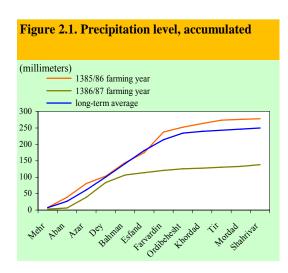


ue to a severe drought and the frostbite affecting agricultural products in the 1386/87 farming year, the production of farming and horticultural crops experienced a sharp decline. This in turn led to a dramatic fall in the value-added of the agriculture sector, despite a rise in the production of livestock and fishery products.

Based on preliminary estimates, the valueadded of the agriculture sector decreased by 11.8 percent in 1387 at constant (1376) prices, compared with the previous year, indicating a sharp decline when compared with the value-added growth of the year before (6.4 percent). Fall in the value-added of this sector is one of the main factors behind the decline in the GDP in 1387.

According to the Ministry of Energy, in 1386/87 farming year<sup>1</sup>, average precipitation amounted to 228 billion cubic meters (138.3 millimeters by area under cultivation), showing 50.3 percent fall compared with the previous farming year and 44.6 percent reduction compared with the long-term average (39 years). In this year, average precipitation level was the lowest in the past 40 years. Furthermore, the volume of surface water flows reached 41.6 billion cubic meters, indicating a reduction of 50 percent compared with the previous year and 55.6 percent compared with the long-term average.



#### **Production**

### **Farming and Horticultural Crops**

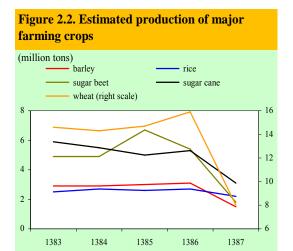
Based on the data released by the Ministry of Agriculture Jihad, in 1386/87 farming year, about 67.7 million tons of farming and horticultural crops were harvested, showing 24.5 percent decline compared with the previous year. Of total crops, 54.4 million tons (80.3 percent) were farming and 13.4 million tons horticultural crops, down by 26.1 and 17.1 percent, respectively. Fall in precipitation and the ensuing drought were the main driving forces behind the decrease in the production of agricultural products, especially rainfed crops such as wheat. Of other factors responsible for the decline in the agricultural output are the unfavorable climatic conditions in the winter of 1386/87 farming year and the frostbite

<sup>&</sup>lt;sup>1</sup>Second half of 1386 and first half of 1387

# Chapter 2 AGRICULTURE

that affected agricultural products, particularly horticultural crops.

Grain production (wheat, barley, rice (paddy), and corn) reached 13.5 million tons, down by 43.9 percent. Among cereals, production of wheat decreased by 49.9 percent to 8 million tons, and that of barley, corn, and rice fell by 50.1, 24.7, and 18.0 percent, respectively.



Total production of agro-industrial crops in this year fell by 50.7 percent to 5.8 million tons. This was mainly attributable to a sizeable reduction in the production of sugar beet for the second consecutive year.

#### **Yield of Major Farming and Horticultural Crops by the Area under Cultivation**<sup>1</sup> (kilogram/hectare)

		(	gruin/neeture)
	1386	1387	Percentage change
Wheat	2,200	1,515	-31.1
Barley	1,891	1,446	-23.5
Rice (paddy)	4,326	4,145	-4.2
Corn	7,691	7,323	-4.8
Cotton	2,513	2,376	-5.5
Sugar beet	33,840	33,907	0.2
Sugar cane	86,875	50,317	-42.1
Oilseeds	1,931	1,900	-1.6
Tobacco	1,383	1,543	11.6
Pulses	743	557	-25.1
Potatoes	27,014	26,519	-1.8
Onions	34,273	36,935	7.8
Pistachio	784	446	-43.0

Source: Ministry of Agriculture Jihad

<sup>1</sup> Calculated based on the ratio of production to the area under cultivation.

#### Production and Area under Cultivation of Major Farming and Horticultural Crops (thousand bectares thousand tone)

		and Hortici	iltural Cro	ops (th	(thousand hectares-thousand tons)			
	1:	386	13	87	Percentage change			
	Area	Production	Area	Production	Area	Production		
Wheat	7,222	15,887	5,250	7,957	-27.3	-49.9		
Barley	1,642	3,104	1,070	1,547	-34.8	-50.1		
Rice (paddy)	616	2,664	527	2,184	-14.4	-18.0		
Corn	307	2,361	243	1,777	-20.9	-24.7		
Cotton	125	313	124	296	-0.1	-5.5		
Sugar beet	160	5,407	54	1,829	-66.2	-66.2		
Sugar cane	61	5,315	62	3,097	0.6	-41.7		
Oilseeds	325	629	275	522	-15.6	-17.0		
Tobacco	8	12	11	17	28.6	43.5		
Pulses	957	711	697	388	-27.1	-45.4		
Potatoes	149	4,026	177	4,707	19.1	16.9		
Onions	59	2,014	50	1,849	-14.8	-8.2		
Pistachio	357	280	431	192	20.6	-31.3		

Source: Ministry of Agriculture Jihad

# **Livestock and Fishery Products**

According to the Ministry of Agriculture Jihad, total livestock products (red meat, poultry, milk, eggs, and honey) amounted to 11,975 thousand tons in 1387, up by 5.6 percent. All the mentioned products (except honey) registered growth, with poultry enjoying the highest growth of 6.6 percent. Growth in the production of red meat was merely 0.5 percent.

#### **Livestock Products**

		(th	ousand tons)
	1386	1387	Percentage change
Red meat	866	870	0.5
Milk	8,251	8,772	6.3
Poultry	1,468	1,565	6.6
Eggs	703	727	3.4
Honey	47	41	-13.4
Total	11,335	11,975	5.6

Source: Ministry of Agriculture Jihad

Fishery products totaled 562.6 thousand tons, remaining relatively unchanged compared with the previous year. Of the mentioned amount, 60.8 percent were produced from the Persian Gulf, 32.6 percent from aquaculture centers, and the remaining from the Caspian Sea. It should be noted that, in the review year, the share of fishery products from the Caspian Sea and aquaculture centers decreased and that of the Persian Gulf increased. The amount and value of fishery exports were 24.4 thousand tons and \$60.1 million, down by 27 and 0.8 percent compared with the previous year, respectively. Fall in the exports of caviar and shrimp was the main factor behind the fall in the value of fishery exports in the review year.

# Guaranteed Purchase of Agricultural Products

The guaranteed purchase of agricultural products with the aim of producing basic

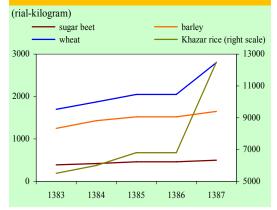
agricultural products, establishing a balanced production system, and maintaining farmers' income level continued in 1387. In line with the expected sharp fall in the agricultural output in 1386/87 farming year and the unprecedented surge in international prices, the guaranteed purchase price of most agricultural products rose remarkably in this year. Accordingly, the guaranteed purchase price of strategic crops such as wheat, various types of rice, corn, soybean, green leaflet tea, and potato increased noticeably. In this year, increase in the guaranteed purchase price of most agricultural products (except for pulses) was well above the inflation rate. The guaranteed purchase price of various types of rice increased within a range of 53.1 to 89.7 percent.

# Production & Export of Fisheries

	(thousand tons-million dollars)						
	1386	1387	Percentage change				
Production	562.4	562.6	*				
Persian Gulf	329.6	342.0	3.8				
Caspian Sea	39.2	37.0	-5.6				
Aquaculture centers	193.7	183.6	-5.2				
Export							
Value	60.6	60.1	-0.8				
Amount	33.4	24.4	-27.0				

Source: Ministry of Agriculture Jihad, Iran Fisheries Organization

# Figure 2.3. Guaranteed purchase price of major agricultural products



1386	, 1387	Percentage change
2,050	2,800	36.6
1,520	1,650	8.6
6,800	12,500	83.8
460	500	8.7
	2,050 1,520 6,800	2,050 2,800   1,520 1,650   6,800 12,500

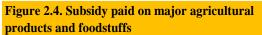
#### Guaranteed Purchase Price of Agricultural Products

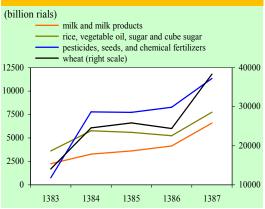
Source: Cabinet approvals

#### **Subsidies**

Based on the data released by the Ministry of Economic Affairs and Finance and Consumers and Producers Protection Organization, subsidy paid on major agricultural crops amounted to Rls. 69.2 trillion, showing a rise of 63.9 percent compared with the previous year. This was attributable to the increase in government payments out of the OSF in the framework of "Supplement to the Budget Law for 1387" on financing the imports of essential goods and compensating the loss incurred from drought and frostbite. This caused the share of the mentioned subsidy in total subsidy paid by the government to rise from 77.2 percent in 1386 to 81 percent in this year.

In the review year, the subsidy paid on wheat increased notably by 57.2 percent to Rls. 38.4 trillion, accounting for 44.9 percent (the highest share) of total paid subsidy as in previous years. Moreover, about Rls. 3,515 billion was paid out of Budget Supplement on forage, veterinary, and supplements and vitamins, accounting for 4.1 percent of total subsidy paid by the government. Total subsidy paid on agricultural inputs out of the Supplement to the Budget Law for 1387 was Rls. 8.0 trillion.





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P	(t	(billion rials)			
			Percentage	Share (	percent)
	1386	1387	6		1387
Basic goods	33,804.2	52,704.9	55.9	61.8	61.7
Wheat and flour	24,415.0	38,368.3	57.2	44.6	44.9
Rice, vegetable oil, sugar and cube sugar	5,235.4	7,747.0	48.0	9.6	9.1
Milk and milk products	4,153.8	6,589.6	58.6	7.6	7.7
Agricultural inputs	8,420.6	16,505.0	96.0	15.4	19.3
Pesticides, seeds, and chemical fertilizers	8,289.6	11,362.0	37.1	15.2	13.3
Veterinary drugs and vaccines	131.0	0.0	-100.0	0.2	0.0
Other <sup>1</sup>		5,143.0	θ		6.0
Total subsidy paid on agricultural products	42,224.8	69,209.9	63.9	77.2	81.0
Total subsidy paid	54,683.7	85,433.7	56.2	100.0	100.0

#### Subsidy Paid on Major Agricultural Products and Foodstuffs

Source: Ministry of Economic Affairs and Finance, and Consumers and Producers Protection Organization

<sup>1</sup>Includes subsidy paid to the Ministry of Agriculture Jihad (out of Supplement to the Budget Law for 1387) on forage, veterinary, livestock supplements, etc.

# Box 1- Supplement to the Budget Law for 1387 for Financing the Imports of Essential Goods and Compensating the Loss Incurred from Drought and Frostbite

According to the Single Article of the Budget Law for 1387, the government, in addition to the figures stipulated in the Budget, was authorized to withdraw Rls. 45 trillion from the OSF. This sum should be disbursed in the following ways:

1. Rls. 20 trillion for the purchase and import of essential goods based on the Cabinet approval.

2. Rls. 25 trillion for the support of producers and consumers in the agriculture sector against damages resulted from drought and frostbite in all provinces to be allocated as follows:

a. Rls. 8 trillion to subsidize agricultural inputs (horticulture, farming, livestock, and poultry);

b. Rls. 6 trillion to finance the payment of profit and commission on facilities extended

to loss-incurring farmers for a one-year rescheduling of matured debts;

c. Rls. 2 trillion for compensation of lossincurring farmers without an insurance coverage;

d. Rls. 2 trillion for the increase of credits in the Insurance Fund for Agricultural Products;

e. Rls. 3 trillion for the financing of credits for technical and credit assistance to reforming irrigation methods and development of pressure irrigation;

f. Rls. 4 trillion for the financing of credits for the supply of potable water to urban and rural areas.

According to the Treasury General of the Ministry of Economic Affairs and Finance, of total amount paid by the government to the agriculture sector based on the Budget Supplement, Rls. 8 trillion was paid as current expenditures, Rls. 7 trillion as development expenditures, Rls. 8 trillion as subsidy on inputs to the Ministry of Agriculture Jihad, and Rls. 2 trillion to the Insurance Fund for Agricultural Products.

#### **Government Investment**

Based on the data released by the Treasury General of the Ministry of Economic Affairs and Finance, in 1387, government credits for the acquisition of non-financial–national assets for the development of agriculture and water and natural resources, including research on agriculture and natural resources, amounted to Rls. 26.3 trillion, up by 48.7 percent compared with the previous year. Therefore, of total Rls. 31.3 trillion credits for the acquisition of non-financial assets approved in the Budget Law, about 83.8 percent was realized, indicating an increase compared with the realized figure (77.3 percent) of previous year.

Credits paid for the acquisition of nonfinancial assets projects for the development of agriculture and natural resources increased by 30.2 percent to Rls. 4.4 trillion. "Improvement of agricultural lands" had the lion's share of credits allocated to the agriculture and natural resources sector by 34.1 percent.

National expenditures for the acquisition of non-financial assets projects for the "provision of water resources and establishments" amounted to Rls. 21.9 trillion, showing an increase of 53.1 percent compared with the year before, and much higher growth and realization compared with agriculture and natural resources sector. As in previous years, "supply and provision of water" project including dam construction, irrigation and drainage networks, and supplying water to cities and industries enjoyed the greatest share of expenditures by 76.3 percent.

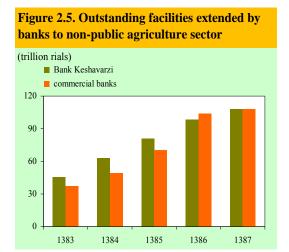
Of special note is that in 1387, besides approved development expenditures and current expenditures which were paid according to the Budget Law for 1387, Rls. 2,500 billion was allocated to provision of water and forage to drought-stricken provinces. This was according to the Cabinet approval and out of Article 10, Government Fiscal Regulations Act, aimed at compensating part of losses incurred from the unprecedented drought in the agriculture sector.

#### **Banking Facilities**

In 1387, outstanding facilities extended by banks and credit institutions to public and non-public agriculture sectors grew by 5.7 percent to Rls. 220.5 trillion. The share of non-public sector in these facilities was 98.4 percent (Rls. 217.1 trillion).

By the end of 1387, outstanding facilities extended by commercial banks to the agriculture sector amounted to Rls. 110.4 trillion, indicating a rise of 1.9 percent compared with the preceding year. Meanwhile, outstanding facilities extended by Bank Keshavarzi to public and non-public agriculture sectors increased by 9.1 percent and amounted to Rls. 109.2 trillion.

The share of commercial banks in total outstanding facilities extended to the public and non-public agriculture sector decreased from 51.9 percent in 1386 to 50.1 percent in 1387. However, the share of outstanding facilities extended by Bank Keshavarzi in total extended facilities increased. In this year, the outstanding facilities extended by private banks and credit institutions to the agriculture sector reached Rls. 951.7 billion, showing a significant rise of almost 5 times compared with last year.



Credits for Acquisition of Non-financial–National Assets for Development of Agriculture and Natural and Water Resources (billion rials)

						(onnon mais)		
				Share (percent)		1.	387	
			Percentage			Value	Realization	
	1386	1387	change	1386	1387	(approved)	(percent)	
Agriculture and natural resources	3,356.0	4,368.7	30.2	19.0	16.6	5,526.3	79.1	
Water resources	14,310.0	21,908.0	53.1	81.0	83.4	25,813.0	84.9	
Total	17,666.0	26,276.7	48.7	100.0	100.0	31,339.3	83.8	

Source: Ministry of Economic Affairs and Finance, and Budget Law for 1387

to Public and Non-public Agriculture Sector <sup>1</sup> (billion										
	Ye	Year-end		Share	(percent)					
	1386	1387	change	1386	1387					
Non-public sector	202,033.4	217,073.8	7.4	96.9	98.4					
Commercial banks	103,675.0	108,162.7	4.3	49.7	49.0					
Bank Keshavarzi	98,193.9	107,959.4	9.9	47.1	49.0					
Private banks and credit institutions	164.5	951.7	478.5	0.1	0.4					
Public sector	6,517.6	3,463.8	-46.9	3.1	1.6					
Commercial banks	4,655.4	2,224.7	-52.2	2.2	1.0					
Bank Keshavarzi	1,862.2	1,239.1	-33.5	0.9	0.6					
Total	208,551.0	220,537.6	5.7	100.0	100.0					

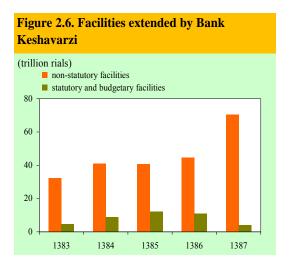
# Outstanding Facilities Extended by Banks and Credit Institutions

<sup>1</sup>Excludes profit and revenue receivables.

In the review year, Bank Keshavarzi paid Rls. 74.5 trillion to farmers through nonstatutory and statutory facilities, administered funds, and contracts, up by 34.4 percent compared with the year before. Of total credits paid by this bank, 94.7 percent (Rls. 70.5 trillion) were from non-statutory resources and the remainder (5.3 percent) in the form of statutory facilities, administered funds, and contracts. The corresponding figures of previous year were 80.3 and 19.7 percent, respectively.

Composition of facilities extended by Bank Keshavarzi according to Islamic contracts reveals that installment sale had the highest share of 61.3 percent (Rls. 45.6 trillion), indicating a growth of 72.3 percent compared with last year's performance.

Composition of facilities extended by Bank Keshavarzi by use indicates that the highest share of facilities by 39.8 percent was allocated to farming and horticulture, which increased by 18.3 percent to Rls. 29.6 trillion compared with the previous year. In this year, facilities extended to animal husbandry rose by 50.9 percent compared with the year before.



#### Facilities Extended by Bank Keshavarzi by Term of Repayment

				Share (percent)		
	1386	1387	change	1386	1387	
Short-term	26,331.2	11,129.4	-57.7	47.5	14.9	
Medium-term	20,906.7	21,127.7	1.1	37.7	28.4	
Long-term	8,175.6	42,236.4	416.6	14.8	56.7	
Total	55,413.5	74,493.5	34.4	100.0	100.0	

Source: Bank Keshavarzi

(billion rials)

# **Insurance Fund for Agricultural Products**

According to the report released by the Insurance Fund for Agricultural Products, in 1386/87 farming year, this Fund insured 3.5 million hectares of lands under cultivation of 50 farming and horticultural crops against losses from natural disasters. This shows 34.3 percent decrease compared with the previous year. Of total insured lands, 2.6 million hectares were damaged for which Rls. 3,260 billion was paid by the Fund as compensation, up by 90.5 percent compared with the preceding year.

# Performance of Rural, Women, and Agricultural Cooperatives and Unions

According to the Central Organization for Rural Cooperatives, 5,311 rural, women, and agricultural cooperatives were active, covering 5.6 million rural dwellers. This shows a minor increase in terms of the number, and 0.8 percent fall in terms of the members of cooperatives.

In 1387, the cooperative unions increased by 2.5 percent to 374 and the number of

member companies reached 4,006, down by 0.1 percent.

Rural, Women, and Agricu	ltural
Cooperatives and Unior	15

	1386	1387	Percentage change
Rural, women, and agricultural cooperatives			
Number	5,309	5,311	*
Members (thousand persons)	5,648	5,605	-0.8
Capital (billion rials)	1,133.0	1,800.0	58.8
Paid loan (billion rials)	236.1	77.9	-67.0
<b>Cooperative unions</b>			
Number	365	374	2.5
Member companies	4,011	4,006	-0.1
Capital (billion rials)	298.1	349.0	17.0
Paid loan (billion rials)	158.4	32.1	-79.7

Source: Central Organization for Rural Cooperatives

In this year, rural cooperatives purchased 1,358.9 thousand tons of various agricultural products, valued at Rls. 2,669.9 billion at guaranteed prices, down by 52.1 percent in terms of amount and up by 72.9 percent in terms of value.

	Area insurea (thousand	d land	Percentage change	Share (percent)	Are damage (thousand	ed land	Percentage change	Share (percent)	Comper (billion		Percentage change	Share (percent)
	1385/86	1386/87			1385/86	1386/87			1385/86	1386/87		
Wheat	3,770	1,919	-49.1	54.0	975	1,505	54.5	58.4	445	1,200	169.9	36.8
Rice	177	192	8.2	5.4	43	54	25.4	2.1	78	124	59.5	3.8
Barley	415	383	-7.8	10.8	133	311	133.9	12.1	56	218	289.0	6.7
Sugar beet	103	32	-68.7	0.9	9	4	-51.1	0.2	21	8	-62.4	0.2
Colza	197	97	-50.4	2.7	68	51	-24.7	2.0	47	49	3.2	1.5
Pistachio	77	54	-30.0	1.5	67	49	-26.5	1.9	142	292	105.6	8.9
Others	663	874	31.8	24.6	291	601	106.5	23.3	923	1,369	48.4	42.0
Total	5,402	3,550	-34.3	100.0	1,585	2,576	62.5	100.0	1,711	3,260	90.5	100.0

**Insured Farmlands and Amount of Compensation** 

Source: Insurance Fund for Agricultural Products

# **Export of Agricultural Products**

Based on the data released by Islamic Republic of Iran Customs Administration, 3,361.3 thousand tons of various agricultural products, worth \$3,518.2 million, were exported in the review year, indicating 21.2 and 3.9 percent decrease in terms of weight and value, respectively, compared with the previous year. Export of agricultural products accounted for 10.1 percent of weight and 19.2 percent of value of total non-oil exports, showing a fall in the share of agricultural and agricultural processing industries products when compared with the corresponding figures of the previous year (13.3 percent of weight and 23.9 percent of value, respectively).

Among various agricultural products, export of dried fruits, with 36.7 and 39.7 percent fall in value and weight, respectively, faced the highest decline compared with the previous year. Meanwhile, the share of the value of dried fruits in total exports decreased from 43 percent in 1386 to 28.3 percent in 1387, mainly attributable to the reduction in the weight and value of pistachio, raisin, and almond.

## **Import of Agricultural Products**

Based on the Customs' data, 18.1 million tons of various agricultural products, valued at \$9.1 billion, were imported, indicating 66.2 and 69.1 percent rise in terms of weight and value, respectively. This was due to shortages in the supply of agricultural products and the rise in excess demand, especially cereals (mainly wheat), in the country, and increase in the international price of cereals. Imports of agricultural products accounted for 16.3 percent of value and 41 percent of weight of total imported products, showing an increase when compared with the corresponding figures of the previous year. In the review year, the unit value of imported agricultural products was \$505.1 per ton, up by 1.8 percent compared with \$496.4 of the year before.

Imports of wheat increased substantially to 5.9 million tons in 1387. Among essential goods, wheat had the highest share of imports by 32.7 percent. Moreover, the share of corn was 18.8 percent and that of sugar and cube sugar 5.5 percent in total imports.

	Export o	i Agricultu	ral Products	s (millio	n dollars-tho	usand tons)
	13	1386 138		37	Percentage change	
	Value	Weight	Value	Weight	Value	Weight
Dried fruits	1,574.2	512.6	996.5	309.3	-36.7	-39.7
Vegetable products	838.6	2,455.6	1,032.0	2,004.1	23.1	-18.4
Livestock products	484.5	231.3	651.1	263.8	34.4	14.1
Sea products	57.7	30.8	59.7	24.1	3.4	-21.7
Agricultural processing industries products	705.8	1,033.4	779.0	759.9	10.4	-26.5
Export of agricultural products	3,660.9	4,263.7	3,518.2	3,361.3	-3.9	-21.2
Share of agricultural products in total non-oil exports	23.9	13.3	19.2	10.1	-19.7	-23.8

Export of Agricultural Products (million dollars-thousand tons)

Source: Foreign Trade Statistics released by Islamic Republic of Iran Customs Administration

# Chapter 2 AGRICULTURE

	Ітрог	rt of Agricult	ets (millio	(million dollars-thousand tons)			
		1386		1387		Percentage change	
	Value	Weight	Value	Weight	Value	Weight	
Wheat	34.1	189.3	2,084.1	5,919.5			
Barley	69.5	199.9	448.5	1,334.6			
Rice	429.2	1,067.2	794.5	1,389.1	85.1	30.2	
corn	655.6	2,683.4	1,086.5	3,397.2	65.7	26.6	
Tea	113.0	49.6	114.3	47.7	1.1	-3.8	
Sugar and cube sugar	428.9	1,236.2	287.8	998.7	-32.9	-19.2	
Red meat	183.3	65.3	283.7	73.4	54.8	12.5	
Fish	23.1	24.8	18.4	18.3	-20.4	-26.3	
Poultry	54.9	32.7	38.8	19.8	-29.4	-39.4	
Other	3,418.6	5,349.3	3,905.3	4,685.9	14.2	-12.4	
Import of agricultural products	5,410.1	10,897.7	9,146.5	18,106.9	69.1	66.2	
Share of agricultural products in total imports	11.2	26.1	16.3	41.0	46.1	56.9	

Source: Foreign Trade Statistics released by Islamic Republic of Iran Customs Administration

The trade balance of the agriculture sector ran a deficit of \$1.7 billion in 1386. This trend worsened in 1387 and reached \$5.6 billion. Growth in imports of agricultural products which was in turn due to the drought was the main factor behind the rise in the deficit of trade balance in this sector. Developments in the volume and value of exports and imports caused the terms of trade of the agriculture sector to reach 2.1 in 1387 from 1.7 in 1386.

#### Terms of Trade for Agriculture Sector (dollar/ton)

	1386	1387	Percentage change
Unit value of exports	858.6	1,046.7	21.9
Unit value of imports	496.4	505.1	1.8
Terms of trade <sup>1</sup>	1.7	2.1	0.4

<sup>1</sup> In percentage points

# **Trade Balance of Agricultural Products**

		(million dollars)		
			Percentage	
	1386	1387	change	
Exports	3,660.9	3,518.7	-3.9	
Imports	5,410.1	9,146.5	69.1	
Trade balance	-1,749.2	-5,627.8	221.7	