>68.12</b>
<b>Other 111 Countries</b>			<b>31.88</b>
<b>Total</b>			<b>100</b>

Source: FAO

Pakistan contributed about 3.47% in total world's production during the year 2000-01. Over the last 16 years the share of Pakistan has risen from 2.42 per cent in 1989-99 to 3.45 percent in 2004-05 due to increasing trend of production during the last 16 years, which is faster as compared to rest of the world.

#### Trend Of Pakistan Share In World Wheat Production

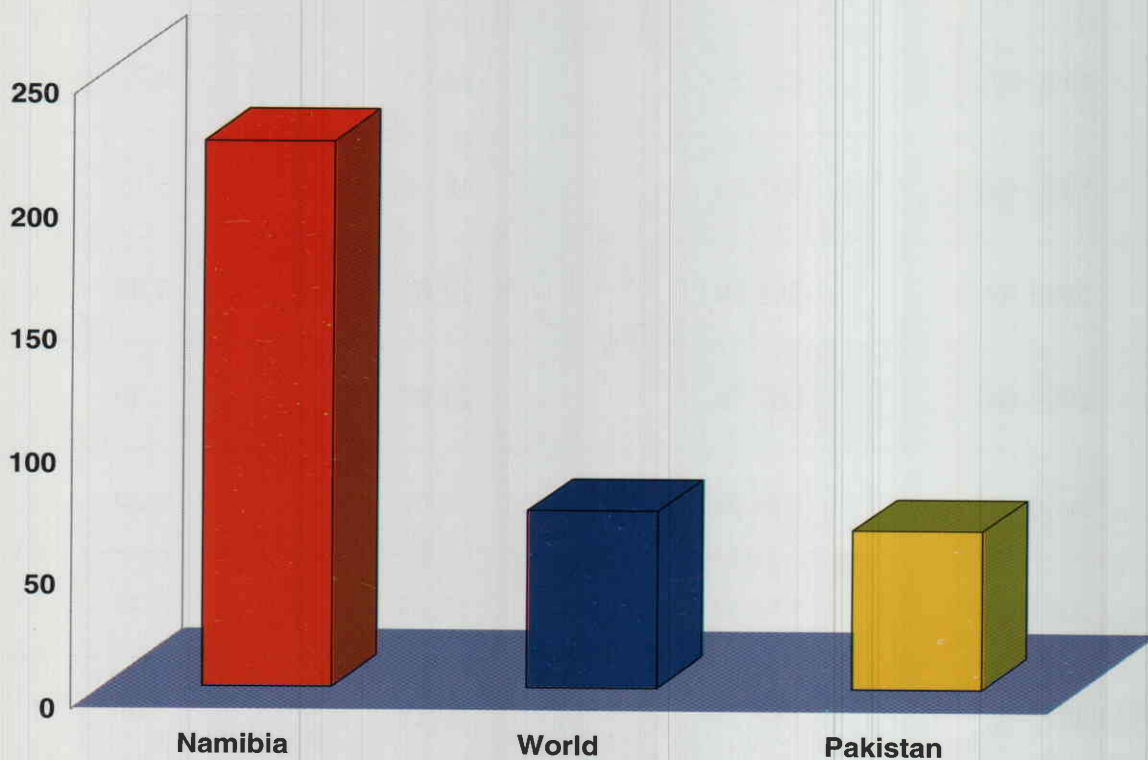
Year	World	Pakistan	Percentage Share
	Million Metric Tones		
1993-94	527.34	15.21	2.88
1994-95	542.71	17.00	3.13
1995-96	584.44	16.91	2.89
1996-97	613.21	16.65	2.72
1997-98	592.68	18.69	3.15
1998-99	588.58	17.86	3.03
1999-00	587.56	21.08	3.59
2000-01	578.93	19.02	3.27
2001-02	574.39	18.23	3.17
2002-03	561.71	19.18	3.48
2003-04	629.56	19.50	3.10
2004-05	626.47	21.61	3.45

Source: FAO

## World Wheat Productivity

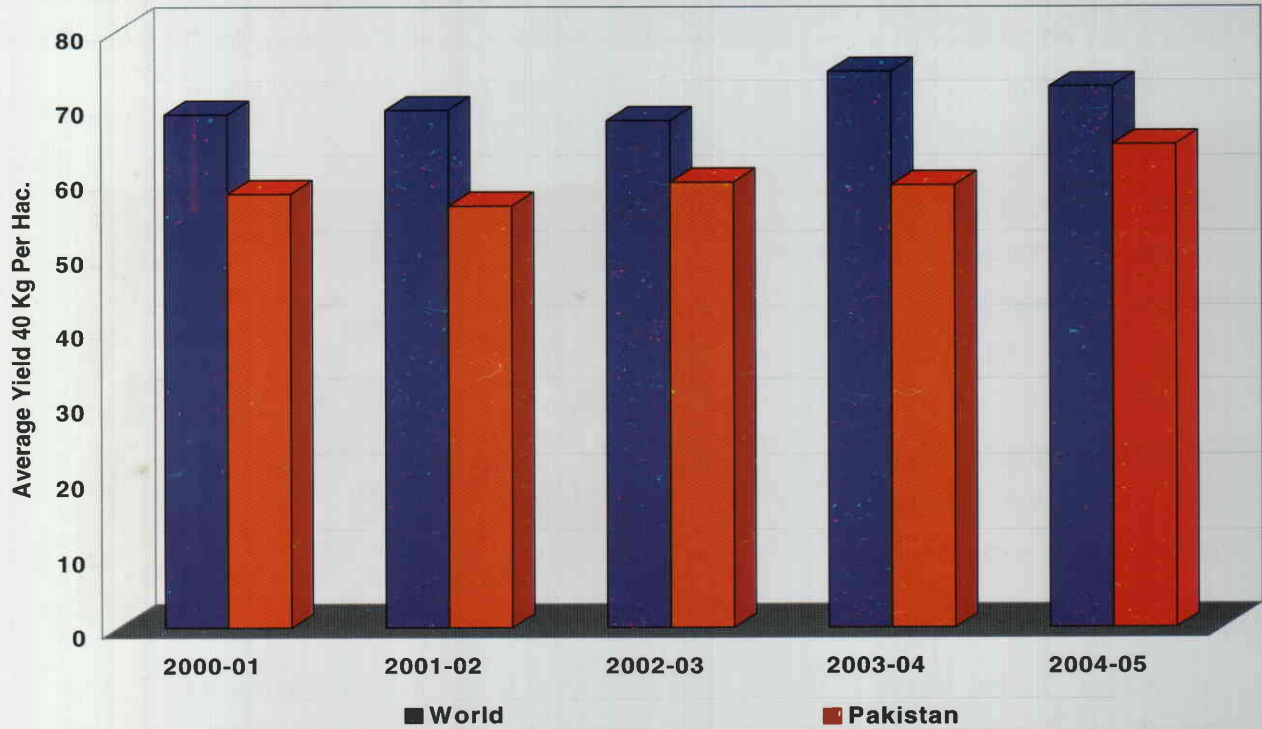
The development and release of modern wheat varieties in the early 1960s triggered the Green Revolution. The first and most important factor contributing to the success of the wheat revolution was wheat itself: semi-dwarf, high-yielding, rust-resistant wheat seed. The second was the establishment of a free, unrestricted global wheat research system based on the exchange of Germplasm. The third was large-scale investment in fertilizers, irrigation, and transportation infrastructure. Lastly, the strong political will in developing nations to achieve food self-sufficiency, combined with a conducive agricultural policy environment, also contributed to success.

The largest gains in productivity were made in land-scarce countries, where the new seed and fertilizer technologies fostered rapid growth in land productivity. By the late 1970s, 40% of the wheat area in developing countries was sown to modern high-yielding varieties; the figure for Asia was close to 70%.



Although Pakistan stands in top 10 wheat producing countries but the yield level is below the world's average. Pakistan position in the productivity chart is at number 58. However, during the last 16 years there is significant increase in wheat productivity i.e. 18.46 in 1989-90 to 26.16 (40kg. Per Acre) in 2004-05 and the yield level is approaching

the world average. The year wise productivity level of Pakistan and world on the whole is indicated in the below given table and graph-



Area in '000' Acres  
Production In '000' Tones

Year	Punjab		Sindh		N.W.F.P.		Balochistan		Pakistan	
	Area	Prod.	Area	Prod.	Area	Prod.	Area	Prod.	Area	Prod.
1993-94	14260	11218	2732	2117	2050	1134	811	744	19853	15213
1994-95	14585	12713	2627	2319	2135	1180	841	790	20188	17002
1995-96	14761	12430	2734	2345	2140	1203	1064	930	20699	16907
1996-97	14431	12371	2735	2444	2083	1065	790	771	20038	16651
1997-98	14665	13807	2768	2659	2269	1356	943	872	20645	18694
1998-99	14665	13212	2777	2675	2119	1222	776	749	20337	17858
1999-00	15272	16480	2827	3001	1993	1068	820	530	20913	21079
2000-01	15458	15419	2003	2227	1953	764	801	614	20216	19024
2001-02	15078	14594	2165	2101	1846	891	824	641	19913	18227
2002-03	15067	15355	2134	2109	1809	1064	842	655	19853	19183
2003-04	15375	16109	2170	2167	1867	1097	793	618	20205	19990
2004-05	15321	16090	2175	2257	1903	1081	840	662	20238	20090

Source: Federal Bureau of Statistics Government of Pakistan, Karachi



## WHEAT PRODUCTION IN PAKISTAN

Wheat is a staple food crop of Pakistan, dominating all crops in acreage and production. It is sown on an area of more than 8.0 million hectares, which accounts for 37.1 % of the cropped area, 65 % of the food grain acreage. and 70 % of the production.

It is mainly grown under irrigated conditions, wheat water requirements range from 20-21 in/acre. The Indus Plains with their favorable topography, rich soil, and good agricultural facilities have a much greater acreage planted to wheat.



In Pakistan, spring wheat is grown as a Rabi crop in the Sindh, Punjab, NWFP, and Balochistan provinces. In the northern parts of Balochistan, some winter wheat is cultivated on a small scale. The wheat-growing area was 20.65 million acres and production was 21.61 million tons in 2004-05.

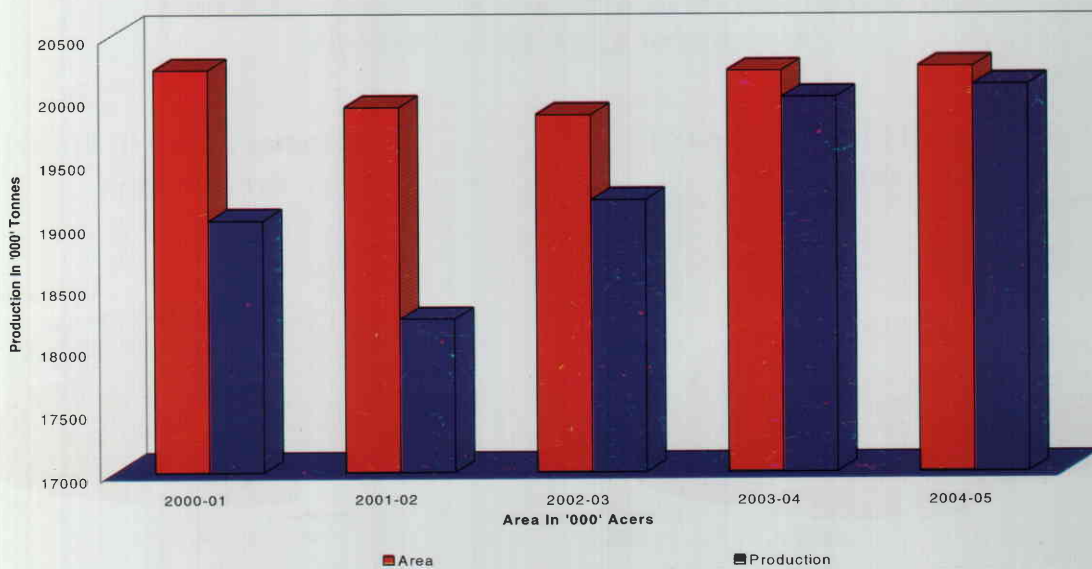
### Area and production of Wheat in Pakistan

Year	Area '000 acres'	Production '000 tons'
1995-96	20699.17	16907.40
1996-97	20038.40	16650.50
1997-98	20645.05	18694.00
1998-99	20336.41	17857.60
1999-00	20912.92	21078.4
2000-01	20215.57	19023.70
2001-02	19941.78	18223.5
2002-03	19852.57	19183.30
2003-04	20303.05	19499.80
2004-05	20653.45	21612.00

Source: Agriculture Statistic of Pakistan

Cultivation area of wheat is quite stable whereas the production is fluctuating due to change in yield level. The yield is affected by number of factors like:

- Availability of water
- Quantum and timing of rainfall
- Supply of inputs specially the phosphate fertilizers
- Input Prices
- Level of support price and its implementation during last year



## Average Annual Growth Rate Of Area, Production And Yield Of Wheat

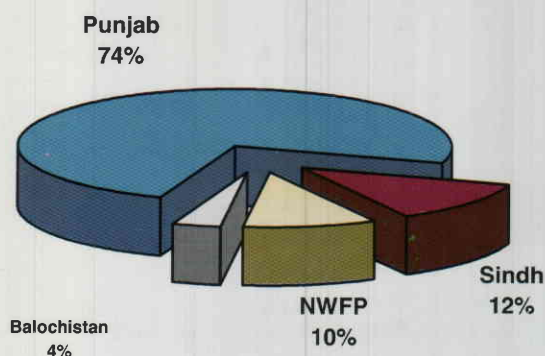
Country/Province	Percent Per Annum		
	Area	Production	Yield
Pakistan	(+) 0.21	(+) 1.02	(+) 1.23
Punjab	(+) 0.35	(+) 1.25	(+) 1.60
Sindh	(-) 0.35	(+) 0.98	(+) 0.63
NWFP	(-) 0.03	(-) 0.89	(-) 0.93
Balochistan	(-) 1.34	(-) 0.44	(-) 0.79

### WHEAT CULTIVATION IN PUNJAB

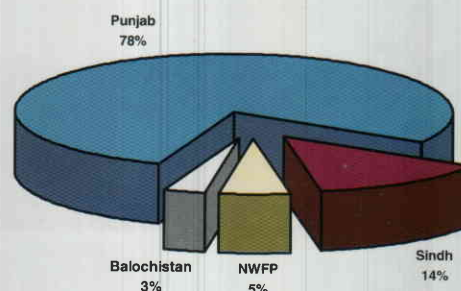
Punjab is the main contributor of wheat production in Pakistan. On an average for last 3 years the Punjab contributed 78% of the total production in the country. Sindh follows it with an average share of 14%. Wheat is sown both irrigated and barani conditions. About 11.6% area under wheat is in barani condition, which contributed which contributed 5.7% in total production of the province during 2004-05. The yield per acre is slightly higher in Sindh (2,410 kg) as compared to Punjab (2,316 kg). The average provincial share of wheat area and production is shown in the table given below:

### Provincial Shares in Area and Production of Wheat (Average of 1998-99 to 2004-05)

Provincial Share in Area of  
Wheat



Provincial Share in Wheat  
Production



## Area & production of Wheat

Country/Province	Area		Production	
	'000' hectares	%age	'000' tones	%age
Pakistan	8181.46	100.00	19630.38	100.00
Punjab	6208.38	75.85	15740.85	80.19
Sindh	875.98	10.70	2222.60	11.32
NWFP	763.18	9.32	1017.75	5.16
Balochistan	337.93	4.13	649.18	3.31

Source: Agriculture Statistics of Pakistan

The major production area is in Punjab (71.17 %), followed by the Sindh province (13.38 %). However, the yield per acre is slightly higher in Sindh (2,410 kg) as compared to Punjab (2,316 kg).

## Yield Trend in Wheat (Mannds /acre)

*Yield Per Acers In 40 Kg.*

Year	Punjab	Sindh	NWFP	Balochistan	Pakistan
1995-96	21.05	21.44	14.05	21.86	19.60
1996-97	21.43	22.34	12.78	24.41	20.24
1997-98	23.54	24.02	14.94	23.10	21.40
1998-99	22.52	24.08	14.41	24.12	21.28
1999-00	26.98	56.54	13.39	16.14	20.76
2000-01	24.94	27.79	9.78	19.16	20.42
2001-02	24.20	24.29	10.85	19.82	19.79
2002-03	25.48	24.71	14.71	19.44	21.08
2003-04	25.29	25.02	13.99	19.89	21.00
2004-05	27.56	28.61	14.74	18.82	22.43

Source: Agriculture Statistics of Pakistan

In Punjab, wheat is mostly grown on irrigated land. Wheat production from rain fed areas is about 10 %. However, weather causes year-to-year fluctuations in crop production. Good rainfall means a good wheat crop. For example, 1997-98 had good rainfall, and the production increase in wheat was 48 % in rain-fed areas compared with the previous year, whereas increased production in the irrigated areas was only 8.5 %. The production target of wheat for Punjab province for 1998-99 is 16.37 million tons. To achieve this target, an 18.6 % increase in the present wheat production is required. The target production area is 6,026,500 hectares.

### **INITIATIVES OF GOVT. TO ENHANCE WHEAT PRODUCTION**

The government of the Punjab has provided loans to small farmers; removed the customs duties or sales taxes on combines, harvesters, and other agricultural implements; reduced tractor prices; and increased subsidies to 5,000 small farmers to increase production. Additionally, 12.5 acres of land is being distributed to non-landowning growers. Strict rules against pesticide and fertilizer use and an increase in the support price of wheat are under consideration.



### **World Wheat supply and demand**

World wheat supply and demand forecasts for highlights a small reduction in production, a slight increase in global consumption and trade, and a modest drop in projected ending stocks. While forecast world wheat production is down less than 1 percent from the previous year, production is 12 million tons less than projected consumption, causing the drop in stocks. Wheat stocks are expected to drop most in China and in the major exporters, the United States, European Union (EU), Canada, and Australia, but this is partly offset by a sharp increase in stocks forecast for the former Soviet Union.

In wheat export, Pakistan share during the last 10 years is negligible. Infact Pakistan was a net importer of wheat during last decade up to 2005. Major wheat exporting countries and their corresponding share in worlds Market is given below: -

Sr. No	Countries	Exports - Qty (Mt)	Exports - Val (1000\$)	A.U.P. (\$/Tonne)	Export %age Share
1	U.S.A.	31,581,449	5,180,994	164.05	26.91
2	Australia	18,450,822	3,089,044	167.42	16.04
3	Canada	15,118,679	2,688,815	177.85	13.96
4	France	14,891,804	2,553,108	171.44	13.26
5	Argentina	9,976,599	1,365,480	136.87	7.09
6	Germany	3,926,949	709,311	180.63	3.68
7	Russian Fed	4,672,189	535,975	114.72	2.78
8	United Kingdom	2,523,344	377,913	149.77	1.96
9	Kazakhstan	2,360,062	360,157	152.60	1.87
10	India	2,007,947	322,056	160.39	1.67
<b>Sub Total:</b>		<b>105,509,844</b>	<b>17,182,853</b>	<b>162.86</b>	<b>89.24</b>
<b>Other 100 Countries</b>		<b>13,084,304</b>	<b>2,071,296</b>	<b>158.30</b>	<b>10.76</b>
<b>Grand Total</b>		<b>118,594,148</b>	<b>19,254,149</b>	<b>162.35</b>	<b>100.00</b>

Source: FAO

Only a few countries are self sufficient in wheat production. During the Year 2004 about 174 countries imported wheat to meet their domestic consumption level. The major wheat importing countries are given below: -

Sr. No.	Countries	Imports - Qty (Mt)	Imports - Val (1000\$)	A.U.P. (\$/Tonne)	Export %age Share
1	China	8,324,178	1,873,486	225.07	<b>8.95</b>
2	Italy	6,482,655	1,269,318	195.80	<b>6.06</b>
3	Japan	5,490,227	1,275,244	232.28	<b>6.09</b>
4	Algeria	5,034,447	1,026,463	203.89	<b>4.90</b>
5	Brazil	4,847,805	838,770	173.02	<b>4.01</b>
6	Indonesia	4,545,590	841,000	185.01	<b>4.02</b>
7	Spain	4,367,919	748,754	171.42	<b>3.58</b>
8	Egypt	4,366,841	727,651	166.63	<b>3.48</b>
9	Mexico	3,585,471	617,765	172.30	<b>2.95</b>
10	Malaysia	3,378,088	287,256	85.04	<b>1.37</b>
<b>Sub Total:</b>		<b>50,423,221</b>	<b>9,505,707</b>	<b>188.52</b>	<b>45.41</b>
<b>Other 164 Countries</b>		<b>63,121,934</b>	<b>11,427,507</b>	<b>181.04</b>	<b>54.59</b>
<b>Grand Total</b>		<b>113,545,155</b>	<b>20,933,214</b>	<b>184.36</b>	<b>100.00</b>

Source: FAO

#### WHEAT EXPORT FROM PAKISTAN

Pakistan has been net importer of wheat during the last decade up to 1998-99. The year wise imPort and forei9n exchan9e exPanded on the imPort of wheat is indicated in the

below given table. On an average Pakistan expended 352 Million US \$ on the import of Wheat from 1989-90 to 1999-00.

<b>YEAR</b>	<b>Import - Qty (Mt)</b>	<b>Import - Val (1000\$)</b>
1993-94	1,901,646	238,732
1994-95	2,616,581	420,814
1995-96	1,968,110	455,722
1996-97	2,500,203	492,106
1997-98	2,520,071	354,132
1998-99	3,239,759	418,137
1999-00	1,048,179	144,207
2000-01	149121	257,725
2001-02	267192	511,46
2002-03	147913	294,25
2003-04	107978	232,64

Pakistan's economy has taken a new turn with the country for the first time entering the wheat export market in the year 2000-2001. Pakistan has appeared as a potential competitor to wheat exporters in Gulf and Middle Eastern markets. Pakistan, which until last year had to import wheat from Australia and the United States, has built up a surplus stockpile of 2 million tons following a bumper crop in 2000. The country aims to increase its export despite drought conditions.

Pakistan's Economic Coordination Council (ECC) of the federal cabinet set a target for wheat exports of 800,000 tons for the year 2000-2001. In addition to Iraq, Afghanistan and Iran were identified as potential buyers. Pakistan sealed the deal for hard red winter wheat to Iraq under the "oil for food" program of the United Nations at the rate of 214 Euros per ton - or about US\$196 per tone. There had been some conflict over the Iraq deal as Baghdad had wanted to pay only \$125 per ton, against the minimum



international prices of about \$150 a ton. By contrast, under a recent agreement signed between the government of Afghanistan and Pakistan, Afghanistan will import 250,000 tons of wheat by December 2001 at the subsidized rate of \$138 per ton.

Year	Exports - Qty (Mt)	Exports - Val (1000\$)
1997-98	4000	1538
1998-99	4000	1538
1999-00	23148	4316
2000-01	353288	39809
2001-02	642595	73003
2002-03	1138281	132153
2003-04	42863	5958

Pakistan's wheat export targets might have to revised as a result of this season's drought which could see overall production slide by 15 to 20 percent against last year's total of 21 million tons. The country's consumption requirement is approximately 21.3 million tons.

Nevertheless, the government is determined to continue with exports. The ECC has recently approved deregulation of wheat exports by allowing local producers to export wheat without having to obtain to a No Objection Certificate (NOC) or others permission from any government agency.



International reports say that the recent dry weather in the wheat growing areas of Canada, Australia and China, resulting in a lower estimate for world production, will help Pakistan.

The United States Department of Agriculture May crop report puts wheat output in the 2001-02 season at 572 million tons, down from 580 million last year and 586 million two years ago. International analysts believe there will be a likely cut in China's wheat production, as well as declines of about 1 million tons in Canada's output and possibly 1.5 million tons in Australia's production.

However, Pakistan will not alone in the region in attempting to capitalize on this opportunity. India has raised the ceiling for wheat export by state-run firms for 2000-01 from 2 million tons to 5 million tons. However, its chances of attaining this target by the end of June are bleak due to the inferior quality of the wheat.

India offers wheat on export markets at around \$140 million a ton, which is competitive, but the quality is often poor. Indeed, Iraq chose Pakistani wheat of that from India due to the latter's inferior quality.

Similarly, Iran has also slashed its imports of Indian wheat due to presence of a disease called "Kernal Bunt". Sources say Pakistani and Iranian authorities are negotiating to resolve price matters. If Pakistan agrees to drop to \$125 per ton, Iran says it will import 300,000 tons. Pakistani authorities are now weighing up the advantages of selling the wheat at this subsidized price to establish its wheat credentials by entering the Iranian market for the first time.

Pakistani authorities realize that to remain a player on world markets, they will have to maintain a sufficient stockpile to ensure they are around for the long term. Increased wheat production is therefore essential. According to experts, this can be achieved through better farm management. Wheat accounts for 37.1 percent of



the country's total crop area, 65 percent of land used for food grain and 70 percent of the production, mainly grown under irrigated conditions.

The plains, with their favorable topography, rich soil and good agriculture facilities have a much a greater acreage planted to wheat.

## Production and Domestic Demand

The production of wheat and its domestic requirement worked out by the Federal Committee on Agriculture for the year 2004-05 is given as under: -

Consumption requirement for domestic Population	=	18.48 million Tones
AJK	=	0.24 million Tones
Seed, animal consumption etc (8% of production)	=	1.52 million Tones
<b>Total requirements</b>	<b>=</b>	<b>20.24 million Tones</b>
<b>Total Estimated Production</b>	<b>=</b>	<b>19.000 million Tones</b>

Based on average per capita consumption for Punjab and Sindh @ 126 Kg and NWFP & Balochistan 150 Kg

Annual incremental wheat demand of 0.5 million tonnes per annum would require 0.2 million acres additional area each year. According to limitation in horizontal expansion additional area is not available. Therefore, vertical expansion is the only option to meet demand through increase in per unit area production.

### AVENUES FOR VERTICAL EXPANSION IN PAKISTAN

#### (a) Exploitation of Yield Potential Gap

As per FAO Pakistan stands 9<sup>th</sup> position in world regarding wheat production whereas it is on 57<sup>th</sup> position as for as per acre yield is concerned (attached) There are yield gaps at the following levels;

##### i. Genetic

International	National <i>Kgs/hectare</i>
9000	6500
National	Progressive Farmers
6500	4500
Progressive Farmers	Average Farmers
4500	3000

It requires a combined improvement in genetic potential, input output ratio and efficient farm management and agronomic practices to help increase per unit area production

### **(ii) High yield quality Seed**

Use of high yielding wheat varieties recommended for different areas of the province is highly essential to have better per unit area yield.

### **(iii) Water USE efficiency**

Availability of canal irrigation water has decreased up to 51 percent in Rabi 2001-2002. While water is key input for all recommended agronomic practices, therefore, it requires to ensure:

- Efficient use of available water particularly at critical stages of wheat crop
- Reduction in water losses at all levels of irrigation system and all stage of crop irrigation
- Evolution of varieties that can produce more under water stress conditions
- Improvement in water holding capacity of soil by increase in level of organic matter in soil and cultural practices.

### **(iv) Balanced USE of fertilizers**

The use of agriculture inputs is far less than the recommended doses as is clear from following table:

Year	Wheat area ('000' Acers)	Urea		DAP		Ratio	
		Off take	Bag per	Off take	Bag per	Urea	Ratio
1998-99	14665	27160	1.85	5300	0.36	5.14	1.00
1999-02	15272	28020	1.83	9700	0.63	2.90	1.00
2000-01	15458	31940	2.07	10300	0.66	3.14	1.00

For wheat crop recommended dose of DAP for normal average soil is 2 bags whereas average use in Punjab is not more than ½ bag per acre. Less use of phosphorus results in imbalance use of fertilizer and it acts as limiting factor for production. Similarly, in potash and micronutrients soil have also gone deficient but only few farmers use micronutrient fertilizers to have a better input ratio. Whereas need to use balanced fertilizers according to the requirement of crop and condition of soil is very essential.

## INTERACTION BETWEEN DIFFERENT INPUTS AND AGRONOMIC PRACTICES

There are 23 nutrients, which have been identified for crop requirement. All the nutrients, agronomic practices and the inputs have interaction with each other. So the best combination is essential for optimum production.



This is an important aspect, which needs to be given due consideration for education of farmer to have synergism effect to get better per unit area production.

For example, a farmer is applying balanced fertilizers but does not control the weeds properly at required time will not be able to take benefit from balanced use of fertilizers in terms of better out put. Similarly, balanced use of fertilizers and proper weed control may not be much beneficial of these are not coupled with proper plant protection measures. This aspect of interaction between production factors needs to be highlighted and understood by farmers in the right perspective for efficient input use to get optimum production.

## MARKETING OF WHEAT

### Marketable Surplus

It is that part of produce which is left with grower for disposal in market after meeting needs of home and farm consumption (harvesting labour, seed, threshing labour, etc.) the level of farm consumption and house consumption varies with size of farm. According to a survey conducted in Okara, Faisalabad and T.T.Singh by the field teams of the Directorate Of Agriculture (E&M) each farm size category has following proportion of marketable surplus.

<b>Farm Size Category</b>	<b>Marketable Surplus</b>
A. (up to 6.25 Acres)	20 ----- 25%
B. (Above 6.25 to 12.5 Acres)	55 ----- 60%
C. (Above 12.5 to 25 Acres)	65 ----- 70%
D. Above 25 Acres	80 ----- 85%
Average	55 ----- 60%

## Marketing Channels

Following marketing channels prevail for the marketing of wheat:

1. Grower → Govt. Agency → Process

2. Grower → Village Dealer → Comm. Agent

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graph LR; Grower --> VillageDealer[Village Dealer]; VillageDealer --> CommAgent[Comm. Agent]; CommAgent --> Processor; CommAgent --> Consumer;
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3. Grower → Village Dealer → Processor

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graph LR; Grower --> VillageDealer[Village Dealer]; VillageDealer --> Processor; VillageDealer --> Consumer;
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4. Grower → Processor

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graph LR; Grower --> Processor; Grower --> Consumer;
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5. Grower → Comm. Agent

```
graph LR; Grower --> CommAgent[Comm. Agent]; CommAgent --> Processor; CommAgent --> Consumer;
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**Marketing Margin**

"It is the difference between price taken by grower and price paid by last buyer of the commodity". As per survey marketing margins for wheat have been estimated for different marketing channels as follows

**Marketing Channel - 1**

Total marketing margin is 6.25% of final sale price, while grower's share in sale price was 93.75%.

**Marketing Channel - 2**

Period	Total Marketing Margin	Share of Village D in Margin	Share of Comm. Agent in Margin	Grower Share in Sale Price
A.	6.47%	4.975%	1.495%	93.52%
B.	5.76%	4.278%	1.480%	94.23%
C.	5.23%	3.730%	1.500%	94.76%

**Marketing Channel - 3**

Period	Total Marketing Margin	Grower's Share in Sale Price
A.	6.47%	93.52%
B.	5.76%	94.23%
C.	5.23%	94.76%
A	=	just after harvest of wheat
B	=	3 – 4 months after harvest of wheat
C	=	7 – 8 months after harvest of wheat

**CONSTRAINTS/PROBLEMS IN WHEAT MARKETING**

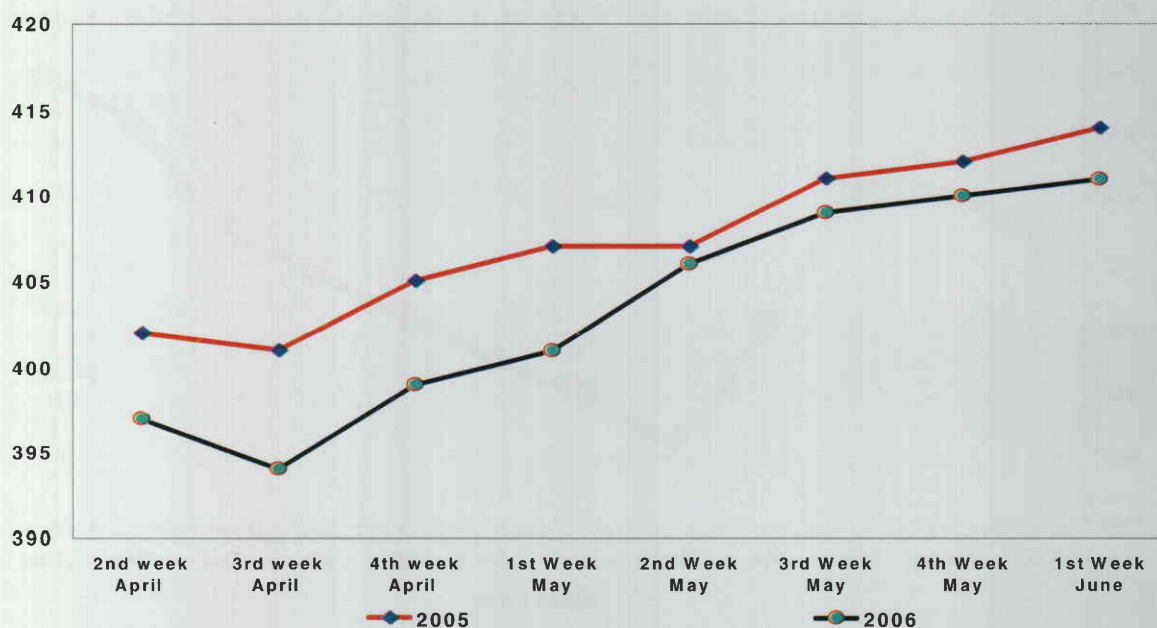
The constraints and problems related with marketing of agricultural surpluses are different for different agro-ecological and socio-economic conditions. For example food grains, fiber crop, oil seeds, export commodities, perishables and non-traditional crops

have different marketing problems over different periods of the year. For marketing of wheat the important and common constraints are listed as under: -

- ❖ In general trading and price policies are not in line with the basic principles of economics.
- ❖ Production of crops is not planned on the basis of scientifically calculated/assessed demand from all stakeholders of different commodities.
- ❖ Agricultural producer, particularly the small farmer is exploited by all malpractices of private trader. Moreover, he is to bear the costs of all the inefficiencies of public sector procurement organizations as well.
- ❖ The farmer especially the small farmer lacks negotiation option for favorable terms of trade because of his little or no retention power for his marketable surpluses.
- ❖ Lack of proper storage facilities cause glut in the market during harvest periods, which bring prices down drastically.
- ❖ Ineffective support price implementation by the agencies concerned.

Generally grower disposes his wheat in market due to discouraging behavior of Govt. agencies i.e. food department and PASSCO.

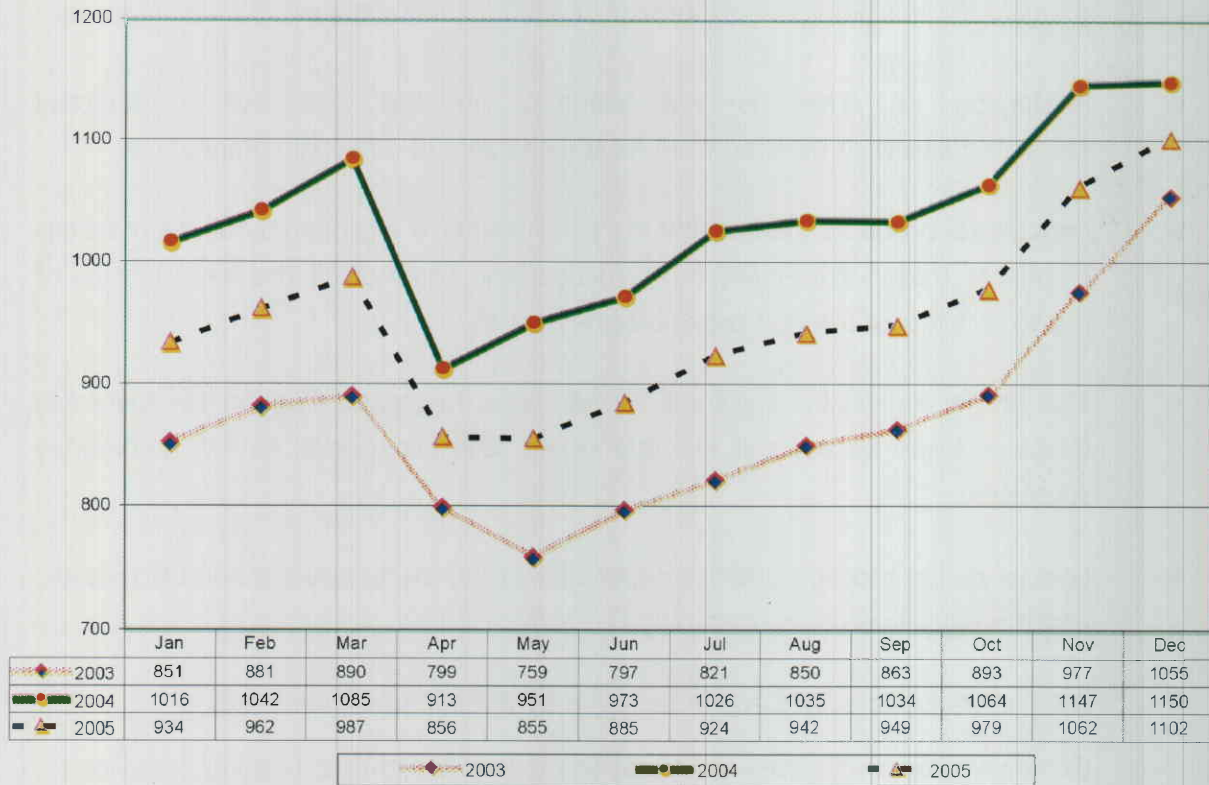
**Wheat Harvest Prices (2005-06)**



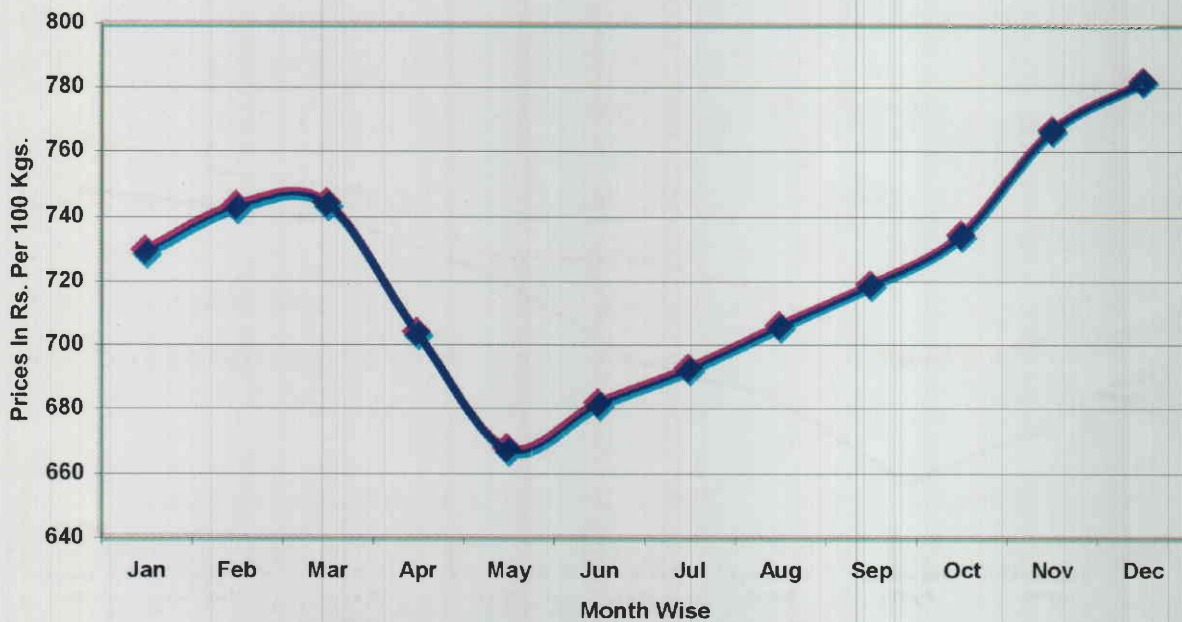


- A) Growers face difficulty in taking "Bardana".
- b) Time/Cost of Patwari to issue Fard to be shown at purchase centers
- c) Illegal kind deduction and malpractices.

**Price Trend Of Wheat Last Three Year**



**Seasonal Price Trend of Wheat**



## **WTO AGREEMENT ON AGRICULTURE**

### **Impact on Wheat Production System**

The issue of agricultural subsidies was analyzed to see where rice-wheat cultivation would stand, if subsidies in production for export of wheat crop in major producing and consuming countries in the world were reduced/eliminated and international trade in wheat was freed of barriers.

Wheat is the major food staples for about 150 million people in Pakistan. The rice-wheat production system of Pakistan is one of the most dominating cropping systems covering an area of 2.1 million hectares. A major portion (57 per cent) falls in the Punjab followed by Sindh. Pakistan imports wheat for foreign exchange earning. Wheat always occupies a central position in agricultural policies. At present, it contributes 13.8 per cent to value added agriculture and 3.2 per cent to GDP. Pakistan harvested a record wheat crop of about 21 million tonnes in 1999-2000, which exceeded domestic requirement and hence was available as exportable surplus. To sustain this position, state policies are required to focus on measures to control/minimize the cost of production to its sustainable level besides maintaining quality to enable crops to survive and compete in the international market under the WTO regime.

It was observed that producers of wheat is dis-protected or implicitly taxed via depressed prices instead of their respective international prices. The rate of dis-protection during 1990-91 to 1999-2000 was 27 per cent for wheat. An important conclusion is that farmers should receive price inline with international prices for their commodities to induce expansion of this crop.

In wheat production the cost of domestic resources was 0.86 dollar to save one dollar in terms of wheat imports, which also implies comparative advantage in wheat production as an import substitute. The result suggests that this commodity is likely to have a great production growth once distortion in output and input markets are removed and domestic prices catch up with international market prices.

Overall, estimates of economic incentives and economic efficiency imply that with true globalization, growers of wheat can gain significantly by increasing production. The policy implications of these results are also very clear: encouraging wheat production in the country will earn foreign exchange.

Analysis of domestic support through Producer Subsidy Equivalents (PSEs) indicates that a wheat crop has been under implicit taxation. The results are quite consistent with our findings of economic incentives and efficiency in Pakistan. Comparing the scenario with selected countries, the Uruguay Round Agreement (URA) suggested that a reduction in domestic support and export subsidies for wheat would see a decline in the artificially inflated production by developed countries.

A decline in the supply of agricultural goods from developed countries and improved market access for developing countries will very likely cause the production of wheat in Pakistan to become more profitable. This scenario leads to conclude that Pakistan would benefit, if world prices rise as a result of reduction of domestic support in other countries. This will not only increase Pakistan's share in World markets but also strengthen its incentive structure at home for increasing production of wheat crops.

Economic efficiency and incentive structures prevailing in the wheat crop production in Pakistan is showing ability to take advantage of market access. It is very likely that reduction of distortions in world markets as a result of the URA may boost production of wheat in Pakistan and farmers are likely to gain significantly. An important prerequisite, however, is that farmers should be given the opportunity to respond to market signals and AOA should be adamant to reduce excessive levels of domestic support and export subsidy in developed countries. This seriously undermines trading prospects for developing countries by dumping cheap food in the world market, thereby artificially reducing world prices. However, the ability of the country to maintain or expand its world market share depends on its ability to meet the demand of the world trading system, not only in terms of competitive prices but also in the quality of exportable products and their safety standards. In order to transform the challenges of globalization into opportunity, Pakistan should adopt sustainable agricultural policies by making judicious use of available resources and following an appropriate combination of government policies and market sources. Increasing productivity and profitability at the farm level for sustaining this vital production system of Pakistan is imperative.

## **MAJOR ISSUES IN WHEAT**

### **Production**

- Shall we be able to sustain self- sufficiency and generate exportable surplus
- Production of export quality wheat
- Production trend of Major producing countries

### **Productivity**

- Research to increase yield potential
- Use of Biotechnology to enhance productivity
- Will the traditional extension structure be able to reduce gap in actual and potential yields?
- Does productivity equates yield per acre?
- Productivity analysis of major inputs e.g. water and fertilizer etc.
- Socio-economic factors in productivity of wheat

### **Marketing**

- Can we afford the privatization of wheat marketing?
- Mechanism of wheat marketing without support prices
- Attracting investment in wheat marketing business
- Private storage in wheat marketing

### **Trade**

- Do we have comparative advantage in wheat production?
- Opportunities to produce wheat for export
- Potential markets for Pakistani Wheat

### **Future Plan**

Commodity working groups have been proposed to be established to look after the major issues of each crop. These groups should work at District, provincial and federal level.

# **Agricultural Marketing Government of the Punjab**

## **INTRODUCTION**

The Agricultural Produce Markets Act, 1939 was promulgated on the recommendation of Royal Commission constituted by the British India Government during 1927. The sole-intention of the act was to regulate the Agri. Business so as to do away the evils and vices which ultimately tended to the deprivation of the grower from his fair return of his produce. The market committees were established under the provisions of above said act which were assigned noble pursuit i.e. Safeguard the interest of grower.

The Act of 1939 was replaced by the Punjab Local Government Act, 1975, but for legal and technical reasons, the provisions of the act could not be enforced. Later, the relevant provisions of the Punjab Local Government Act, 1975 were replaced by the Punjab Agricultural Produce Markets Ordinance (PAPMO), 1978 and rules were framed during 1979.

## **VISION OF AGRICULTURAL MARKETING:**

To increase profitably of the growers through modern marketing infrastructure, competitive marketing environment and entrepreneurial capacity building

## **FUNCTION:**

- Managing 325 Agricultural Markets in Punjab including Grain, Fruit & Vegetable and Feeder Markets
- Supervision of 133 Market Committees in Punjab
- Establishment of New Markets
- Collection and dissemination of marketing information
- Release of Daily Price Bulletin through Electronic & other Media
- Economics of Crop and Price analysis report on various Crops
- Survey and studies
- Monthly Price and Corps situation report on various Crops
- Supervision of Sunday/Friday Bazaars
- Supervision of Ramzan/Sasta Bazaars

## **MARKET COMMITTEES IN PUNJAB**

Market committees is a corporate body established under section 7 of the PAPMO, 1978, Exercising control on sale/purchase of Agricultural produce in its area notified under section 4 of the said Ordinance

## **DUTIES OF MARKET COMMITTEES**

To enforce the Provisions of Ordinance and Rules

To Establish Agricultural Produce Markets

Collection and dissemination of prices of agricultural produce

Coordination with District Administration for organizing Sunday/Friday Bazaars/Ramzan/Sasta

## **INITIATIVES FOR IMPROVEMENT OF AGRICULTURAL MARKETING**

A separate ministry of agricultural marketing has been created

A CORPORATE BODY "Punjab AgriMarketing Company" (PAMCO) has been established for improvement of agricultural marketing with private sector

Participation

Agricultural Marketing Information System (MIS) has been established, Website [www.punjabagmarket.info](http://www.punjabagmarket.info) has been launched

Toll free No.0800-51111 has been installed

Establishing the markets under private sector allowed for healthy competition with public sector

Existing Agricultural Produce Markets Laws are being revamped

A Task Force has been constituted to guide formulation of policies for improvement of Agricultural Marketing

Creating awareness and compliance of WTO agreement

Infrastructure in existing 30 markets in being upgraded

Cold chain is being established to maintain quality of exportable perishable commodities in producing area under PAMCO

Training programme for growers, commission agents and other dealing in agricultural produce especially fruit & Vegetable being arranged

Importers and potential investors from other countries are being encouraged to boost export and enhance investment

Workshops, seminars, conferences to create awareness about the Agricultural Marketing System

Agreement/protocols and MOUs on Phytosanitary Requirements for Export of Rice, Citrus and Mango have been signed between MINFAL and AQSISQ.