

CHAPTER - 8

ANIMAL HUSBANDRY, DAIRY & FISHERIES

8.1 The animal husbandry sector comprises (i) Department of Animal Husbandry; (ii) Dairy Development; (iii) Fisheries and (iv) Veterinary Education & Research.

8.2 Agriculture plays an important role in Rajasthan economy and nearly one fourth of the total state income is generated by Agriculture and allied activities including Animal Husbandry. In Rajasthan, Animal Husbandry is not merely a subsidiary to Agriculture but it is a major economic activity specially in arid and semi-arid areas, thus providing the much needed insurance against prominently occurring scarcity conditions. Income from live stock accounts for 30 to 50% of the Rural households income, with wide variation in region and households.

8.3 Live Stock Sector tops in rural employment with 4.5 percent growth against 1.75 for all other Sectors and 1.1 for Agriculture. This Sector has also the highest potential for rural self-employment generation at the lowest possible investment per unit. Development of Livestock Sector therefore, is critical to rural prosperity.

8.4 The Animal husbandry sector is harbouring a fabulous livestock wealth having very significant role in providing subsidiary to major sources of income to the large numbers of cultivators, small farmers, marginal farmers, BPL families and agricultural labourers. Milk enterprise generates income on regular basis as against the crop enterprise, which is mostly seasonal and is more prone to droughts. Cattle are mainly looked after by the women folk. The provision of assured market for the milk leads to their increased participation and the availability of cash income encourages them to take up to social development programmes.

8.5 In Rajasthan animal husbandry is major economic activity contributing 13 percent of the State's net domestic product. As against twenty five well defined breeds of cattle and seven buffaloes breeds in the country, the state is endowed with seven breeds with finest drought hardy milch breeds (Rathi, Gir and Tharparkar), dual purpose breeds (Kankrej and Haryana) and the famous draught breeds of Nagauri and Malvi.

8.6 Livestock production in general and cattle and buffaloes in particular is highly women oriented as it is labour intensive. Over 95% of households chore is related to the care and management of milch animals in livestock owing households are dealt by women and 60% of all labour engaged in rural livestock production are women. Live stock sector in Rajasthan is thus extremely livelihood intensive, closely interwoven into the social economic fabric of the rural society,

making investments in development of this Sector the critical pathway for rural prosperity. The details of livestock population since 1951 are given below:

(No. in lakhs)

Item	1951	1961	1972	1983	1992	1997	2003
Cattle	107.82	131.36	124.70	135.04	116.66	121.41	108.54
Buffalo	30.45	40.19	45.92	60.43	77.75	97.70	104.14
Sheep	53.87	73.60	85.56	134.31	124.91	145.85	100.54
Goat	55.62	80.52	121.62	154.80	152.85	169.71	168.09
Camel	3.41	5.70	7.45	7.56	7.46	6.69	4.98
Others	3.99	3.72	3.53	4.36	4.82	5.19	5.07
Total	255.16	335.09	388.78	496.50	484.45	546.55	491.36

Source: Livestock Census.

8.7 The scarcity of fodder and low grass land productivity has forced the reduction in live stock population.

Present Position of Live Stock Population and its Contribution to Development of Rajasthan

8.8 Rajasthan possess 11% of the total animal population of India that yield almost 9.16% of the total milk production, 30% of the Goat meat production and 39% of the total wool production and 35% of draught power. The animal husbandry is contributing about 13% of the states economy (GDP).

Development Constraints

- Low productivity and very large numbers are major development constraints faced the sector for all the species. Almost 60% of all cattle and about 80% buffaloes are non-descript and have very low milk and work output. Though the milk production is above national average but as compared to the growth potential it is much below the expectations.
- Compounding low productivity further, the important factor is the tiny stock holding and also shrinking of common grazing lands over a period of time. This has widened the gap between demand and supply of fodder. Situation is further aggravated by the increasing production of unproductive cattle.
- All services in livestock sector like veterinary care, AI etc. are managed by the State Department of Animal Husbandry and by and large these services are free. This overwhelming presence of government in State of free services have compromised their

quality and accountability and have crowded out possibilities for the emergence of free market for these services.

- The vast AI Centers now cover less than ten percent breedable female cattle and buffalo. Unselected bulls used for breeding leads to progenies with virtually no genetic progress from generation to generation, and the poor quality service with less than 30% conception rates together with the lack of coverage and zero genetic progress renders large investments in breeding of cattle and buffaloes infructuous.
- While reasonably effective extension network evolved in the crop production section nation wide, no such effort was made in the Live Stock Sector. Absence of well conceived extension support system in the live stock sector has undermined the pace of development in the sector in different plans. Therefore, accelerating livestock sector development in Rajasthan needs to be planned on priority.

Major Achievement during Tenth Five Year Plan Period

8.9 Some of the major achievements attained during Tenth Five Year Plan are as under:

- One new Polyclinic at Jhalawar, 11 new veterinary hospitals and 209 new sub centers were established in far-flung areas to provide animal husbandry services to the rural mass.
- 17th Livestock Census was conducted by the department and the Revenue Board with the help of the Department of Animal Husbandry.
- Breeding Policy for cattle and buffalo is being revised. The major stress is given on preservation and conservation of indigenous breeds and cross breeding of non-descript animal is being done only on demand.
- Sheep and Sheep Breeder's Insurance scheme were launched.
- Cow and Cattle Breeders' Insurance scheme were started.
- Rs. 199.50 lacs were provided to the Pathmera Goshala for the development and improvement of Kankrej breed.
- Total 113 Veterinary Officers were appointed during the 10th Five Year Plan.

Objectives and strategy during Eleventh Five Year Plan:

8.10 The objectives for Animal Husbandry are:

- Prompt community participation with Public Private Partnership.
- Improvement of out reach services to increase livestock health & production.

- Increases in the income of the people engaged in animal husbandry.
- Promotion of Livestock industries and marketing in the State.
- Active participation of the local breeders.
- Shift from veterinary health care to animal husbandry practices and breed improvement.
- Enabling the small producer to participate in the process of Globalisation, to gainfully participate in the process of growth and modernisation of the livestock sector.

Strategy for Eleventh Five Year Plan

- Use of the national and global market pull to provide the energy and impetus for sectoral growth.
- Promote institutions and establish mechanism to ensure quality consciousness, encourage research and innovations, and enhance sector level efficiency in production, procurement, processing and marketing of all livestock products particularly through value addition.
- The state is endowed with vast livestock populations having wide genetic diversity suitable for milk, meat and fibre production. Therefore there is need for conservation of the valuable germ plasma for genetic improvement and efficient production.
- Research & development wing should make efforts for minimising the large and expanding gap between feed and fodder resource availability and demand.
- Breeding management through restructured AI programme comprising of input generation and delivery system.
- Camel is an essential & asset of the desert economy and is a very good source of draught power all over the State for short distance transport of human as well as goods. It also plays an important role in the economic development of weaker section of the society. Therefore, it is proposed to encourage the breeding of quality animals.
- It is proposed to ensure active participation of non-governmental organisations in the livestock development programmes.
- For educating the animal owners regarding modern scientific methods of livestock management, extension activities need to be strengthened.

Allocation for the Eleventh Five Year Plan 2007-12 & Annual Plan 2007-08

8.11 An amount of Rs. 17500.00 lacs has been proposed for Eleventh Five Year Plan period and Rs. 2069.90 lacs for the Annual Plan 2007-08.

The allocation is about 32.25% higher than the 10th plan allocations. The scheme wise details are as under:-

Training, Extension & Information System:

8.12 In the year 1990-91 training cell was created to organize systematic training programmes. For providing training to the stockman government training schools at four places viz. Bassi (Jaipur), Jodhpur, Kota and Udaipur and at 39 places under private sector are functional. Human resource development and trainings are the essential component for the successful implementation of the various developmental programmes and to increase the productivity per unit time by optimum utilization of available resources and adoption of scientific methods of animal managements. Therefore, certain refresher training courses for the departmental para-veterinary staff would also be taken under this head. It is proposed to strengthen all departmental Stockman Training Schools with Photocopy machine, Audio-visual aids, digital camera, and Computer system with printer, furniture, along with furnishing of hostel and library facilities. For this purpose Rs. 5.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 30.00 lacs for the Eleventh Five Year Plan.

Rajasthan State Live Stock Management and Training Institute:

8.13 The building and essential infrastructural facilities have been made available at Jaipur with world bank assistance under Agriculture Development Project for imparting regular training to the officers of Animal Husbandry Department. The building of institute and its hostel is completed. A provision of Rs. 10.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 75.00 lacs for the Eleventh Five Year Plan for modernization, furniture and fixture etc.

Establishment of Veterinary Polyclinics:

8.14 There are at present 13 polyclinics in the state. It was envisaged earlier to establish polyclinics at all the district head quarters. At polyclinic specialized veterinary care is being provided under one roof. These Polyclinics are equipped with diagnostic aids like x-ray, clinical laboratory and there is facility to treat complex animal disease & infertility problems by the subject matter specialist. It is proposed to establish at least 4 new veterinary polyclinics in the districts of Bhilwara, Hanumangarah, Jhunjhunu and Tribal District of Dungarpur during the 11th five year plan period.

8.15 A provision of Rs. 30.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 300.00 lacs for the Eleventh Five Year Plan.

Disease Diagnostic Laboratories (DDL):

8.16 There are five Regional Disease Diagnostic Center (RDDC) in Rajasthan i.e. At Ajmer, Kota, Udaipur, Jodhpur and Bikaner; Jaipur has

State level Disease Diagnostic Lab (SDDL). There is an urgent need of strengthening of Regional labs Regional Disease Diagnostic Center (RDDC) and facilities at state level labs State Disease Diagnostic Center (SDDC). During the Eleventh Five Year Plan, a Regional Disease Diagnostics Laboratories (RDDL) at Bharatpur is proposed to be set up. To provide essential chemicals, reagents and glassware for all the disease diagnostic labs and creation of new Diagnostic Lab at Bharatpur, a sum of Rs. 2.00 lacs are proposed for the year 2007-08 and Rs. 20.00 lacs for the Eleventh Five Year Plan.

Biological Products Unit (B.P.Lab.)

8.17 This institute is producing veterinary vaccines for the prevention of infections and contagious animal disease.

8.18 A provision of Rs. 0.50 lacs has been proposed for the Annual Plan 2007-08 and Rs. 4.00 lacs for the Eleventh Five Year Plan for strengthening & expansion of this unit.

Strengthening of Nutrition Laboratory:

8.19 It is most essential to strengthening of the existing facilities of nutrition lab so that through advance technology, analysis of samples of feed and fodder can be done. For strengthening of the lab, Rs. 3.00 lacs have been proposed for Annual Plan 2007-08 and Rs. 20.00 lacs have been proposed for Eleventh Five Year Plan period.

Veterinary Hospital and Dispensary:

8.20 The existing facilities of animal health care are inadequate. There is one veterinary center for each 14299 animals where as the recommendation of National Commission on Agriculture is one Veterinary Center for each 5000 animals. Thus the state is lagging far behind the NCA recommendation. During 10th five years plan period, 11 new veterinary hospitals and 209 sub centres were opened, to provide minimum facilities in the selected villages for rural growth center. Therefore it is necessary to increase and strengthen the existing veterinary health care facilities during 11th plan period to take care of precious livestock.

8.21 A provision of Rs. 822.50 lacs has been proposed for the Annual Plan 2007-08 and Rs. 8419.00 lacs for the Eleventh Five Year Plan Period. The scheme wise details are as under:-

Modernization and renovation of hospital buildings:

8.22 At present many hospital buildings are very old and in bad shape and need renovation.

8.23 A provision of Rs. 100.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 1000.00 lacs for the Eleventh Five Year Plan for the modernization and renovation of the existing hospital buildings

Strengthening of Veterinary Hospital:

8.24 There are 1426 veterinary hospitals in the state. For furniture and equipments, a sum of Rs. 130.00 lacs has been proposed for Annual Plan 2007-08 and Rs. 1634.00 lacs for the Eleventh Five Year Plan period.

8.25 There is great demand from the public to establish Veterinary Hospitals in the rural areas of the state. To fulfill the gap and provide better veterinary services to livestock breeders all the veterinary dispensaries (285) would be up graded into veterinary hospitals in the 11th Plan.

8.26 A provision of Rs. 80.50 lacs has been proposed for the Annual Plan 2007-08 and Rs. 1425.00 lacs for the Eleventh Five Year Plan for the salary, equipments, and furniture in the up graded hospital.

Veterinary Extension Programme:

8.27 Due to large distances and inadequate veterinary facilities, a large number of livestock breeders living in far-flung areas are unable to bring their animals to get the animal husbandry facilities. As a result most of the centers remain under utilized. To optimize the services of the existing staff and expand health coverage, it is proposed that each veterinary hospital would hold two days camps in the village of its jurisdiction every week, Therefore, about 50000 camps would be organized every year and will cover about 25000 revenue villages.

8.28 A provision of Rs. 230.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 1800.00 lacs for the Eleventh Five Year Plan.

Management Information & Evaluation System (MIS):

8.29 The limited success of the departmental schemes can be largely attributed to the lack of effective monitoring and feedback systems. All the schemes are monitored on the basis of quantitative data, and there is no means to judge the quality and direction of the programmes. It is proposed to get printed MIS formats for the progress of the veterinary institutions and district level offices.

8.30 A provision of Rs. 27.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 100.00 lacs for the Eleventh Five Year Plan.

Veterinary services through NGO under Public Private Partnership Programme:

8.31 The limited veterinary service of the department requires to be extended with the help of NGO under Private Public Partnership Programme. It is proposed to establish 300 veterinary centers in 3 districts. The NGO will run the centers and provide health and breeding services to the farmers.

8.32 A provision of Rs. 100.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 1200.00 lacs for the Eleventh Five Year Plan.

Livestock breeders training camps:

8.33 For the up-gradation of skill of livestock breeders, training camps are much more required. For this purpose two days and six days breeder training camps will be organized.

8.34 A sum of Rs. 100.00 lacs is proposed for the Annual Plan 2007-08 with a total of Rs. 900.00 lacs for the 11th Plan.

Expansion of extension units at tehsil level:

8.35 Extension programmes have their own impact for the improvement of the skill of the livestock breeders for understanding modern techniques. Therefore, It is proposed to develop extension unit at the tehsil head quarter level hospitals.

8.36 A provision of Rs. 80.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 180.00 lacs for the Eleventh Five Year Plan.

Printing of publicity material:

8.37 A provision of Rs. 20.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 150.00 lacs for the Eleventh Five Year Plan for the printing of posters, pamphlets, booklets and folders etc.

Strengthening of extension unit of the Directorate:

8.38 For preparing of extension material and documentary films for all the extension units at district and tehsil level as well as training Centers, it is proposed to procure three CCD video camera, an attachment of high band video camera to convert into Beta cam, SLR digital camera with all attachments like Flash gun and lenses etc. colour Photocopy machines for the preparation of the exhibition material.

8.39 A provision of Rs. 10.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 30.00 lacs for the Eleventh Five Year Plan.

Private Veterinary Services:

8.40 To fulfill the gap, the expansion of veterinary services would be taken up through involvement of community and NGO's. Under the scheme, if a Panchayat/NGO wants to open a veterinary hospital Government would provide salary of the veterinarian up to 5 years and equipment to the Panchayat/NGO.

8.41 A provision of Rs. 10.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 50.00 lacs for the Eleventh Five Year Plan.

Veterinary Council:

8.42 State Veterinary Council has been constituted under the provisions of Indian Veterinary Council Act. It regulates the veterinary practices in the state and skill and knowledge up-gradation of veterinarians. It is a Centrally Sponsored Scheme on 50:50 basis.

8.43 A provision of Rs. 20.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 150.00 lacs for the Eleventh Five Year Plan for state matching share.

Livestock Development Programme:

8.44 Dairy farming requires low investment and has the potential to create attractive livelihood opportunities for the economically challenged sections of rural Rajasthan, provided livestock can be genetically upgraded through systematic and scientific animal husbandry. For the improved and better services to livestock, it is desirable to test the semen before distribution to AI centers from the district supply unit for testing motility of semen to ensure quality. So, it is planned to procure 35 microscopes at a cost of Rs. 20000/- per microscope during 2007-2008 to increase milk yield.

8.45 A provision of Rs. 75.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 500.00 lacs for the Eleventh Five Year Plan for replacement of cryocan jars, AI equipments, input supply and feed supplement and medicines for the treatment of infertile animals.

Strengthening of Cattle Breeding Farm:

8.46 Department has four cattle breeding farms at Nagaur, Dug (Jhalawar), Ramsar (Ajmer) and Kumher (Bharatpur). These farms are initially established for the rearing of elite breeding bulls. For breed improvement almost 50% success would depend on the provision of natural services through pedigree bulls because it is still the first choice among farmers. The department would procure bulls of Nagauri, Malvi, Gir and Murrah buffalo bulls from the breeding tract within the country and distribute on subsidized cost to Goshalas and farmers.

8.47 A provision of Rs. 20.90 lacs has been proposed for the Annual Plan 2007-08 and Rs. 200.00 lacs for the Eleventh Five Year Plan for bull distribution and establishment of farmers training centers at all four cattle breeding farms.

Goshala Development:

8.48 For the development and monitoring of the Goshalas in the state a unit is working in directorate. Under this programme, a provision of Rs. 0.05 lacs has been proposed for the Annual Plan 2007-08 and Rs. 4.00 lacs for the Eleventh Five Year Plan to supervise and improvement of the Goshalas in the state.

8.49 Department is providing grant to the Rajasthan Go Seva Ayog. A provision of Rs. 25.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 150.00 lacs for the Eleventh Five Year Plan for the establishment and monitoring expenses of Ayog for 11th Plan Period.

Institutional Arrangement of Supplies (RLDB):

8.50 Rajasthan Livestock Development Board has been constituted in the 9th Five Year Plan for regular input supply to the departmental institutions and development. RLDB is getting funds from Government of India for the various livestock development programmes under NPCBB (National Project for Cattle and Buffalo Breeding). Department has been providing grant to RLDB to meet out salary expanses.

8.51 A provision of Rs. 30.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 200.00 lacs for the Eleventh Five Year Plan.

Poultry Development:

8.52 The sector needs promotion and support through extension and input services besides technical guidance. Intensive Poultry Development Block and Poultry Training Center, Ajmer requires to be strengthened.

8.53 A provision of Rs. 6.25 lacs has been proposed for the Annual Plan 2007-08 and Rs. 39.00 lacs for the Eleventh Five Year Plan for Intensive Poultry Development Block and Poultry Training Center, Ajmer and Poultry Farm Jaipur respectively.

Equine Development:

8.54 Marwari horse breed is well known worldwide and its main habitat is Rajasthan. It is proposed to establish few natural service centers in the state and pure bred stallion has to be provided for the improvement of the breed. It is also proposed to start a incentive programme to the breeders of Marwari horses. So a sum of Rs. 5.00 lacs and Rs. 30.00 lacs has been kept for the Annual Plan 2007-08 and 11th Plan.

Goat Development:

8.55 As per 17th Livestock Census 2003, the goat population in Rajasthan is 168 lacs. For the development of goat in the state there is one goat farm, located at Ramsar. Buck distribution activity is the major breed improvement programme for the Sirohi goat. A sum of Rs. 10.00 lacs has been proposed for Annual Plan 2007-08 and Rs. 60.00 lacs for the 11th Plan respectively.

Livestock Census:

8.56 18th livestock census will start in the year 2007 with the help of the Revenue Board. It is a central assisted programme with 100% central share. A provision of Rs. 0.75 lacs has been proposed for the Annual Plan 2007-08 and Rs. 4.00 lacs for the Eleventh Five Year Plan for office expenditure of the staff of department stationed at Revenue Board.

Direction and Administration:

8.57 Department has vast area of institutions and offices including Joint Director offices at range level and at district level Dy. Director and Assistant Director level office. For the monitoring and supervision of different schemes and programmes vehicles are required. At present departmental vehicles are very old and requires major repairs. No. of offices have no vehicles. A provision of Rs. 85.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 500.00 lacs for the Eleventh Five Year Plan for purchase of new vehicles and other expenses.

Special Component Sub Plan (SCSP) :

8.58 Under this head departmental schemes like calf rallies, buck distribution and purchase of medicines are undertaken. Following proposals are to be considered for the benefit of Schedule Caste families every year.

- Buck & Ram Distribution:

Under this scheme 500 Sirohi bucks and 500 Rams will be purchased and distributed to the SC families on subsidized rate that is @ Rs. 400/- per Buck/Ram.

A provision of Rs. 30.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 200.00 lacs for the Eleventh Five Year Plan.

- Bull Distribution:

Under this scheme 400 elite indigenous bulls (Gir, Nagauri, Tharparkar, Rathi, Kankrej and Murrah) will be purchased and distributed to the SC families on subsidized rate that is @ Rs. 1000/- per buck.

A provision of Rs. 20.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 125.00 lacs for the Eleventh Five Year Plan.

- Exemption of education fees for the students studying in Livestock Training School of the department. There are 4 training schools and total 64 students of the SC families will be benefited. Under this, total fees of the SC students would be exempted.

A provision of Rs. 8.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 50.00 lacs for the Eleventh Five Year Plan.

- Purchase and distribution of medicine

For the treatment of animals of the SC families, a provision of Rs. 217.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 2125.00 lacs for the Eleventh Five Year Plan.

- Farmers Training Programme (Two days):
Under this scheme 350 farmers training programmes will be conducted and a provision of Rs. 35.00 lacs would be required for Annual Plan 2007-08 and Rs. 175.00 lacs for 11th Plan.
- Backyard Poultry Development Programme :
Under this scheme 4000 units of 20 chicks of low input chicks will be distributed free of cost and a sum of Rs. 65.00 lacs will be required during 2007-08 and Rs. 325.00 lacs during 11th Plan.

Tribal Sub Plan (TSP):

8.59 Under this head departmental schemes like calf rallies, buck distribution, backyard poultry development and trainings are undertaken. Following proposals are to be considered for the benefit of families belonging Schedule Tribes.

- Buck & Ram Distribution:
Under this scheme 350 Sirohi bucks will be purchased and distributed to the ST families on subsidized rate that is @ Rs. 400/- per buck/ Ram.
A provision of Rs. 30.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 200.00 lacs for the Eleventh Five Year Plan.
- Bull Distribution:
Under this scheme 300 elite indigenous bulls (Gir, Nagauri, Tharparkar, Rathi, Kankrej and murreh) will be purchased and distributed to the ST families on subsidized rate that is @ Rs. 1000/- per bull.
A provision of Rs. 20.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 125.00 lacs for the Eleventh Five Year Plan.
- Exemption of education fees
For the students studying in Livestock training school of the department. There are 4 training schools and total 48 students of the ST families will be benefited. Under this, total fees of the ST students would be exempted.
A provision of Rs. 8.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 50.00 lacs for the Eleventh Five Year Plan.
- Purchase and distribution of medicine
For the treatment of animals of the ST families. A provision of Rs. 40.00 lacs has been proposed for the Annual Plan 2007-08 and Rs. 600.00 lacs for the Eleventh Five Year Plan and also a provision of Rs. 730.00 lacs has been kept for the strengthening of polyclinic, DDL, LSD and school etc. for the institution of the tribal area for 11th Plan as well as Rs. 73.00 lacs for Annual Plan 2007-08.

- Farmers Training Programme (Two days):

Under this scheme 350 farmers training programmes will be conducted and a provision of Rs. 35.00 lacs would be required for Annual Plan 2007-08 and Rs. 175.00 lacs for 11th Plan.

- Backyard Poultry Development Programme :

Under this scheme 4000 unit of 20 chicks of low input chicks will be distributed free of cost and a sum of Rs. 65.00 lacs will be required for the year 2007-08 and 325.00 lacs for the 11th Five Year Plan Period 2007-2012.

Cattle Fair:

8.60 The state is organizing ten state level cattle fairs at different areas. There is a wide scope to develop these fairs for the attraction of tourists as well to provide better market facilities to the farmers in the fairs. There is a need to provide adequate facilities for the incoming animals and animal owners on the fair ground. On these cattle fair grounds capital works for providing enough drinking water, animal shelters, fodder stores etc. are required to be developed. A provision of Rs. 75.00 lacs has been proposed for 11th Five year Plan. Rs. 10.00 lacs would be required for Annual Plan 2007-08.

Training/Seminars/Exhibitions:

8.61 A provision of Rs. 2.00 lacs has been proposed for the participation of veterinarians in the trainings, seminars and exhibitions etc. for the Annual Plan 2007-08 and Rs 12.00 lacs for the 11th plan. It will include all the traveling expenses including registration fees and office expenses for the preparation of the events.

Construction Works:

8.62 A provision of Rs. 50.00 lacs for the Annual Plan 2007-08 and Rs 250.00 lacs for 11th Plan has been kept for the repair and renovation works of the buildings of the departmental offices and veterinary institutions.

Assistance to States for Control of Animal Diseases (ASCAD):

8.63 Under this Centrally Sponsored Scheme (75:25), it is intended to fill up the critical gaps in terms of strengthening the laboratories and creating a disease management system, and to equip the personnel by providing them training on various aspects of disease diagnosis, control and management. Under the scheme, the biological product laboratory and the state as well as regional disease diagnostic laboratories are under the process of modernization/ strengthening.

8.64 Public awareness programme would also be taken up. During the plan period the B.P. Lab would be upgraded to ISO 2001 level and tissue

culture lab will be fully established. Strengthening cold chain facilities through out state will also be taken up.

8.65 Under the scheme a provision of Rs. 900.00 lacs has been proposed for the 11th Plan, while Rs. 150.00 lacs is proposed for the Annual Plan 2007-08.

RAJASTHAN AGRICULTURE UNIVERSITY, BIKANER & MPUAT UDAIPUR

Research and Education

8.66 The Rajasthan Agriculture University Bikaner was established in 1987 to look after Agriculture Extension, Education and Research and to carry out production oriented agriculture research, rural mass education, adoption and propagation of new technologies in the field of agriculture including animal husbandry and allied services.

8.67 In the year 1999-2000 another Agriculture University was also established at Udaipur with a view to watch the interest of Agriculture Education and Research more effectively in the southern and eastern parts of the State. Now out of the 32 districts, 21 districts are served by RAU, Bikaner and 11 by Maharana Pratap University of Agriculture & Technology, Udaipur.

8.68 Following are the major activities related to Animal Husbandry which are under taken by these universities:

Veterinary Education and Research (Animal Husbandry)

Research

8.69 The responsibility of Animal Husbandry, Veterinary Education and Research and fisheries are entrusted to RAU, Bikaner & Maharana Pratap University of Agriculture & Technology, Udaipur in the State. A state livestock breeding strategy needs to be evolved to meet the requirement of milk, meat, egg and livestock products and to enhance the role of draught animals as a source of energy for farming operations and transport. Major thrust will be on genetic up-gradation of indigenous / native cattle and buffaloes using proven semen and high quality pedigreed bulls and by expanding artificial insemination network to provide services at the farmers' doorsteps. Following are the important thrust areas of research in the field of Veterinary & Animal Science, dairy technology and fisheries.

Livestock Research

8.70 There is need for research on conservation and improvement of indigenous germplasm of Tharparker and Rathi Cattle, Surti Buffaloes, Gir cows, Deogarhi and Parbatsari goats and magra, Chotla, Mawari, Sonadi sheep etc.

Dairy Technology Research

8.71 Research on food products - technology standardization, packaging, by-product utilization and development new foods.

Fisheries & Limnology Research

8.72 Studies on bio-diversity including survey of ichthyo fauna and other aquatic organisms contributing to the aquatic bio-diversity.

8.73 To work out nutritional requirement of local commercially important fishes for formulating ideal fish diet to promote intensive fish culture.

Education

8.74 In view of current needs of the State, syllabus has been re-oriented to include new disciplines viz. Veterinary Biochemistry, Livestock Product Technology and Epidemiology and Preventive Veterinary Medicine. In order to cater to the employer needs, new courses viz. Veterinary Ambulatory Clinic, Vety. Laboratory Diagnosis, Vety. Epidemiology and Computer Applications and Bio-statistics have been included. However, as per VCI norms, there are deficits in respect of equipments, and facilities in various departments of the College. One time financial assistance is required to make up the deficiencies of equipments and facilities. Significant infrastructure additions have been made under ADP, namely - Teaching Clinical Complex, Animal Biotechnology laboratory, Central Laboratory and Faculty House. These facilities need to be strengthened through equipment and work force. Other facilities requiring strengthening are Library, Internship Programme, Field Practical Mobility, Disease Investigation facility, PG Programmes, Internship stipend and PG Stipend.

8.75 A provision of Rs. 335.00 lakhs & Rs.325.00 lakhs has been proposed for Eleventh Plan period and Rs.34.00 lakhs & Rs.25.00 lakhs for Annual Plan 2007-08 for these Universities.

FISHERIES DEPARTMENT

8.76 Rajasthan possess a large area of inland water bodies which offer potential for development of both intensive and extensive system of culture based fisheries. From the available fresh water resources in the state 3.30 lakh ha. of inland water sheets in the form of reservoir (1.2 lakh ha.) tanks, and ponds (1.8 lakh ha.) and rivers (0.30 lakh ha.) have been identified for capture cum culture fishery management. Besides, there exists 0.04 lakh ha. brackish water bodies and perennial flowing system, 214 KM. Indira Gandhi Feeder Canal and about 500 KM under I.G.N.P. in north west Rajasthan.

8.77 Constraints in increasing production

- Uncertain and irregular monsoon.

- Draining/ pumping out of maximum stored water for Irrigation and Drinking purposes.
- Shortage of quality fish seed.
- Lack of traditional fishermen community.
- Lack of awareness among rural masses.
- Lack of technical know how in rural sector for fish culture.

Objectives during XIth Plan

8.78 The main objects of the fisheries and aquaculture development programme identified for Eleventh Five Year Plan are:

- Maximization of Biological Productivity with optimum utilization of available resources.
- Enhancement of the quality fish seed production.
- Generation of employment opportunities.
- Production of all commercially important fish species available in Rajasthan.
- Improvement in socio economical condition of Fishermen.
- Conservation of aquatic bio diversity and eco system.
- intensive training and demonstration for propogation of advance technologies in aquaculture practices.
- Propagation of cage and pan fish culture.
- Establishment of fish marketing yard, cold chain and retail outlets.
- Promotion of nutritional fish feed production units.
- Strengthening of the fisheries research and education net work.
- Strengthening the data base information net work.

Financial outlay and programme during XI plan

8.79 An amount of Rs. 615.00 lakhs has been proposed for the 11th Five Year Plan 2007-12 which includes Rs. 86.50 lakh for committed and Rs. 528.50 lakhs for new items. For the year 2007-08, an amount of Rs. 85.00 lakhs has been proposed which includes Rs. 27.00 lakhs for committed and Rs. 58.00 lakh for new items. Scheme wise details are as under:

Supervisory staff- Direction and administration

8.80 The total outlay proposed for Eleventh Five Year Plan is Rs. 60.00 lakh out of which Rs. 40.00 lakhs has been proposed for the creation of new office in Jaisalmer, Sikar & Dungarpur and Rs. 20.00 lakh has been proposed for the construction of office building at Alwar as new item and no provision has been proposed in the Annual Plan 2007-08.

Fish Seed Production:

8.81 For the development of fishermen, the most important input component is the availability of quality fish seed. For renovation and extension fish farm with water supply system, an outlay of Rs. 113.70 lacs has been proposed for 11th Five Year Plan period and Rs. 27.70 lacs has been proposed for Annual Plan 2007-08. During 2007-08 Rs. 13.70 lakh are kept for the completion of boundary wall and water supply system at RPS., and Rs. 13.00 lakh is proposed for renovation of fish farm Bhimpur Banswara & Rs. 1.00 lakh for fish farm Jawai Pali.

Development of Inland Fisheries and aquaculture:

8.82 Under Centrally Sponsored Scheme, 15 FFDA's are functional in the state with the object:

- (a) Development of water bodies through intensive fish culture particularly in rural area.
- (b) Generation of rural employment potential.
- (c) Additional source of income for local bodies.

8.83 During the 11th Five Year Plan period 4000 fish farmers are proposed to be trained in aquaculture techniques for this purpose an outlay of Rs. 77.30 lacs has been proposed for 11th Five Year Plan period and Rs. 13.65 lacs has been proposed for Annual Plan 2007-08.

Fisheries Extension, Education and Training:

8.84 For creating awareness for fish culture techniques and adoption of advance practices among progressive fish farmer, Rs. 19.50 lakh has been proposed for 11th Five Year Plan (2007-12), out of which Rs. 3.00 lakh for committed work and Rs. 16.50 lakh as new items out of which Rs. 2.00 lacs has been proposed for Annual Plan 2007-08.

Group Accident Insurance Scheme for Active Fishermen:

8.85 Fish Farmers / Fishermen affiliated with FFDA's and Rajasthan Tribal Area Development Cooperative Federation are proposed to be insured through this scheme under CSS. The 50% of the premium is paid by Government of India directly to FISHCOPPED, and 50% has to be contributed by state government. A provision of Rs. 3.00 lakh has been proposed for 11th Five Year Plan and a sum of Rs.0.40 lakh for the year 2007-08 under group accident insurance scheme for active fishermen.

Fish Marketing:

8.86 A total sum of Rs. 110.00 lakhs has been proposed for the 11th five year plan. Out of which Rs. 10.00 lakhs is proposed for the year 2007-08, for the state level fish marketing yard and purchase of mechanized boats.

Conservation & Biosphere management:

8.87 A total sum of Rs. 15.00 lakhs has been proposed for the 11th five year plan for this scheme & out of which Rs. 1.00 lakhs is proposed for the year 2007-08, for the restoration of indigenous fish species and establishment of ornamental fish hatchery.

National Scheme of Welfare of Fishermen:

8.88 A total sum of Rs. 115.00 lakhs has been proposed for the 11th five year plan for this scheme & out of which Rs. 12.00 lakhs is being proposed for the year 2007-08, for the development of model fishermen village and saving cum relief programme.

Strengthening of Cooperative society and SHG.

8.89 To increase the participation of local person in the development of reservoir fisheries on culture basis, it is proposed to strengthen the cooperative and self help groups. For this purpose an outlay of Rs. 7.00 lakh for the year 2007-08 and Rs. 35.00 lakhs for the Eleventh Five Year Plan 2007-12 has been proposed.

Diversification of culture practices

8.90 A total sum of Rs. 6.50 lakhs has been proposed for the 11th five year plan for this scheme & out of which Rs. 1.25 lakhs is proposed for the year 2007-08, for the artemia culture, breeding and culture of Cat / Air Breathing fishes.

Research and Development

8.91 A total sum of Rs. 60.00 lakhs has been proposed for the 11th five year plan for this scheme & out of which Rs. 10.00 lakhs is proposed for the year 2007-08, for the assistance to Fisheries College (MPUT) Udaipur, upgradation of Fisheries Survey and Investigation Unit, assistance to National Fisheries Board and Mobile Pathological Units.

DAIRY

8.92 In Dairy Sector, Rajasthan Co-operative Dairy Federation, without any financial assistance in the 10th Five Year Plan, kept continued its success journey with ever growing membership of 6.18 lakh fellow milk producers-- with over 23% growth in improving the socio-economic status of rural masses. Attaining its 1st rank among the North Indian State Dairy Federations in milk procurement and marketing. RCDF recorded ever highest milk collection of 20.28 lakh Kg on a particular day in 2005 with average collection having gone to 14.67 lakh Kg per day. The Dairy Federation's economic policies resulted in increase of over 45% in milk pricing pay back to the producers. The demand for Saras milk scenario also grew breaking 40% increase milestone with added flavors of range of new milk products in all the trains, originating from Jaipur.

8.93 Apart from social-benefit schemes- Saras Surakhsha Kavach and newly launched Saras Arogya Beema Yojna, Central Govt funded schemes SGSY and WDP (Women Development Programme) have contributed in the upliftment of the masses. Specially WDP has opened the doorway of Women Empowerment in the state- via 2,666 new Women Dairy Societies with additional 1.6 lakh fresh women membership.

8.94 During the Tenth Plan period with an outlay of Rs. 9.40 crore "Clean Milk Production Programme" has commenced under Centrally Sponsored Scheme with an objective of quality improvement thereby increasing returns and production enhancement. Projects have also been taken up under IDDP, another Centrally Sponsored Scheme, with a total out-lay of Rs. 17.44 crore for development of infrastructure in the Distts. of Jhalawar, Chittorgarh, Baran, Rajsamand, Churu and Sriganganagar.

8.95 Rajasthan Co-operative Dairy Federation marching ahead has set its goal of achieving 36 lakh kg. average milk collection target by the end of 11th Five Year Plan by intensive coverage of milk-shed, cattle induction, breed improvement and productivity enhancement schemes.

8.96 A token provision of Rs. 0.05 lacs has been kept for Eleventh Five Year Plan period 2007-12.