

CHAPTER II

MARKETING OF VEGETABLES

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2.1 Introduction:

The word Marketing has much wider meaning than it is popularly known to us. It represents not only the sale of produce in the mandi but also includes all the stages and process it in fact marketing represents the whole pipe line through which a primary agriculture produce passes to reach consumers store room in a consumable form. Marketing process therefore starts in the field where commodities of better quality may be produced in order to fetch better price. It includes various services such as transport grading storage warehousing processing and packing¹.

2.2 Types of market:

Types of market are classified on the basis of various points of view like the nature of commodity time and nature of business, importance of the products etc. The fundamentals are same only pattern is changing.

Types of market²:

A. On area basis

1. Family 2. Local 3. National 4. World

B. On goods basis:

a. Commodity 1. Produce 2. Manufactured 3. Bullion

b. Capital 1. Money 2. Foreign 3. Stock

C. On economic basis 1. perfect 2. Imperfect

D. On transaction 1. spot 2. future

On regulation 1. Regulated 2 upregulated

On time basis 1. very short 2. short regulated

- F. On time basis 1. very short 2, short 3. long
- g. On volume 1. wholesale 2. retail
- h. on important 1. primary 2 secondary 3 terminal

A. On area basis:

- 1. **Local market:** When commodity is sold within a small or local area only it is called local market.
- 3. **National market:** If buyers and sellers for a commodity do not extend beyond the boundaries of a nation it is called national market.
- 4. **World market:** If buyers and sellers for a commodity are not restricted the whole world is called world market.

B. On goods basis market:

On good commodity basis

- 1. **Produce exchange market:** Buy and sell organized market for raw produce such as wheat, jute, sugar etc. are known as exchange market.
- 2. **Manufactured goods market:** These are market of manufactured goods and semi manufactured goods eg. Leather goods machinery etc.
- 3. **Bullion market:** This type of market refers to purchase or sale of gold silver and precious stone i.e bulletin market Mumbai.

B. Capital market:

1. **Money market:** It is a broad term that indicates number of agencies and helps people to take loan through banks i.e London money market.
2. **Foreign exchange market:** It is an international market where buying and selling of foreign currencies takes place. It helps exporters and importers to the conversion of currencies.
3. **The stock exchange market:** This is the market for investment in this market shares, debentures, bonds etc. are dealt with purchased or sold.

C. On economic basis:

1. **Perfect market:** These types of markets are rarely found there are conditions to be fulfilled for perfect market like.
 1. Easy communication and effective transport
 2. Wide extent
2. **Imperfect market:** When there products are similar, lack of communications and restrictions on the movement of goods is called as imperfect market.

D. On transaction basis

1. **Spot market:** In such types of markets goods are brought and sold immediately.

2. **Future market:** In this types of markets where actual purchasing and selling take place on different dates contracts are made for future delivery.

E. On regulation basis:

1. **Regulated market:** When market may be owned and coltrolled by statutory measures e.g. stock exchange of Mumbai Chennai etc called regulated market.

2. **Unregulated market:** In this market there is on control with regard to price, quantity, commission etc. this is free market.

F. On time basis:

1. **Very short period market:** These types of market considers highly perishable goods like fruit and vegetables which perish in very short period.

2. **Short period market:** There demand is greater than supply is adjusted to meet the demand.

3. **Long period market:** This type of market deals in durable goods.

g. On volume basis:

1. **Wholesale market:** In this market product is handed in large quantities there are usually owned by private persons or local bodies.

2. **Retail market:** In this market goods are sold directly to the users or consumers only of consumption.

2.3 Emergence of marketing Regulation in India:

Marketing legislation for regulating marketing of farm produce is traced in 1886 when Hyderabad residency ordered laid to the first regulated market in India. Bear passed 'the cotton and Grian Market Law in 1897. The India Central Committee obtained by Government of India in 1989 recommended the regulation of cotton market on the lines of Bear Act. The "The Bombay Cotton Market Act in 1929. The first regulated market was established under this act in Dhutia in West Khandesh in 1930³.

The Royal commission on agriculture set up in 1926 by the British Govt. suggested for establishing of regulated markets on the Bear pattern. Market legislation was enacted by Bombay (1927, 1939), Hyderabad (1930), Central provience (1932, 1939), Madras (1933), Baroda (1934), Punjab (1941) and Patiala (1947). Reorganization of States (1956) resulted in the transfer regulated markets operating under respective State acts⁴. Now all the State /Union territories except Jammu and Kashmir, Mizoram, Sikkim, Andaman and Nicobar Island , Daman and Diu and Lakshdweep have implemented MPM (R) acts in their respective States.

Regulation of the markets for agriculture products has been stressed by various committees and commissions viz. The Banking enquiry committee (1931), The Bombay Agrarian Reforms Committee (1947). The Rural marketing committee Indian National Congress (1948). The planning Commission (1952), the All India Credit Committee (1954) and The

agricultural production Team sponsored by the Ford Foundation (1959). Various review committees on the working on the agricultural products market acts have recommended to bring all agricultural including horticulture, forest and live stock under the scope of agricultural produce market acts.

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Growth of regulated markets in India:

The following table reveals the tremendous growth of regulated markets in India

Table No. 2.2.1
Growth of regulated markets in India

Year	Regulated markets	%
1940-41	122	--
1950 - 51	286	234.00
1955 - 56	450	157.34
1960 - 61	700	155.55
1965 - 65	1012	144.57
1970 - 71	2803	276.97
1975 - 76	2938	104.81
1980 - 81	3819	129.98
1990 - 91	6217	162.79
2000 - 01	7177	115.44
2003-04	7418	103.35

* Source: Karnataka State Agriculture Marketing Board, Bangalore.

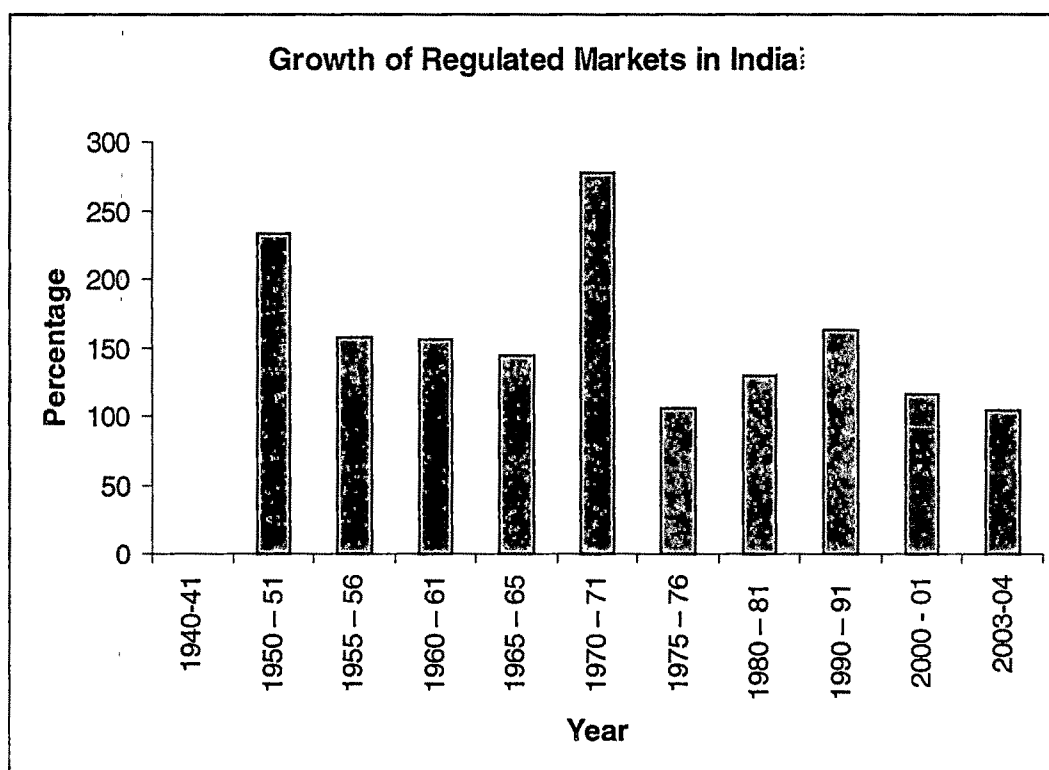


Fig. No.2.2.1

The above table and figure reveals that since the commencement of five year plans in 1950 – 51 the number of regulated markets raise from 286 in 1950 – 51 to 6640 in 2001 an increase of 2509.44% over the decades.

The State wise number of agricultural produces market in India as on 31.03.1991 is indicated in the following table.

Table No. 2.2.2
State wise agriculture product markets in India

Sr. No.	State/Union territories	Regulated market		
		Main	Sub	Total
1.	Andhra Pradesh	232	585	817
2.	Arunachal Pradesh	--	--	--
3.	Assam	16	19	35
4.	Bihar	122	706	828
5.	Goa	01	04	05
6.	Gujrat	148	207	355
7.	Haryana	97	165	262
8.	Himachal Pradesh	10	42	52
9.	Jammu and Kashmir	APMR Acts not yet passed		
10	Karanataka	116	295	411
11	Kerala	05	--	05
12	Madhya Pradesh	279	278	557
13	Maharashtra	245	535	780
14	Manipur	--	--	--
15	Meghalaya	APMR Acts not yet passed		
16	Mizoram	--	--	--
17	Nagaland	43	87	130
18	Orissa	143	519	662
19	Punjab	139	244	383
20	Rajasthan	139	244	383
21	Sikkim	APMR Acts not yet passed		
22	Tamil Nadu	270	--	270
23	Tripura	21	--	21
24	Uttar Pradesh	262	383	645
25	West Bengal	39	364	403
26	Andaman Nicobar	APMR Acts not yet passed		
27	Chandigarh	01	02	03
28	Dadra and NAgar Haveli	APMR Acts not yet passed		
29	Daman & Diu	--	--	--
30	Delhi	06	07	13
31	Lakshdweep	APMR Acts not yet passed		
32	Pondecherry	03	--	03
	Overall	2198	4442	6644

Source: Collected from Karnataka State agricultural marketing board Bangalore January 1997.

Notes: The latest data of agricultural markets is not available.

- APMR act was passed but there is no market even today.

The above provides details of the state wise distribution of regulated markets in India s on 31-03-1999. It is clear that Bihar tops the list in terms of the number of regulated markets (828) followed by Andhra Pradesh and Maharashtra. A substantial number of regulated markets are found in Madhya Pradesh, Tamilnadu, Uttar Pradesh, Punjab and Karnataka.

2.3 Importance of marketing:

Marketing is recognized as the most significant activity in our very existence. Our entire economic life our, life style are continuously alone can put goods and services we want and need at our doorsteps and satisfy our varied and innumerable needs and wants.

Marketing is a part of the productive process and marketing costs part of the overall costs of production. The producer, the broker and the consumer look upon the marketing process from this own individual point of view. The producer is concerned with selling his products at such remunerative prices. It would enable him to continue to produce to stay in his business. He must take into consideration the total profit which he is able to make on his business as whole. The various types of intermediary agencies such as the whole seller and commission agents are mainly concerned with avoidance of losses on account of adverse price changes and the prevention of deterioration of goods lying in their possession. The final link in the process of marketing is the consular in the process at marketing from the point of view of goods and the price at which they are offered. Thus marketing has greater significance to the community as a whole³.

2.4 Benefits to society⁵:

1. **Equilibrium between supply and demand:** Marketing can equilibrium between marketing through the process of equilibrium. If we have balance between production and distribution there will be no danger of boom and slump in our economy.
2. **Generation of utilities:** Marketing as an economic activities that creates time place, possession utilities merchandising creators from utility exchange creates ownership and possession storage creates time utility.
3. Delivery of standard of living marketing is of critical social importance. Because it has been given the responsibilities and task of creating raising and maintaining the standard of living of the society. Only customer oriented business can succeed in discharging this responsibilities.
4. Employment and income marketing is essential for providing increasing employment opportunities continues. Production is governed by conditions marketing offers employment and income about 30 to 40% of the total population.

2.5 Marketing of vegetables:

Vegetables are perishable in nature but the period of their perishability varies from a few marketing to a few months to a large extend the marketing of vegetables is virtually a race with death and decay. Their

perishability makes almost impossible for producer to fix the reserve price for their farm growth products. The supply of vegetables is irregular the price of the vegetables there for fluctuates. The extent of perishability of vegetables may be reduced by the processing function. But they can not be made non perishable like manufactured products non on their supply be made regular⁶.

The term marketing of vegetables includes all the steps from the time products is ready to harvest until it is the hands of consumer. It is the study of all the activities agencies and policies involved in the procurement of vegetables from the farmers to the consumers vegetables marketing is a link between the farm and non farm sectors.

Table No. 2.5.1

Production of fruits and vegetables in India
(Area – 000 Ha Production – 000 MT)

Year	Fruits			Vegetable		
	Area	Production	Per Ha Percent	Area	Production	Per Ha Percent
1991 – 92	2874	28632	9.96	5593	58532	10.46
1997 – 98	3702	43263	1.60	5607	72683	12.96
1998 – 99	3727	44042	11.81	5873	87536	14.90
1999 – 00	3797	45496	11.98	5993	90831	15.15
2000 – 01	3887	45370	11.67	6249	93922	15.02
2001 – 02	4010	43000	10.72	6156	88622	14.39
2002 - 03	3788	45203	11.93	6092	84815	13.92

Source: Agriculture research Data Book 2005 New Delhi.

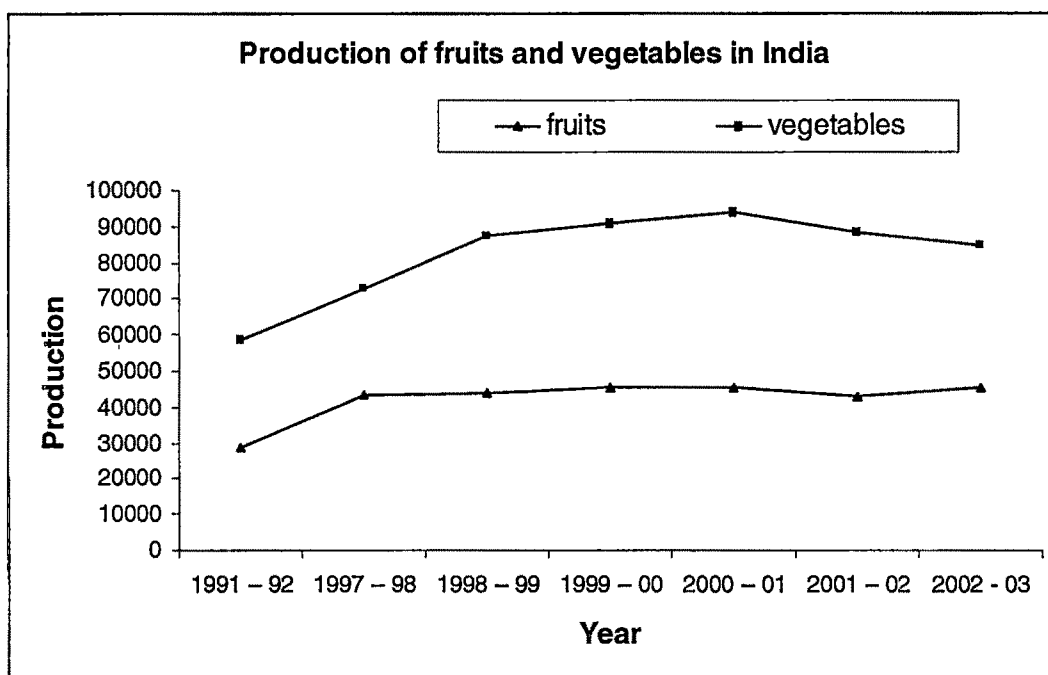


Fig. 2.5.1

The above table provides details of the production of fruits and vegetables in India in the 2002-03. It clear that 1997-98 to 2002-03 year averagely fruits production in equality. From 1991-92 fruits production in 2002-03 an increase of 63.34% is over.

It is clear that 2000-01 tops the list in terms of number of vegetable production (93922) followed by 1999-00, 2001-02 and 1998-99. a substantial number of vegetable production are found in 2002-03, 1997-98 and 1991-92 etc.

Table No. 2.5.2
Area production and yield of vegetables in
various States 1999– 2000

Sr. No.	State	Area (000 ha)	Production (000MT)	Yield (MT Ha)	Area under vegetable as percent of gross cultivated area
1.	West Bengal	1122.3	17413.8	15.5	12.19
2.	Meghalaya	29.2	252.9	8.7	11.63
3.	Orissa	788.1	9096.0	11.5	9.12
4.	Nagaland	20.9	235.7	11.3	8.04
5.	Mizoram	8.3	56.3	6.8	7.35
6.	Sikkim	9.6	43.0	4.5	7.76
7.	Arunachal Pradesh	16.9	80.9	4.8	6.76
8.	Assam	255.9	3089.4	12.1	6.41
9.	Bihar	626.0	9548.8	15.3	6.25
10.	Kerala	159.7	2857.1	17.9	5.38
11.	Goa	7.6	70.0	9.2	4.50
12.	Manipur	9.0	60.8	6.8	4.35
13.	Himachal Pradesh	40.6	660.9	16.3	4.18
14.	Tripura	18.4	232.8	12.7	4.04
15.	Jammu and Kashmir	41.4	584.3	14.1	3.82
16.	Tamil Nadu	209.1	5660.3	27.1	3.19
17.	Karnataka	361.6	3796.9	18.8	3.09
18.	Uttar Pradesh	688.9	13842.4	20.1	2.60
19.	Haryana	135.0	2094.5	15.5	2.20
20.	Andhra Pradesh	230.1	2839.1	12.3	1.90
21.	Gujrat	201.0	2647.0	13.2	1.89
22.	Maharashtra	385.3	4828.6	12.5	1.77
23.	Punjab	135.4	2285.0	16.9	1.68
24.	Madhya Pradesh	258.7	3632.0	14.0	0.99
25.	Rajasthan	98.7	472.6	4.8	0.44
26.	All India	5993.0	90830.7	15.2	3.14

Source: Horticultural Statistics 1999, Department of Horticulture, Chennai and <http://www.postharvestindia.com/indhrvst/fruits.htm>

The vegetable cultivation in the country today spread over 7 million hectares which accounts for about 3.14% of the gross cultivated area in the country. In west Bengal, orissa and bihar as well as the north eastern States vegetables accounted for over percent of the gross cultivated area while in the other States its varied form 0.4% in Rajasthan to 4.5% in Goa the yield

per Ha. Of vegetables varied from around 6.8 MT in Mizoram to 27.4 MT in Tamil Nadu with a national average of 15.2MT.

The yield per Ha of vegetables varied from around 12.5MT in Maharashtra to 1.7% Area under the vegetables as percent of Gross cultivator area.

2.6 Marketing agencies:

The production of the commodity is completed only in the hands of the consumers. All the commodities can not produced in all the areas because of variations in agro climatic conditions. So it is the need of their movement from producers. But generally goods moves by middleman. The role of market middleman has increased in the recent past because of substantial part of the product through them.

I. Procedures:

Most of the farmers or producers sell the surplus (vegetables) either in the village or in the market. Some farmers assemble the produce of small farmers transport it to the nearby market sell and constant profit. Frequent visits to markets and constant touch with the market functionaries bring home to them a fair knowledge of market practices and they are able to perform the various functions of market middleman.

II. Middleman:

Middleman are those individuals or business concerns which specializes in performing the various marketing functions and rendering such services as are involved in the marketing of goods.

1. Village merchants:

The village merchants collect the produce from farmers in the village and bring it to the wholesale market. They buy and sell at their own gain or loss, depending on the difference in sale and purchase price.

2. Internal merchants:

He wanders from village to village to collect the produce and bring it to the wholesale market. He purchases when prices are low and sells when prices are high.

3. Wholesale merchant:

He purchases vegetables in large quantities either from the producers in the villages or from various merchants or from the itinerant market. He sells vegetables not only on profit but also on a commission basis in different markets. He advances to cultivators as well as to small sellers.

4. Commission agents:

A commission agent is a person operating in the wholesale market who acts as the representative of either a seller or buyer. He gets the commission for his service. A commission agent gives advance loans to farmers and small merchants on the condition that vegetables are sold to him or through him.

1. They act as bankers of the farmers or also buyers.
2. They offer advice to farmers for purchase and sale products.
3. They provide empty bags to enable the farmers to bring their produce to the market.

4. They help the farmers in times of their personal difficulties.
5. **Retailers:** Retailers buy goods from wholesales and sell them to the consumers in small quantities.

Retailers are producers personal representative closet in the marketing channel.

III Facilitative middle man:

This type of middle man do not buy and sell directly but assists in the marketing process Marketing can take place even if they are not present but the efficiencies of the system increase when they engage in the form of fees.

1. **Hamals:** They physically move the goods in market place. They do unloading and loading on to tempo auto etc. are the hub (centre) of marketing.
2. **Transport agency:** This agencies assists in the another the main transport mean are tempo used in villages for the transportation of products / good.

2.7 Channels of vegetables marketing:

Channels in detail:

1. **To consumers:** A vegetable grower or producer sell his product to consumers. His main aim should be to serve them well. If they find fresh vegetables of good quality from the producer and satisfy with them the demand can be increased but if they are not satisfy the demand can decreased.

- a. **Hose to house:** This type of selling is not common it is observed that in some cities the producers from nearest village or field bring their product and sell it door to door. They sell the vegetables in the marketing and then return to their homes at noon. In this marketing the producers have try to satisfy their consumer.
- b. **Small markets:** These are held in various places in a city at one or more places in town where consumers as well as retailers purchase them for their own use and for resale in the city. The market is over by the noon. The unsold vegetables are sold at a concessional rate in the end.
- c. **Road side selling:** Vegetables may also be sold by way of road side marketing to the consumers the farm is located on a way busy highway or in a popular locality in some of these road side shops the owner sell only the vegetables grown by them. Attractive display and suitable location of shop are also important for the successful road side marketing.
- d. **Weekly bazaar:** These are held in small towns on a particular day of week eg. On Monday etc. Vegetables are sold in the market and the producers and growers return in the middleman or commission agent and the vegetables are sold by the producers directly to the consumers.

2. To retailers:

- a. **Selling at the farm:** Sometimes the whole seller or his agent or merchant come to the fields of the producers settle the price for the whole field for transporting the product to the cities in this type of selling the producers should keep himself well informed and alert about the market situation and this interest.
- b. **Mandaie's:** There are the places where producers or growers and commission agents or their representative assemble for selling and purchasing of vegetables. Commission agents and raitilerrs purchase from these mandaie's for re sale. Producers have to pay tax to the municipal corporation for the place they occupy the mandaie's for selling their product. The business starts from early in the morning and is over up to 12am.
- c. **Auction market:** Here producers bring their product which is auctioned by brokers in lots retailers party vegetables dealers purchase these lots for reselling in these bazaars vegetables are sold by auction of each lot or heap separately to the highest bidder.

3. Selling to wholesale merchant:

Vegetables are sold to wholesale and through warehouse where there is satisfactory long scale movement of vegetables from the regions to another sometime the wholesalers or their agents pay some money to the vegetable grower as advance for the coming vegetables crop. This is done to

ensure that all the produce of the region may reach and sell these by consignment to city commission merchant.

Cooperative marketing: Some vegetables are sold through cooperation marketing organization. These organization solicit business keeps book, collects money to adjust claims and provide information to their members But still cooperative selling or vegetables is not yet well developed in India.

2.8 The process of vegetables marketing:

The selling is successful when the consumer is satisfy by the produce he buy With the price paid and other services provided. In any case there must be continuity in the chain of activities products flowing towards the ultimate consumer.

This process includes following activities.

1. **Assembling of vegetables:** When the vegetables are ready for sale it is observed that the assembling I done by one of the follwing agencies.
 - a. Cultivars
 - b. Growers who collect the product of others
 - c. Receivers of rest in kind (i.e. landlord)
 - d. village merchant
 - e. Ltinerant merchant
 - f. wholesale merchant
 - g. commission agent

Cultivars bring vegetables in the primary holsale and assembling market village merchant also assemble to some extent. Ltinerrant traders assemble on their own money or that of wholesalers merchants or commission agents assemble through their employees.

2. Storage:

Storage is an important maketing function. The storage function therefore adds the time utility to products. To stabilize prices of vegetables their proper storage is very necessary. The need for storage arises out of the lack of adjustment the method of storage is crude and unscientific storage extends the increase the demand. Storage may be done for home consumption or for the market following are ways of storage.

- a. **Home storage:** Only some of the sound vegetables are stored green vegetables can not be stored well more than 2/3 days. It is necessary that the store room is properly ventilated Proper precaution rate should be taken during the storage of vegetables for a major portion of them may be damaged and made unmarketable by rats water may spread for proper maintainance of humidity in home storage.
- b. **Cold storage:** In these storage temperatuire is reduced by refrigeration and are most suited both for short and long term storage shortage. The main advantage of cost storage over home storage it can be maintained at the desired point. Cold permites vegetables to be offered for consumption or for processing in fresh conditions over

long period. Cold storage of vegetables can not bring any physical change in vegetables.

3. Marketing financing:

Finance is essential for farmers as well as for marketing functionaire farmers raise finance from different sources like money lenders etc. They face different problems like high interest rate, lack of granting loans etc.

4. Marketing risk bearing:

Hardy has defined risk as “uncertainty about cost loss damage” . Risk are involved at almost stages in the marketing process. The price of vegetables fluctuates not only from month to month but during day to day and even on the some day. The change in price may be upward or downward. Risk is possible due to reason like change in demand and supply condition loss in storage and transport and other natural hazards. Someone has to bear the risk in marketing process, but most if from middlemen.

5. Selling and buying:

Selling and buying are the most important activities in the marketing process. At every stage buyers and sellers come together where transfer of ownership occurs and the possession utility is added to the commodities. Selling activities involve personal or impersonal assistance to prospective buyers to buy a commodity. The objectives of selling is to dispose of the problems when to sell, where to sell through whom to sell etc. Buying activities involves the purchase of right goods at the right place, at the right time, in the quantities and the right price. It involves the problems of what to

buy when to buy from where to buy how to buy and how to settle the price and the term of purchase.

6. Transportation:

Since market are separated from production areas transportation is an essential marketing activity. Transportation increases the utility of product making it makes available at that places where it has demand or consumed.

Vegetables are transported by different means like load, auto, tempo, bullockcarts, bus tractors etc. Auto and tempo are the main means of transport.

7. Market information:

Market information is important in marketing process. It ensures the smooth and efficient operation of the marketing system. Market information means a communication or reception of knowledge or intelligence. It included all the facts estimates opinions and other information which affects the marketing of goods and services. It is useful for all section of society which are concerned with marketing.

2.9 Problems of vegetables marketing:

1. **Lack of organization:** In vegetables marketing buyers are merchant and mercantile agents. They are well organizes well informed and professional buyers acting as reseller . But seller are unorganized illiterate ill informed, small poor and scattered person under such circumstances in the process of exchange we have unequal seller - buyer relationships.

2. **Lack of reliable and up to date market:** There is an reliable channel for the communication of price information. Efficient and effective marketing process entirely depends upon the continuous flow of marketing information in absence of regulated markets and cooperative marketing. We can have standing organization for collection and distribution of essential and latest market information regarding to supply, demand and price etc.
3. **Inadequate storage:** In vegetables marketing storage facilities are very inadequate and primitive. The farmers are forced to sell their product as soon as it ready. Because they are enable to provide adequate storage accommodation for their product.
4. **Many middlemen:** Vegetable marketing is more complicated process as compared to marketing of other agricultural products. There are many middlemen in the channel of distribution between the producing end and consuming. The superfluous middleman are responsible for higher cost of marketing of vegetables.
5. **Inadequate transport:** Poor, uncoordinated and defective transport facilities constitute greatest obstacle in the vegetables marketing. But transport and communication provide necessary infrastructure for organized market cheaper and speedy movement of vegetables needs well developed transport.
6. **Price fixation:** The net return to the grower are influenced by the method of price fixation in vegetables marketing the buyer make his

offer to the commission agent not openly or orally but by moving touching or pressing of finger under a price of cloth. The owner stands a side and he is not aware of these secrete negotiation between the buyer and commission agents such secrete bargaining are always unfavourable to the producers or sellers in the vegetables market.

2.10 Facilities by Markets⁷:

In the open plat form trader can display the produce properly and sell to consumer /buyer. But there are products which can not stand in direct sun or rain or cold so for those a covered platform is required. Besides this entire produce is also not sold on the same day so covered platforms needs .

Besides the, various supporting sevied such as –

- | | |
|--|---------------------------------|
| a) Water supply | b) Power supply |
| c) Banks | d) Post office |
| e) Telegraph office | f) Telephones |
| g) Check post | h) Toilets |
| i) Veterinary dispensary | j) First and center |
| k) Agricultural input shops | l) Stationary shop |
| m) Petrol .pump | n) Repair & maintenance |
| o) Farmer nest house | p) Sheds for animals |
| q) Water through for animals | r) Weigh machinel / grad in lab |
| s) Garbage collection & disposal arrangement . | |
| t) public address system . | |
| u) Display boards for prizes , arrivals , | |
| v) Parking place are needed . | |

References:

1. Pawar, J.K. Present Scenario of Agricultural Co-operative Marketing in Kolhapur District. National Seminar on “Restructuring the Agricultural Marketing”, 6th to 7th February, 2006, Department of Economics, Shivaji University, Kolhapur.
2. Pallai, R.S.N, Bagavati, Marketing, S. Chand Company Ltd., Ram Nagar, New Delhi, 2nd Edition, 1990 p. 4-6.
3. Vaikunthe L.D., Regulatory Framework for Agricultural Marketing – A Case Study of APMC in Karnataka, National Seminar on “Restructuring the Agricultural Marketing”, 6th to 7th February, 2006, Department of Economics, Shivaji University, Kolhapur.
4. Bhanumate C.B. (2004): “Marketing of Regulated Commodities in Solapur, Unpublished Ph.D. Thesis, Shivaji University, Kolhapur.
5. Sherlekar S.C. Modern Marketing, Himalaya Publishing House, Mumbai, 2nd Edition, 1988, p. 16.
6. Chavan, V.S., Vegetable Production in India, Ram Prasad and Sons, Agra 1965.
7. Yadav, S.S. Yadav Subansing, Modern Trends in Agricultural Marketing, Pinter Publishers, Jaypur (302003) 1967, p. 195.