#### **CHAPTER III**

#### **PERFORMANCE APPRAISALS**

#### **AUDIT REVIEWS**

#### **Animal Husbandry and Dairying Department**

#### 3.1 Working of the Animal Husbandry and Dairying Department including Manpower Management

#### Highlights

Animal Husbandry and Dairying Department aimed at genetic improvement of milch animals, keeping them disease free, providing balanced feed/fodder and improving dairying profession for self-employment of unemployed youth. Audit observed deficient programme management and inadequate monitoring of the schemes/projects by department. Budget proposals were unrealistic. Livestock Breeding Programme and Cows and Buffaloes Development Programme were not implemented effectively as there were considerable shortfalls in artificial insemination of buffaloes; conception age and mortality among calves had increased while the milk production had declined. Of the 11 gas plants, meant for producing Liquid Nitrogen gas, required for preserving frozen semen, eight had outlived their lives and three were out of order for want of repairs. Internal audit was ineffective, as it had covered only five out of 93 offices during 2003-04. Even for these, the inspection reports were still at the processing stage.

Against a budget provision of Rs 399.47 crore, Rs 308.46 crore were spent during 2001-04.

(Paragraph 3.1.5)

Shortfall in targets in artificial insemination of buffaloes ranged between 12 and 30 *per cent* during 2001-04. In a large number of Veterinary Institutes in Ambala, Bhiwani, Karnal and Rohtak districts, essential equipment such as microscopes, temperature kits, etc. were not provided.

(Paragraph 3.1.13)

Adequate feed to female calves was not provided. Against the requirement of 174.21 quintals, in two districts, only 65.24 quintals feed was provided under Special Livestock Breeding Programme.

(Paragraph 3.1.9)

At Government Livestock Farm, Hisar, fodder and feed were not provided to the cattle in adequate quantity. Milk production decreased by 23 *per cent* during 2001-04. Decrease in per *acre* production as well as in cultivable area in farm during 2001-04 resulted in loss of Rs 2.91 crore.

(Paragraph 3.1.17, 3.1.18 and 3.1.19)

All the eleven liquid Nitrogen Gas Plants in the State were non-functional either for want of repair or because the plants had outlived their lives.

(Paragraph 3.1.15)

Rupees 30.79 lakh spent during 1995-2004 on the salary of veterinary surgeons deployed for the production of vaccines for swine fever, renikhet and fowl pox were rendered unfruitful as no vaccine was produced.

(Paragraph 3.1.11)

Internal audit was not effective. Lack of monitoring resulted in ineffective implementation of programmes/schemes.

(Paragraph 3.1.25 and 3.1.26)

# Introduction

**3.1.1** The Department of Animal Husbandry and Dairying of the Government of Haryana is the administrative department for implementing the policies and programmes relating to animals in the State. Dairy Development Department, which was responsible for providing self-employment opportunities through establishment of dairy units, was merged with Animal Husbandry Department from May 2003. The department aims at genetic improvement of milch animals and keeping them disease free, providing improved and balanced feed/fodder, improving the dairying profession and providing self-employment to unemployed youth for improving the living standards of rural masses by supplementing their income.

Besides, the State Government set up Haryana Livestock Development Board (HLDB) in January 2000 for boosting livestock breeding programmes which included mainly development of cattle and buffaloes, production and distribution of semen straws for artificial insemination (AI) in cows/buffaloes, production and sale of feed, fodder, seeds, etc.

According to the 1997 census, the livestock population in the State was 20.618 million. The State Government fixed the target of enhancing production level upto 58.03 lakh metric tonne of milk, 15,890 lakh eggs and 28.58 lakh kilograms of wool by the end of the Tenth five year plan i.e. 2006-07, against which the levels attained at the end of 2002-03 were milk: 51.36 lakh mt, eggs: 12,507 lakh numbers and wool: 24.88 lakh kgs.

For the Ninth and Tenth five year plans, out of total approved outlays of Rs 11,600 crore and Rs 12,000 crore for the State, Animal Husbandry department was allocated only Rs 56 crore (0.48 *per cent*) and Rs 114 crore (0.95 *per cent*) respectively.

# Organizational set up

3.1.2 The Financial Commissioner and Principal Secretary is the administrative head of the department at Government level and is responsible implementation of the Government policies for relating to programmes/schemes of the Animal Husbandry and Dairying Department. The Director is the Head of the Department and also the Controlling Officer who is assisted by five Joint Directors, five Deputy Directors and Gaushala Development Officer at Headquarters located at Panchkula. In the field, there are 19 Deputy Directors at district level, six Assistant Directors and 35 Subdivisional Officers (SDOs).

As of March 2004, there were 2,421 Veterinary Institutions (Civil Veterinary Hospitals: 164; Hospital-cum-Breeding Centres: 456; Regional Artificial Insemination Centres: 60; Civil Veterinary Dispensaries: 864: Stockmen<sup>1</sup> Centres: 749 and others: 128) in the State.

## Audit objectives, methodology and performance indicators

**3.1.3** For reviewing the working of Animal Husbandry and Dairying Department, the technique of integrated audit was adopted. This technique seeks to integrate and interpret disintegrated information along policy and functional lines.

The departments of Government do not prescribe performance indicators for self-appraisal. Invariably, schemes, programmes and activities get evaluated in a disaggregated manner by either the planning bodies or funding agencies depending on the emerging priorities at a particular time. The department did not prescribe any tangible indicators for the purpose of evaluating the extent to which genetic improvement in milch animals was brought about in the State as a result of implementation of the AI Programme.

Audit adopted the following performance indicators for evaluating the working of Animal Husbandry and Dairying Department:

- Improvement in Veterinary Services and consequent Animal Health;
- Achievement in areas of artificial insemination, milk yield, mortality among calves, etc. under Cattle and Buffalo Development Programme;

<sup>&</sup>lt;sup>1</sup> Stockmen Centres: The primary unit for delivery of medical, health and breeding services for animals.

- Improvement in Poultry and Piggery Development;
- Increase in production of Fodder and Feed including production of fodder seeds; and
- Opportunities of self- employment provided to educated young men and women of rural areas through dairy development activities.

## Audit coverage

**3.1.4** Records relating to the working of the department for the years 2001-04 were test checked between January and April 2004 in the offices of the Director, Animal Husbandry and Dairying Department at Panchkula and  $six^2$  (out of 19) districts covering 40 (out of 93) Drawing and Disbursing Officers (DDOs) in the department.

Selection of districts was made to cover all the four Commissionerates in the State. Of the total expenditure of Rs 296.10 crore and Rs 12.36 crore incurred on 94 schemes under Plan and non-plan of Animal Husbandry and 11 schemes under Plan and non-plan of Dairy Development during 2001-04, Rs 160.09 crore (54 *per cent*) and Rs 4.69 crore (38 *per cent*) respectively were spent in these six selected districts.

#### Financial management and budgetary procedure

**3.1.5** The Director of Animal Husbandry and Dairying, who was the head of department, was assisted by 93 Drawing and Disbursing Officers (DDOs). Budget proposals for major, minor works and schedule of new expenditure were scrutinized by the Principal Secretary, Animal Husbandry and Dairying Department and sent to the Finance Department (FD) whereas the remainder of the budget was generally sent to the FD directly by the Head of the Department.

Audit observed that the information regarding actual expenditure incurred during previous two years and first six months of the current year were not being included in the annual budget proposals forwarded to Finance Department as required. Finance Department did not enforce compliance of the requirement of furnishing such information by the department. Details of

2

Ambala, Bhiwani, Hisar, Karnal, Mohindergarh at Narnaul and Rohtak.

Animal Husba	ndry					
Year	Department's budget proposal	Budget provision		Expenditure	Variation in relation to original budget Saving (-) Excess (+)	variation
		Original	Final			
			(Rupees	in crore)		
2001-02	192.70	114.95	95.47	90.28	(-) 24.67	21
2002-03	141.88	129.31	101.44	100.77	(-) 28.54	22
2003-04	160.77	134.94	105.47	105.05	(-) 29.89	22
Total	495.35	379.20	302.38	296.10	(-) 83.10	
Dairy Develop	ment					
2001-02	9.21	7.62	4.86	4.86	(-) 2.76	36
2002-03	8.68	6.41	4.16	4.61	(-) 1.80	28
2003-04	6.77	6.24	2.93	2.89	(-) 3.35	54
Total	24.66	20.27	11.95	12.36	(-) 7.91	
Grand Total	520.01	399.47	314.33	308.46		

budget provision and actual expenditure during 2001-2004 were as under:

The budget proposals for the years 2001-04 were of the order of Rs 520.01 crore, which were inflated mainly because the department included provision even for vacant posts. The State Government, however, disallowed the provision for vacant posts and approved provision of Rs 399.47 crore in the original budget. Thus, the basis of framing estimates was not realistic.

Actual expenditure was still lower i.e. Rs 308.46 crore mainly because Government of India (GOI), under 11 Centrally sponsored schemes and the State Government under 12 schemes, did not release funds aggregating Rs 91.76 crore though provision for the same was made in the annual budgets during 2001-04 as brought out in *Appendix XIV*.

No amount was spent on infrastructure development by the department during 2001-04. Of the total revenue expenditure of Rs 296.10 crore under Animal Husbandry during 2001-04, expenditure on establishment was Rs 259.57 crore (88 *per cent*) and on stores, etc. Rs 36.53 crore (12 *per cent*). Under Dairy Development, of the total expenditure of Rs 12.36 crore during 2001-04, expenditure on establishment was Rs 8.73 crore (71 *per cent*) and on subsidy, etc. Rs 3.63 crore (29 *per cent*). Scrutiny of records revealed rush of expenditure in March, unjustified release of grant to Haryana Livestock Development Board (HLDB) and loss of interest on irregular retention of unspent grants as discussed below:

## Rush of expenditure in March

**3.1.6** Heavy rush of expenditure in the month of March was noticed under 'Office Contingency' in respect of 6 to 23 plan and non-plan

Year	Number of schemes	Total expenditure during the year	Expenditure in March	Percentage of col. (4) to (3)	Range of Scheme-wise percentage of expenditure in March
		(Rs in la	kh)		
(1)	(2)	(3)	(4)	(5)	(6)
2001-02	11	58.64	51.60	88	73 to 100
2002-03	6	179.84	121.99	68	63 to 100
2003-04	23	661.24	578.14	87	26 to 100
Total		899.72	751.73	84	<b>26</b> to <b>100</b>

schemes as detailed below:

Substantial funds were drawn at the fag end of financial years, which remained unspent in the year of their drawal and were carried over to subsequent financial years in contravention of financial rules. This had adversely affected the implementation of schemes/programmes. The Department stated (August 2004) that funds were released mostly in the last quarter of the year by the Government; also, the purchase procedure through Director, Supplies and Disposal took three to six months. This was endorsed by Government in the reply (September 2004).

#### Unjustified release of grants to Haryana Livestock Development Board

To promote breeding and development of livestock in Haryana, the 3.1.7 State Government transferred all the assets available with Government Livestock Farms (GLF), liquid nitrogen gas plants and all receipts from sale of frozen semen, milk, grains, etc. to Haryana Livestock Development Board (HLDB). The Government also decided to continue to allocate funds to the HLDB till the latter became self-sustaining by generating its own resources by proper management of its assets, providing consultancy and marketing of its products. Though there was no demand from the department/HLDB for the funds, the Finance Department sanctioned and allocated (May 2002) Rs 7.54 crore under the scheme for establishment of HLDB. After the release of sanction/allocation by the Finance Department, a proposal was moved (July 2002) by HLDB to the Government (through the department) for release of entire funds for repair/renovation of existing infrastructure (Rs two crore), salary of staff (Rs 3.54 crore) and incentive and insurance for top quality Murrah buffaloes (Rs two crore). Against this sanction, Director, Animal Husbandry had drawn Rs four crore in January 2003 and disbursed the same to HLDB. Scrutiny of Balance Sheets of HLDB revealed that the financial position of HLDB was strong, as it had sufficient net current assets of Rs 10.67 crore and Rs 17.96 crore at the end of 31 March 2002 and 31 March 2003 respectively, mainly in form of deposits and investments. Further, the State Government had already entrusted all the revenue generating schemes/activities such as collection of AI fee, cess on milk, sale of milk and frozen semen, etc. to HLDB. Thus the State Government released the grant injudiciously without considering the financial position of HLDB.

## Loss of interest on irregular retention of unspent grants

Irregular retention of funds led to loss of interest **3.1.8** Financial Rules prescribe that any portion of the grant, which was not ultimately required for expenditure upon objects/schemes specified in the sanction, should be duly surrendered to sanctioning department/authority.

Release of Rs four crore to HLDB was not justified as HLDB had enough funds of their own Test-check of records of the Deputy Director, Animal Husbandry and Dairying, Hisar, revealed that the Department released grants-in-aid to the tune of Rs 14.45 crore during 1998-2002 to Haryana Agriculture University (HAU), Hisar for meeting the expenditure on salary of staff deployed for scheme "Veterinary Education and Training". Rs 1.20 crore, Rs 55.64 lakh and Rs 69.84 lakh remained unspent at the end of March 2000, 2001 and 2002 respectively and were lying unutilized with HAU. HAU neither surrendered unspent grants before the end of each financial year nor informed the department to deduct the same from future release of grants. On this being pointed out in audit, the HAU refunded (September 2003) Rs 69.84 lakh to the department. The irregular retention of unspent grant by HAU resulted in loss of interest of Rs 28.46 lakh (calculated at borrowing rates of 12 and 7 *per cent* per annum) to the Government for the period from April 2000 to September 2003.

## Programme management

For achievement of objectives of genetic improvement of milch animals, provision of feed /fodder, improvement in dairy profession and increase in milk production, various schemes were operated by the department. These sought to improve the delivery of veterinary services and included Special Livestock Breeding Programme, Cattle and Buffalo Development Programme and State Cattle Breeding Project. A review of these schemes and programmes revealed deficiencies in implementation such as delay in identification of female calves and release of inadequate feed, non-supply of superior quality pigs to pig breeders, unfruitful expenditure on salary of Veterinary Surgeons, less utilisation of Central assistance for sheep and wool development, non-achievement of targets of artificial inseminations (AIs) done in buffaloes, non-functioning of Liquid Nitrogen Gas Plants, nonimplementation of Embryo Transfer Technology Programme, decrease in milk production and inadequate feeding of the herd at Government Livestock Farm, Hisar, shortfall in production of fodder and seed at Government Livestock Farm, Hisar, non-achievement of targets of dairy development activities and non-achievement of objectives of Equine Production Centre. These are discussed below:

## Delay in identification of female calves and release of inadequate feed subsidy under Special Livestock Breeding Programme

**3.1.9** "Special Livestock Breeding Programme" (SLBP) was in operation in 13 districts of the State. The programme was aimed at improving animal health and increasing milk yield. The programme envisaged feed subsidy in kind to small/marginal farmers and to agricultural labourers at 50 and 67 *per cent* respectively of requirement for female calves upto the age of 32 months. A scrutiny of records of 3 (out of 13) districts (Ambala, Hisar and Karnal) revealed that of the 89 female calves identified in 2 districts, 68 calves (Hisar:

23; Karnal: 45) were not identified before attaining the age of 4 months as was required and the delay ranged between 4 and 15 months. Due to delay in identification, the subsidy for feed could not be provided for complete period of 29 months, which could have adversely affected their health and growth.

**Female calves were fed inadequately** Further, no feed subsidy was provided in the units test checked during 2002-04. In 2001-02 also, inadequate feed subsidy was provided. As against the requirement of 174.21 quintals of feed subsidy for 89 cases in two districts, only 65.24 quintals (37 *per cent*) were provided.

Non-maintenance of records to assess the extent of improvement in milk yield To assess the milk yield of animals reared by providing feed subsidy under the project, a register to record the yield was required to be maintained. In the districts test checked, no such register was maintained, in the absence of which extent of improvement in milk yield, if any, could not be verified in audit.

## Non-supply of superior quality pigs to pig breeders

**3.1.10** Pig being the most prolific animal, pig rearing is gaining popularity in the State especially with the landless labourers and populace in rural areas. The State had two Piggery Farms, one each at Ambala and Hisar. The main objectives of these farms were to produce pigs of Yorkshire breed and to supply them to the pig breeders on subsidized rates for breeding purposes.

Under the Centrally Sponsored Scheme, "Assistance to State for Integrated Development/Strengthening of Pig Breeding Farms," GOI sanctioned (October 1997) Rs 14 lakh for import of pigs for Haryana State and directed the State Government to send their demand of pigs indicating their breeds. In February 2000, a proposal for purchase of 46 gilts and 10 young boars was sent to GOI along with a demand draft for Rs 14 lakh towards their purchase cost. GOI advised (August 2001) the State Government to arrange import of pigs at their level as the system of centralized import by GOI had since been discontinued. The Director requested (February 2002) GOI to sanction Rs 3 lakh to meet travelling expenses for Veterinary Doctors to visit abroad for importing pigs out of scheme funds; no response was received to this request. In the mean time, GOI returned Rs 14 lakh in August 2003. Thereafter no efforts were made to import pigs and the amount was refunded to GOI in February 2004. Thus due to non-procurement of pigs by the department, superior quality of breed of pigs could not be supplied to the farms.

## Unfruitful expenditure on salary of Veterinary Surgeons

**3.1.11** Haryana Veterinary Vaccine Institute (HVVI), Hisar was set up for the production of different types of vaccine to protect livestock against the onslaught of contagious diseases and for their immunization. It was noticed that Renikhet, Swine Fever and Fowl Pox Vaccines were not produced at all since 1995. While admitting the facts, the department attributed (August 2004) non-production of Renikhet and Fowl pox vaccines for poultry

improve the local breed was not pursued by the department

Import of Pigs to

disease to preference of people for commercialised poultry products. Nonproduction of Swine fever vaccines was attributed to non-functioning of freeze dryer equipment.

Audit observed that there was hardly any work load with the four Veterinary Surgeons (VSs) posted at the Institute as of March 2004 for the production of these vaccines. These Veterinary Surgeons continued in various spells of posting at this Institute, which ranged between 17 and 72 months during the 9 years from 1995 to 2004. Thus, Rs 30.79 lakh spent on salary of the VSs during 1995-2004 were largely rendered unfruitful. The Director stated (August 2004) which was also endorsed by Government (September 2004) that these VSs were helping in standardising and testing other vaccines. The reply was not convincing because for testing of other vaccines, separate VSs were already in position.

# Less utilization of Central assistance

Out of central grant of Rs 65.52 lakh, Rs 30.03 lakh remained unspent **3.1.12** The Central Wool Development Board (CWDB), Jodhpur sanctioned (November 2001) release of Rs 65.52 lakh as grant-in-aid to HLDB for meeting expenditure for six Integrated Sheep and Wool Development Projects under Assistant Directors, Sheep and Wool Development, Hisar and Loharu. Of this amount, Rs 35.49 lakh were spent and balance of Rs 30.03 lakh remained unutilised as of January 2004.

It was noticed that the department provided facilities of sheep washing/shearing, etc. only to 28,490 sheep (9 *per cent* of target). Also the department failed to provide any financial assistance to meet transportation cost to registered flock owners to carry their produce to wool *mandies*/wool grading centres at Hisar and Loharu, as envisaged in the scheme. Similarly, training to sheep breeders to learn techniques for machine shearing was also not imparted.

Assistant Director, Sheep and Wool Development, Hisar stated (September 2004) that facilities of sheep shearing could not be provided due to non-availability of trainers and transport facilities could not be provided due to non-availability of vehicles, while Assistant Director, Sheep and Wool Development, Loharu stated that training for shearing could not be provided due to non-availability of sheep shearing machines.

# Cattle and Buffalo Development Programme

The objectives of the Cattle and Buffalo Development Programme were, *inter-alia*, to promote the livestock production in the State by improving the infrastructure for breeding facilities like artificial insemination, embryo transfer technology, strengthening of disease diagnostic laboratories, development of pack animals, *Gaushala* and *Gosadan* and reorganisation of livestock farms, etc. The State Government constituted (January 2000)

Haryana Livestock Development Board (HLDB) to exclusively implement this programme. Scheme/activity-wise deficiencies noticed in the implementation of this programme were as discussed below:

#### Non-achievement of targets of AIs done in cows/buffaloes

**3.1.13** Artificial insemination is aimed at improving the breed of cows and buffaloes with a view to achieving higher milk yield. In Haryana 2,421 Veterinary institutions undertook insemination in cows/buffaloes. The targets for calf born against AIs (viz. success rate) were not fixed by the department. The actual success rate for AIs in the State ranged between 25 and 31 *per cent* during 2001-04.

Further, targets for carrying out AI in buffaloes were not achieved in any year during 2001-04. As brought out in *Appendix XV*, the shortfall ranged between 12 and 30 *per cent* in the State. However, in three (Bhiwani, Karnal and Rohtak) of the six districts checked, the shortfall was between 12 and 49 *per cent* during the same period. The Director replied (May 2004) that shortfall was due to traditional liking of people for natural insemination by bulls on buffaloes. The reply was suggestive of the need for the department to educate rural people about the advantages/usefulness of genetic improvement of milch animals through AIs.

It was, further noticed that the essential equipments for carrying out artificial insemination, were not provided to the following Veterinary Institutions during 2001-04:

Sr.	District	Number of Veterinary	Number of institutions not provided with				
No.		institutions	Microscopes	Temperature maintenance kits			
1.	Ambala	123	123	123			
2.	Bhiwani	186	120	180			
3.	Karnal	192	60	192			
4.	Rohtak	199	NA	199			

Non-availability of essential equipments adversely affected the achievement of AI programme as out of 5.03 lakh to 6.88 lakh AIs done, the calf was born only in 1.26 lakh to 2.12 lakh cases which ranged from 25 to 31 *per cent* during 2001-04 as given in *Appendix XV*.

As laid down in the scheme, the veterinary institutions were required to maintain the record of milk yield of the improved breed of calves born out of AI when grown up as cows and buffaloes, but no such record was maintained. Hence the impact of scheme on production of milk of improved breeds could not be assessed.

#### Non-reconciliation of recovery of cost of AI straws

**3.1.14** HLDB decided (May 2000) to provide animal breeding facilities by charging fee of AI straw at Rs 15 and additional fee at the rate Rs 50 for carrying out AI at their doorsteps.

Test-check of records of three AI straw Collection Centres (Bhiwani, Karnal and Rohtak) revealed that out of 7.68 lakh AI straws received from production stations, 7.44 lakh were issued to veterinary institutions during 2001-04. The

Shortfall in achievement of targets for AI ranged between 12 and 30 *per cent* in the State

Non-providing essential equipments for AI

Non-assessment of milk yield of calf born out of AIs done Collection Centres did not maintain any record indicating the details of AI straws issued at the rate of Rs 15 or 65 each. Therefore, the amount recoverable against issue of 7.44 lakh straws was not worked out by the Centres. Reasons for the omission were not intimated. However, even at the minimum rate of Rs 15 per straw, recoverable amount against issue of 7.44 lakh straws worked out to Rs 1.12 crore against which only Rs 0.92 crore were deposited in HLDB's Accounts during 2001-04. Balance amount of Rs 0.20 crore, which would be more after taking into account the number of straws issued at the rate of Rs 65, remained non-deposited with HLDB.

The Department stated (August 2004) which was also endorsed by Government in September 2004 that wastage of 5 *per cent* was allowed. The reply was not tenable because in the absence of proper details of issuance of straws at the counter or at the door steps, the extent to which undercharge had occurred could not be worked out.

#### Non-functioning of Liquid Nitrogen Gas Plants

All the 11 liquid nitrogen gas plants were non-functional 3.1.15 Liquid Nitrogen (LN<sub>2</sub>) gas plants were required for preservation of frozen semen. In view of the policy of deep-freezing<sup>3</sup> of semen, eleven  $LN_2$ gas plants were installed in eight districts between April 1975 and February 1997. As intimated by the department, eight plants had already outlived their lives and were, hence non-functional during 2001-04. However, during 2001-04, it was also observed that remaining three plants (at Gurgaon, Narnaul and Pundri) were also non-functional for want of repairs and therefore, the production of LN<sub>2</sub> gas was nil. To meet the requirement, five Semen Bank Officers<sup>4</sup> purchased 4.27 lakh litres of LN<sub>2</sub> gas from market at a cost of Rs 53.05 lakh. Effective steps were not taken to carry out repairs/replacement of parts. Further, the department had not taken any action to dispose off the eight non-repairable/damaged plants. In Gurgaon district, Rs eight lakh spent on the salary of the operator since the year 1996 was thus In reply to audit observation, the Director stated rendered unfruitful. (May 2004) that the damaged plants could not be disposed off due to lack of technical manpower in the department. Reply was not convincing as the services of qualified engineers could have been borrowed from GOI or neighboring States, as there had already been considerable delay in the matter.

## Non-implementation of Embryo Transfer Technology Programme

Embryo Transfer Technology building could not be completed due to non-release of funds **3.1.16** Haryana Livestock Development Board released funds of Rs 1.62 crore, during 2000-03 as grants-in-aid to National *Gaushala*, Dharoli (Jind), a non-Government organisation, for construction of laboratory building and cow sheds under Embryo Transfer Technology (ETT) scheme. The infrastructure was required to be completed at a cost of Rs 4.45 crore within

<sup>&</sup>lt;sup>3</sup> Minus 196 degree centigrade.

<sup>&</sup>lt;sup>4</sup> Bhiwani, Hisar, Karnal, Narnaul and Rohtak.

two years from February 1999, the date when the *gaushala* management sent the proposal to the Director, Animal Husbandry. From the third year, embryo was to be prepared and transferred from 150 cows. Though the released grant of Rs 1.62 crore had been spent, the building was incomplete and the *gaushala* management demanded more funds. A technical committee of the department, however, recommended that further release of funds should be considered after evaluation of the progress of building work. The progress had not been evaluated so far and balance funds had not been released. Thus, embryo transfer work had not been taken up (August 2004). The Director stated (August 2004) which was also endorsed by Government in September 2004 that for evaluation of the progress of building work, joint inspection of the building by the officers of GOI and the State Government was to be carried out and funds would be released after receipt of their report. Fact remained that implementation of the programme was slow and the intended benefit of the technology could not be delivered.

## Livestock Farm at Hisar

The Farm aimed at providing fodder and feed to milch animals to increase the productivity of milk and producing good quality exotic bulls for improving the breed of milch animals.

## Decrease in milk production at Government Livestock farm at Hisar

**3.1.17** Government Livestock Farm at Hisar is divided into various sectors. A scrutiny of details of cows in milk, average lactation, birth and mortality rate, etc. in respect of cattle maintained at Sectors I and II of the farm revealed that during 2001-04 there was decrease in the milk production by 23 *per cent;* average number of cows in milk by 33 *per cent;* wet-dry ratio by 16 *per cent* in Sector I and eight *per cent* in Sector II; average lactation yield by 11 *per cent* in Sector I and 22 *per cent* in Sector II; birth rate by 38 *per cent* in Sector I; conception rate through AI by 16 *per cent* and average weight of newly born calves by two *per cent* in Sector II.

On the other hand, mortality rate and average age of first calving increased by 100 *per cent* and 22 *per cent* respectively in Sector I, resulting in decrease in milk production and increasing the infertility due to poor management.

## Inadequate feeding of herd at Livestock farm

**3.1.18** The quantities of fodder and mineral concentrate ration (MCR) required and actually provided to the milch animals under this farm

Poor management of the farm led to decrease in milk production by 23 per cent

Year	Number <sup>5</sup> of milch animals	Fodder	Fodder				Feed (MCR)			
	at year end	Requi- rement	Actually provided	Short feeding	Perce- ntage	Requi- rement	Actually provided	Short feeding	Perce- ntage	
			(in thousand quintals)							
2001-02	528	199	137	62	31	7	5	2	29	
2002-03	466	161	105	56	35	7	6	1	14	
2003-04	355	130	99	31	24	5	4	1	20	

during 2001-04 were as indicated below:

Shortfall in fodder to milch animals during 2001-04 ranged between 24 and 35 *per cent* and in feed ranged between 14 and 29 *per cent*. As analysed in audit, reasons for short feeding were less production of fodder at farms and less funds for purchase of feed. Further, it was noticed that against the target of selling 120 young bulls during 2001-04, only 73 bulls were actually sold.

# Shortfall in production of fodder and seed at Government Livestock Farm, Hisar

Decrease in fodder and seed production led to loss of Rs 2.91 crore

Government did not

provide adequate funds to meet the

requirements for

subsidv

**3.1.19** Government Livestock Farm, Hisar owned land for the purpose of providing fodder for the cattle herd maintained at the Farm. It was noticed that the cultivatable area was less sown by Sector I (897 to 1712 acre), Sector II (902 to 1705 acre) and Sector III (842 to 1218 acre) during 2001-04. The Sector Superintendents of GLF stated (July 2004) that the cultivable area decreased due to shortage of water and unfavourable wheather.

Average production of green fodder per acre decreased from 67 to 48 quintals in Sector I, 61 to 54 quintals in Sector II and 90 to 61 quintals in Sector III during 2001-04. Decrease in per acre production as well as in cultivable area led to shortfall in production of green fodder by 6.93 lakh quintals which resulted in loss of Rs 2.91 crore (calculated on the basis of rates fixed by the Market Committee).

# Non-achievement of targets of dairy development activities

**3.1.20** Dairy Development Department aims to boost the dairying profession on modern commercial lines besides providing self-employment to unemployed rural youth, to raise socio-economic status of the weaker sections of the society and to ensure the availability of quality dairy products. The State Government provided self-employment opportunities to educated unemployed youth of the State through the establishment of 10/5/3 milch animals dairy units and also arranged their training for the establishment of such units. The scheme envisaged providing subsidy to unemployed youth. Targets

5

Information supplied by State Cattle Breeding Project, Hisar.

Particular	Year	Milch A	Animals Dai	ry units	Total
		10	5	3	
Targets	2001-02	1,440	600	780	2,820
	2002-03	4,030	2,860	3,910	10,800
	2003-04	650	500	750	1,900
Achievements	2001-02	1,314	965	537	2,816
	2002-03	2,538	2,470	3,113	8,121
	2003-04	814	398	886	2,098
Number of animals	2001-02	13,140	4,825	1,611	19,576
required	2002-03	25,380	12,350	9,339	47,069
_	2003-04	8,140	1,990	2,658	12,788
Number of animals	2001-02	8,925	3.062	1,102	13,089
available	2002-03	16,660	7,911	6,069	30,640
	2003-04	6,830	1,762	1,919	10,511

and actual achievements during 2001-04 were as under:

The Financial Commissioner and Principal Secretary, Dairy Development Department, revised the targets of 2,820 dairy units in 2001-02 to 10,800 dairy units in 2002-03 with a view to get additional funds sanctioned under the scheme to provide self-employment to more persons but no additional funds were provided by the Government. Considering the financial constraints experienced in 2002-03, the department drastically reduced the targets to 1,900 dairy units from 12,000 units initially proposed for 2003-04. Inadequate provision of funds led to lesser self-employment opportunities for educated youth. There was thus a need for the Government to provide funds proportionate to the requirements as per targets.

## Non-achievement of objectives of Equine Production Centre

3.1.21 The State Government introduced a scheme "Establishment of Equine Production Centre at Hisar" in April 2000 with the objectives of production of thoroughbred and race horses, mule production, grading up of local breed of donkeys, disease control and surveillance over important equine diseases, inspection of stud farms, to educate farmers engaged in equine production and promoting the sale of thoroughbred horses in national and international markets. The Government sanctioned (April 2000) one post of Project Director and 10 supporting staff by diverting them from redundant schemes. The department spent Rs 13.24 lakh on the project, of which Rs 7.83 lakh were on pay and allowances of staff during 2000-03 and balance on purchase of a car (Rs 3.57 lakh) and for meeting contingent expenditure. Department stated (August 2004) which was also endorsed by Government in September 2004 that the Project Director was providing technical know-how to the breeders for the improvement of equine breed in the State. Thus, as admitted by the department, the Centre confined its activities only to providing technical know-how to horse breeders. Activities like production of thoroughbred and race horses and mule production at the centre were not taken up. As such, the objectives of the centre were not achieved fully.

Objectives were not achieved fully as production of thoroughbred/race horses and mules not taken up

## Personnel management

Codal provisions provide that the department should follow a sound system for determination of manpower requirement, their regulations and their efficient and effective utilization. A periodical review should be conducted to compute manpower needs and to watch whether the sanctioned manpower is utilized for the purpose it was sanctioned. Scrutiny of records revealed improper deployment of staff, posting of staff over and above the sanctioned strength and irregular drawal of salaries of staff as brought out hereunder:

## Improper deployment of staff

**3.1.22** Chief Secretary to Government of Haryana imposed (December 1996) a total ban on change of headquarter of the employees, as it was another way of effecting a transfer.

In 28 offices (DDOs) of the districts test checked, salaries of 162 officials were drawn by these offices under orders of the Director, Animal Husbandry though the officials were posted in other offices of the department in violation of instructions issued by the Government. The period of posting of such employees in other offices ranged between 5 and 129 months as indicated in *Appendix XVI*. Such adjustments were tantamount to extending undue favour to the concerned officials.

## Posting of staff over and above the sanctioned strength

**3.1.23** Haryana Veterinary Training Institute (HVTI) was established at Hisar in May 2001. The State Government had neither sanctioned the staff for running the Institute nor provided budget for the years 2001-03. The State Government sanctioned (March 2003) 11 posts (Principal: 1, Lecturers/VS: 4; Others: 6) and deployed 7 officers/officials (Principal: 1; Lecturers: 3; Others: 3). Besides the service of 19 employees (Demonstrators: 4; Clerks: 2; Driver: 1; Class IV: 12) who were working in other offices of the department were placed at the disposal of Institute during 2001-04 over and above the sanctioned strength though their salary was drawn from their parent offices. This resulted not only in irregular payment of salary of Rs 19.65 lakh but also affected the working of the offices from where they were diverted. The Department stated (August 2004) which was also endorsed by Government in September 2004 that services of these officials were utilized by giving them additional charge. The reply was not acceptable as five of these employees were deployed from outstations while other employees, though from the same station (Hisar), were adjusted exclusively at the Institute.

# Irregular drawal of salaries of staff

**3.1.24** Against requirement of 697 posts of different categories in HLDB, the State Government sanctioned and placed the services of only 316 officers/officials on deputation with HLDB. HLDB had not submitted any proposal for sanction of some additional posts along with their justification for carrying out the activities smoothly. In the test checked offices, 177 employees had been carrying the activities of HLDB though their salary to the

162 officials were drawing salary from the offices other than the offices of their deployment tune of Rs 5.85 crore was drawn from the Government account instead of transferring the liability to HLDB.

# Internal audit

3.1.25 With a view to improve overall quality of work, reduce errors/ omissions and irregularities, the State Government introduced the system of internal audit. Two posts of Accounts Officers (AO) and two posts of Section Officers (SO) were sanctioned for the department. The department posted one AO and one SO each at Directorate and Government Livestock Farm (GLF), Hisar and vested drawing and disbursing powers in AOs. Internal audit, however, was not conducted during 2001-03. The Director issued (September 2003) instructions for conducting internal audit in compliance to PAC's observations on a paragraph of the Comptroller and Auditor General of India's Report - Civil - Government of Haryana for the year ended March 1998. The staff posted at Hisar conducted (between November 2003 and February 2004) internal audit of only five offices covering the period upto October 2003-January 2004 for which Inspection Reports were still (April 2004) in processing stage. Thus internal audit was not at all effective, as it had covered only 5 (out of 93) offices during 2001-04.

# Monitoring and evaluation

**3.1.26** The Director was responsible for monitoring and evaluation of the implementation of programmes, schemes and other activities of the department. Monthly progress reports of each scheme/programme were submitted to the Directorate by the controlling officers at district level which were merely compiled and no corrective steps/measures to improve the working of the department and to achieve the targets fixed were taken. Though the Secretary as well as the Director held meetings with the field staff to review and monitor the schemes/programmes, no fruitful results were achieved.

No evaluation of schemes/programmes was done. Shortfalls in artificial insemination, non-functioning of  $LN_2$  gas plants, non-fulfillment of aims in equine production centre and non-implementation of embryo transfer technology showed lack of monitoring and evaluation. The audit review of the functioning of the Animal Husbandry and Dairying Department revealed that the effectiveness of several schemes had suffered for want of adequate monitoring at various levels.

# Conclusions

**3.1.27** The programme for livestock breeding was not implemented effectively, as there was considerable shortfall in artificial insemination of

buffaloes, conception age of calves and mortality among calves increased, while milk production during the last three years declined. Budget proposals were not prepared in accordance with codal requirements. Progress of expenditure was not monitored effectively, as there was rush of expenditure in March every year. 'Import of pigs' scheme to improve the local breed was not implemented. Of the 11  $LN_2$  gas Plants, none was functional. Average production of green fodder decreased and cultivable area was less sown in all the three sectors of GLF, Hisar. All these deficiencies are indicative of inefficient management and inadequate monitoring.

## Recommendations

**3.1.28** Government should ensure that the department formulates schemes/ programmes after keeping in mind the provision of funds so as to complete the schemes within the specific time frame;

> Adequate feed subsidy in kind should be provided to small and marginal farmers for improving animal health and increasing milk yield. Government should make adequate provision of funds for subsidy for self-employment to educated unemployed youth for establishing dairy units;

 $\succ$  The department should gear up efforts to educate rural people about the benefits of artificial insemination of cattle for genetic improvement and provide essential equipments for AI in Veterinary Institutions.

➢ Government should ensure compliance from the department to implement Government decision on ban on change of headquarters of employees.

These points were referred to Government in July 2004: their reply to the points received (September 2004) had been incorporated.

# **Public Works Department**

# (Public Health Branch)

# 3.2 Sewerage and Sanitation Schemes including Yamuna Action Plan

# Highlights

Objectives of Sewerage and Sanitation Schemes including Yamuna Action Plan (YAP), implemented by Public Health Department, were to provide hygienic sanitation facilities to the public and to reduce water pollution in rivers/canals, etc. While the department already had 25 ongoing sewerage and sanitation schemes in hand as of March 1999, 60 new schemes were also taken up during 1999-2004, but none of these had been completed. Time schedule for completion of works was not fixed and funds were not released by Government, which resulted in non-completion of sewerage schemes. This led to spread of unhygienic conditions due to discharge of untreated sewage in the open. Audit noticed non-functional and underutilised sewerage schemes, which led to unfruitful expenditure while sewerage facilities were provided to only ten per cent of the population of Ambala City. Scrutiny of records relating to YAP revealed lack of planning for sewage treatment, partial completion/underutilisation of sewage treatment plants (STP), nonmaintenance of prescribed standards in treatment of effluent, non-laying of internal sewer lines/drains to link interception and diversion sewers, construction of oxidation ponds without ensuring disposal of treated effluent, underutilisation of structures, construction of toilet units in unidentified areas, All these factors led to non-achievement of goals of reducing water etc. pollution in rivers/canals and providing hygienic sanitary conditions.

# • Out of total 749.15 MLD sewage generated in the entire State, only 254.50 MLD sewage (34 *per cent*) was treated.

(Paragraph 3.2.20)

• Public Health Department did not complete any of the 85 schemes, of which 25 were more than 5 years old. No time frame was fixed for their completion.

(Paragraph 3.2.10)

• Expenditure of Rs. 2.64 crore on construction of Interception and Diversion sewer in Gurgaon was rendered unfruitful because of non-construction of internal sewer lines for connecting it.

(Paragraph 3.2.24)

• Treated effluent from Sewage Treatment plant, Yamunanagar constructed at a cost of Rs 9.02 crore, was discharged into Western Jamuna Canal irregularly, contaminating the drinking water, as arrangements for a separate channel to carry the treated effluents were not made.

(Paragraph 3.2.27)

• Treated water of oxidation pond, constructed at a cost of Rs 1.06 crore at Karnal, was discharged in low lying area near the plant, without making arrangement for its disposal.

(Paragraph 3.2.25)

• In four towns, surface drains were laid at a cost of Rs 1.67 crore without making arrangement for funds/land for disposal works for treated effluent, which rendered the expenditure unfruitful.

(Paragraph 3.2.11)

• Sewerage schemes completed at a cost of Rs 1.09 crore in three villages in Hisar District were non-functional because the villagers did not come forward to obtain sewerage connections.

(Paragraph 3.2.15)

• Rs 13.74 crore were outstanding against Haryana Urban Development Authority on account of proportionate maintenance charges of STPs.

(Paragraph 3.2.9)

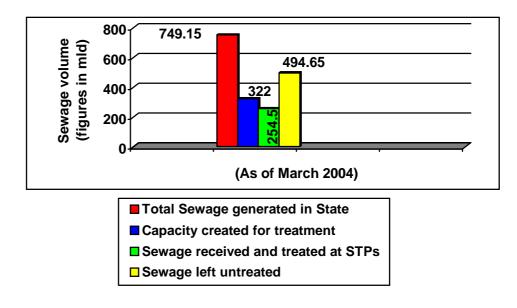
## Introduction

**3.2.1** Safe water supply and hygienic sanitation facilities are basic essential amenities required for a community for healthy living. About 80 *per cent* of water used by the community comes out of houses in the form of waste water which, unless properly collected, conveyed, treated and safely disposed off,

may eventually pollute the precious water resources and cause environmental degradation. Out of 68 towns in Haryana, 22 towns did not have any sewerage facility; and even in the remaining 46 towns, the percentage area covered with sewerage systems ranged from 15 to 60. With the augmentation of drinking water supply schemes in rural areas, the generation of waste water had increased manifold which created insanitary conditions resulting thereby in growth of diseases. State Government had approved rural drainage/sewerage programme in selected villages. In order to reduce pollution load in river Yamuna, six towns in the State, which were directly or indirectly discharging their effluents into river Yamuna, were covered under Yamuna Action Plan (YAP) as a part of Phase-II (started from May 1994) of Ganga Action Plan for sewage treatment facilities. Six more towns were included from February 1996 in the scheme as per the direction of the Supreme Court.

To provide hygienic sanitation facilities, the State Government had sanctioned 60 new sewerage schemes during 1999-2004 at an estimated cost of Rs 107.69 crore in addition to 25 ongoing schemes. None of these 85 schemes had been completed so far (March 2004).

To reduce pollution load in Yamuna river, a project at an estimated cost of Rs 232.20 crore was under execution for providing 18 sewage treatment plants (STPs) in 12 towns identified under the scheme. As of March 2004 of the 749.15 mld<sup>1</sup> sewage generated in 83 towns of the State, 494.65 mld sewage was left untreated. Capacity of 17 STPs for treating 322 mld sewage was not fully utilized as only 254.5 mld sewage could be treated as indicated in the graph below:



#### Generation and treatment of sewage in the State

<sup>&</sup>lt;sup>1</sup> Mld: Million litres per day.

## Programme objectives

**3.2.2** Objective of Sewerage and Sanitation Schemes was to provide hygienic sanitation facilities to the public by providing sewerage system in various towns.

Yamuna Action Plan was a Centrally sponsored scheme, aimed at reducing pollution load in Yamuna river, which is the main source of water supply in Delhi and some parts of Haryana, by providing sewage treatment plants in twelve towns identified under the scheme.

## Organizational set up

**3.2.3** For the formulation of policies/schemes relating to sewerage and sanitation and for monitoring their implementation, the State Government constituted (1967) Haryana State Sanitary Board (HSSB), which was comprised of 19 members with the Public Health Minister as its President. Financial Commissioner and Secretary to Government of Haryana, Public Health Department was administrative head at Government level and was responsible for implementation of policy decisions, programmes and schemes, etc. The Engineer-in-Chief (EIC), Public Works Department, Public Health Branch, Panchkula was over all incharge of the schemes and was assisted by 12 Superintending Engineers (SEs) and 43 Executive Engineers (EEs) in the field for execution of works. One SE and four EEs were exclusively dealing with the works relating to YAP.

## Audit objectives

**3.2.4** Main objective of the audit review was to evaluate the performance in providing hygienic sanitation facilities through the schemes implemented. Audit also assessed the achievement in reduction of water pollution levels in river Yamuna, a source of irrigation/drinking water for large population. For this purpose, following parameters were adopted in audit:

- Achievement of targets for completion of works relating to sewerage;
- Execution of works within a time frame;
- Proper functioning of sewerage system laid under various schemes;
- Reduction in pollution level in Yamuna river caused through domestic waste and industrial effluents; and
- Functioning of sewage treatment plants under YAP.

#### Audit coverage

**3.2.5** Records relating to sewerage and sanitation schemes and YAP works for the period from 1999-2004 in the offices of the HSSB, EIC, Public Works Department, Public Health Branch and  $13^2$  Public Health Divisions (out of 43) were test checked during October 2003 to May 2004.

Criteria for selection of divisions for test-check of records for sewerage and sanitation schemes was to ensure coverage of towns from each of the four commissionerates in the State and quantum of sewerage generated in various towns. For Yamuna Action Plan, all the divisions, which executed works under the scheme, were covered in Audit.

## Funding pattern

**3.2.6** Under sewerage schemes, five *per cent* of the total expenditure was to be borne by the concerned Municipal Committees (MCs) and balance 95 *per cent* out of loans and grants (loans: 60 *per cent* and grant: 40 *per cent*) released by the State Government on the basis of proposals/ recommendations of HSSB. After release of funds by State Government, the concerned MCs were required to prepare contingent bills, duly countersigned by SE, PH (exofficio Member Secretary of the HSSB) for presentation at the treasury and for their credit to the Public Works Deposit Account (PWDA). Under Centrally sponsored YAP, while entire expenditure for execution of new work was funded by GOI, expenditure for operation and maintenance of assets was met by the State Government. GOI sanctioned funds on the basis of detailed project reports (DPRs) approved by National River Conservation Directorate (NRCD), Ministry of Environment and Forests.

#### Financial outlay and expenditure

Year	Budget prov	vision	Expenditure (Acc	ount	Expenditure (Dep	Expenditure (Department		
			figures)		figures)			
			(Rupees in	crore)				
	Sewerage and	YAP	Sewerage and sanitation	8		YAP		
	sanitation							
1999-2000	5.27	13.27	6.54	14.82	8.34	13.68		
2000-2001	5.20	15.50	5.20	15.50	5.87	7.29		
2001-2002	7.20	36.50	6.03	-	4.96	30.69		
2002-2003	11.30	3.50	15.51	7.61	14.27	1.18		
2003-2004	3.00	5.67	4.96	5.67	12.01	1.62		
Total	31.97	74.44	38.24	43.60	45.45	54.46		

**3.2.7** Budget provision and expenditure during 1999-2004 for sewerage and sanitation schemes and YAP were as detailed below:

<sup>&</sup>lt;sup>2</sup> Kurukshetra, Hisar-I, Tosham, Yamunanagar-I, Panipat –II, Sirsa-I, Hansi, D&P Sonipat, Ambala Cantt, Gurgaon, Faridabad-II, Bhiwani-I and Dabwali.

	As evident from above table, against the budget provision of Rs 31.97 crore on sewerage and sanitation schemes, expenditure was Rs 45.45 crore. The variation in expenditure figure as per accounts and department were mainly because of the fact that the expenditure in Accounts books was booked on the basis of drawal of funds from the treasury by the EEs while the departmental figures were based on actual utilization of funds out of those drawn from treasuries, Civil Deposit Account and from direct releases made through bank drafts to the EIC, YAP directly by GOI.
	Under YAP, against budget provision of Rs 74.44 crore, actual expenditure was Rs 54.46 crore. During 2001-02, expenditure as per accounts figures was 'nil' while the department reflected the expenditure as Rs 30.69 crore because GOI released Rs 23 crore through bank draft direct to the EIC, Haryana (not routed through state budget) and balance expenditure was met from available funds in PWDA.
	It was observed that Municipal Committees did not repay the loan and also did not pay their share of contribution and Haryana Urban Development Authority did not deposit the proportionate charges of sewage treatment plants in their area in Gurgaon town as discussed below:
	Non-recovery of loans and non-contribution of share by MCs
MCs did not repay the loans to Government	<b>3.2.8</b> As per conditions of loans sanctioned to the Municipal Council/ Committees (MCs), the loan was to be repaid in 30 equal annual instalments and the recovery (principal and interest) was to start one year after its drawal. In case the payment of instalment was not made on due dates, compound interest at prescribed rate of 12 <i>per cent</i> was chargeable. It was, however, noticed that recoveries were not made regularly and Rs. 35.42 crore (including interest of Rs. 12.37 crore) had accumulated at the end of 2003-04. The Director, Urban Estates did not maintain details of amounts and the period for which the recoveries were outstanding. On being asked in audit, the Director stated (August 2004), that the details were being ascertained from MCs.
MCs did not contribute the prescribed share for schemes	Besides, the MCs were required to share five <i>per cent</i> of the total expenditure on sanitation and sewerage schemes. During 1999-2004, Rs 2.27 crore fell due for recovery on this account against which the MCs had not paid any amount. These aspects were earlier commented vide paragraph 4.1.8 of the Comptroller and Auditor General of India's Report (Civil), Government of Haryana for the year ended 31 March 1998. The Public Accounts Committee (PAC) in March 2003 recommended that the matter regarding realisation of arrears of contribution and loan amount from the Municipalities be taken up with the Government for early settlement. No action on these recommendations had been taken so far (June 2004).
	Recoverable amount from HUDA
Rs 13.74 crore were	

Rs 13.74 crore were outstanding on account of proportionate maintenance charges

**3.2.9** Under YAP, STPs were constructed in various towns. Sewage from HUDA's area in these towns except Gurgaon (where HUDA had its own STP) was also diverted to these STPs.

It was noticed that Rs 13.74 crore for the periods between 1977-78 and 2003-04 remained unrecovered as of March 2004 from HUDA in six towns<sup>3</sup> on account of proportionate maintenance charges of STPs based on sewage generated in HUDA and other areas.

#### Sewerage and sanitation schemes

**3.2.10** For providing hygienic sanitation facilities and ensuring safe supply of drinking water, the State Government and HSSB took up several sewerage and sanitation schemes. During 1999-2004, 60 new schemes were taken up besides 25 ongoing schemes, which were already under implementation prior to April 1999. None of these schemes had been completed till date (March 2004). Rupees 12.92 crore had been spent on 25 schemes, which were more than 5 years old.

A review in audit revealed absence of any time limit for completion of each scheme in the administrative approvals and non-release of funds by the Government; this resulted in non-completion of schemes. The review also brought out improper planning, non-completion of sewerage schemes, avoidable/extra expenditure, spread of unhygienic conditions due to discharge of untreated sewage water in open, non-functioning/under utilization of sewerage schemes, non-providing of sewage facilities in Ambala City and execution of works without obtaining technical sanctions to cost estimates. Such irregularities were being repeated time and again by the department. These points are discussed in the following paragraphs:

## Improper planning

#### Non-completion of sewerage schemes

**3.2.11** The HSSB approved four schemes for providing sewerage facilities in Narnaund, Bawani Khera, Loharu and Siwani towns during August 1997 to July 1999. The schemes provided laying of sewer line, construction of screening chamber, collection tanks, pump chamber, etc. for disposal works. As provided in GOI's Sewage and Sewerage Manual, the sewerage work should begin from the final disposal points going backwards. Contrary to this, in several cases, the works relating to sewer lines were being completed first and the works for disposal of sewage were being either completed later or left incomplete. Almost all the divisions were repeating this practice. Details of four such schemes where sewer lines were laid but disposal works were

3

Public Health Department did not complete any of the 85 sewerage and sanitation schemes

Sewerage works taken up without

making arrangement

for disposal works

Faridabad: Rs 10.37 crore; Jind: Rs 1.31 crore; Panipat: Rs 0.81 crore; Sonipat: Rs 0.58 crore; Karnal: Rs 0.57 crore and Yamunanagar: Rs 0.10 crore.

Sr. No.	Name of scheme	Estimated cost/date of sanction	Date of start	Date of completion of sewer lines	Quantum of sewage (MLD)	Upto date expenditure on completion	Remarks
		(Rs in lakh)				(Rs in lakh)	
1.	Sewerage scheme at Narnaund	65.00 July 1999	May 2000	December 2002	1.13	39.41	Due to non- availability of land.
2.	Sewerage scheme at Bawani Khera	85.00 January 1998	June 1998	December 2002	1.35	35.94	Due to change in the site of disposal works.
3.	Surface drain with intercepting outfall sewer at Loharu	60.50 August 1997	July 1999	March 2001	1.36	32.57	Due to non- availability of funds.
4.	Surface drain with intercepting outfall sewer at Siwani.	70.00 January 1999	March 1999	December 2002	1.31	58.97	Due to non- availability of funds.
	Total	280.50			5.15	166.89	

not completed were as under:

Thus taking up of works of sewer lines without ensuring availability of land and funds for disposal works, Rs 1.67 crore spent on laying of surface drains and sewer lines were rendered unfruitful.

#### Avoidable expenditure due to injudicious planning

Improper planning resulting in extra expenditure of Rs 65.60 lakh **3.2.12** At Hisar, RCC sewer pipeline of 24" dia laid in Patel Nagar area along Kaimri Road was damaged during 1989. For pumping of sewer water, the Public Health Division set up a temporary pumping station in October 1989. In November 1998, another 16"dia RCC pipe was also damaged at different stretches and therefore another temporary pumping station was set up for pumping the water. To replace the existing damaged sewer of 16" dia with 24"dia, HSSB approved (May 2000) an estimate for Rs 1.18 crore, which included Rs 72.45 lakh for laying new parallel pipeline of 24" dia in the damaged portion. The work for replacing only damaged sewer was awarded as late as in December 2002 to an agency at an estimated cost of Rs 4.65 lakh i.e after 2 years and 7 months of Board's approval. Balance work for laying new parallel pipeline of 24" dia had not yet been awarded.

However, the division incurred an expenditure of Rs.65.60 lakh from October 1989 and November 1998 to October 2003 on running of temporary pump houses whereas approximately Rs 6 lakh only were required to repair the damaged portion.

Thus due to injudicious planning in fixing priorities for execution of works, the division had incurred an avoidable expenditure of Rs 65.60 lakh on running temporary pump houses. The concerned EE stated (November 2003) that due to tight position of funds it was not possible to take up the project. The reply was not tenable, as Rupees six lakh approximately were required to replace the damaged RCC pipeline.

#### Extra expenditure due to improper planning

Additional work of storm sewer had to be executed due to improper planning **3.2.13** To provide storm water sewer in Sirsa Town, State Government approved an estimate for Rs 3 crore in February 1996. The work was started in 1996 and after incurring an expenditure of Rs 1.34 crore upto 1998-99, it

came to notice that the newly designed sewer and the existing sewer crossed each other at two places because of which, it was not possible to lay the sewer any further as the levels did not permit. It was proposed to change the alignment of the new sewer by constructing an additional 2050 ft. 54" dia brick circular storm water sewer, to make the already laid/being laid sewer functional. The additional storm water sewer was got constructed (May 2003) by spending Rs 51.21 lakh.

During audit it was noticed that position/location of existing sewer already laid was on record of the department but the same was not taken into account while obtaining approval of the storm water sewer scheme.

Thus, due to non-assessing the levels and position of existing sewer, an extra expenditure of Rs 51.21 lakh had to be incurred.

# Spread of unhygienic conditions due to discharge of untreated sewage in open

Untreated sewage discharged in Halluwas Minor caused loss of crops besides contaminating drinking water **3.2.14** Design standards to be adopted for drainage/sewerage systems issued by Chief Engineer, PWD, Public Health Branch provided *inter-alia* that method of treatment or disposal of sewage should be decided at the stage of preparing the project instead of after the completion of the scheme and the sullage carrier should be so designed as to command sufficient area of land required for broad irrigation. In Bhiwani, the untreated sewage of the town was discharged into Halluwas Minor from where it flows into open fields of the village causing extensive damage to the standing crops over 265 acre land besides contaminating the drinking water and death of livestock. The EE, Bhiwani intimated (August 2004) that farmers had submitted simple application for compensation (no amount indicated) to Deputy Commissioner, Bhiwani. The Department, however, sent a case (May 2004) to the State Government for a claim of Rs 1.07 lakh to which decision was awaited (August 2004).



Agricultural land at village Halluwas rendered uncultivable as a result of sewage discharge in open fields



# Polluted drinking water of a well unfit for human consumption due to mixing of sewage water in village Halluwas

The EE further stated (August 2004) that a proposal for acquiring 101 acres land for discharging sewage water was sent to the Government which was not approved due to paucity of funds.

Thus failure of the department in making proper arrangements for disposal of untreated sewage had resulted in damage of crops, pollution of drinking water and death of livestock in the village.

## Non-functional sewerage scheme

**3.2.15** Public Health Division-1, Hisar completed (March 1997 to March 1998) schemes for providing sewerage facilities in 3 villages (Sadal Pur, Siswal and Arya Nagar) in Hisar district at a cost of Rs 1.09 crore. The scheme envisaged that water supply level in these villages would be raised to  $110 \text{ LPCD}^4$  for proper working of sewerage system.

However, no villager had come forward to obtain sewerage connection till date (October 2003) because of pre-condition of security deposit of Rs 1,000 and thereafter recurring charges of Rs 5 per month per connection. The village *Sarpanch*, Sadalpur also pointed out (July 2002) to the concerned division that sewerage lines had got damaged or choked. Further, water supply level in these villages had not been raised to 110 LPCD, as projected in the schemes.

Thus, sewerage schemes had been non-functional, as the sewerage lines had got damaged. The failure of the department to carry out survey to identify the prospective beneficiaries, motivating the villagers to derive the benefits of the scheme and in raising water supply level had resulted in unfruitful expenditure of Rs 1.09 crore.

Sewerage scheme remained nonfunctional due to lack of motivation of villagers

Litre Per Capita Per Day.

#### Underutilisation of sewerage scheme

Negligible utilisation of sewerage scheme

completed, though

conceived 20 years

back

**3.2.16** An underground sewerage system in Rania town (District Sirsa) was completed in March 2003 at a cost of Rs 77.07 lakh. The scheme was designed for population of 37,000, projected upto 2020. The population of the town was 20,938 as per 2001 census.

It was noticed that only 14 sewer connections were released up to December 2003 and target of releasing one more connection was fixed for the year 2003-04. Thus the benefit of the scheme was derived by about  $98^5$  persons only, resulting in under utilization of the facility for which the department had not intimated the reasons.

## Non-providing of sewerage facilities in Ambala City

**3.2.17** To provide sewerage facilities to about 1.69 lakh population of Ambala Sewerage scheme not City, HSSB approved (June 1984) a scheme for laying of sewer lines, intercepting sewer, construction of disposal works, rising main and pumping machinery with cost estimate for Rs 3.43 crore, which was revised to Rs 5.26 crore in May 1987 due to cost escalation.

> However, Public Health Division, Ambala Cantt. after spending Rs 28.12 lakh stopped the work in March 1998 because of considerable rise in water table in the area causing slushy conditions. The sewer lines could not be laid so far (March 2004).

> Though this situation came to the notice of the department in December 1989, no alternate strategy was adopted to provide sewerage facilities. However, in September 2002, EE, PH Division, Ambala submitted a different detailed project report to EIC, Public Health, for providing sewerage facilities, which included provision for dewatering, plugging, pumping, etc. which had not yet been approved (April 2004).

> The Department could provide sewerage facilities to only about ten per cent of population of the city and for the remaining population, these facilities had not been provided even after 20 years of approval of initial estimates.

## Works executed without technical sanction/preparation of cost estimates

3.2.18 Public Works Department Code lays down that no work shall commence unless a properly detailed design and estimate is sanctioned by the competent authority. The department undertook execution of 28 works in 10 (out of 13) test checked divisions involving an expenditure of Rs 11.51 crore during 1999-2004 after these were administratively approved by the State Sanitary Board. However, technical sanctions to the detailed cost estimates for these works were not obtained from EIC/SE.

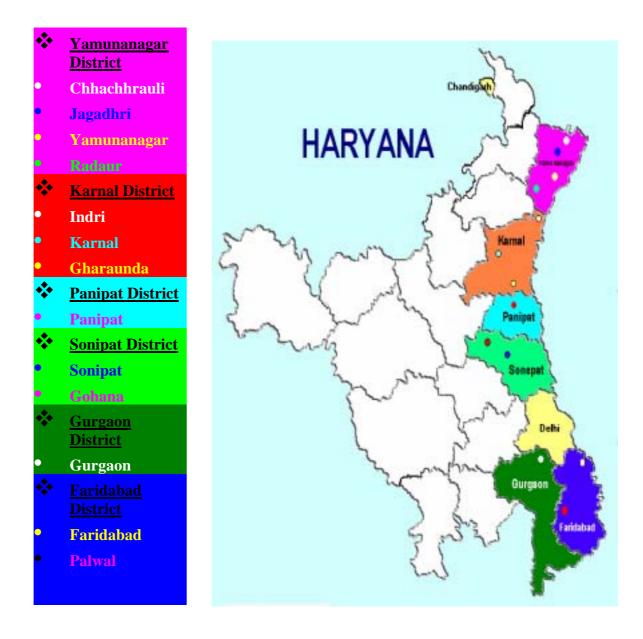
<sup>5</sup> 

<sup>14</sup> families comprising 7 persons each.

# Yamuna Action Plan

**3.2.19** To reduce pollution load in Yamuna river, which is the main source of water supply to Delhi and some parts in Haryana, Yamuna Action Plan (YAP) was started as part of Phase II of Centrally sponsored Ganga Action Plan started from May 1994. The scheme covered  $12^6$  towns of the State as shown in the map below:

# Location of 12 towns under YAP



A project at an estimated cost of Rs 232.20 crore was under execution for providing 18 Sewage Treatment Plants (STPs) in  $12^7$  towns in Haryana,

<sup>&</sup>lt;sup>6</sup> Yamunanagar includes Jagadhari town also.

<sup>&</sup>lt;sup>7</sup> Yamunnagar, Karnal, Panipat, Sonipat, Faridabad, Gurgaon, Chhachhrauli, Radaur, Indri, Gharaunda, Palwal and Gohana.

besides works of laying internal and trunk sewer to enable disposal of sewage and waste water, interception and diversion of sewage water, low cost sanitation, construction of electric crematorium and river-front development.

Scrutiny of records revealed lack of planning for sewage treatment, partial completion/under-utilisation of STPs, non-maintenance of prescribed standards in treatment of effluent, non-laying of internal sewer lines/drains to link interception and diversion sewers, construction of oxidation ponds without ensuring disposal of treated effluent, under-utilisation of mechanical structures, construction of toilet units in unidentified areas, etc. as brought out in the following paragraphs:

#### Two-third of the sewage generated in the State was not treated

**3.2.20** Sewage Treatment Plants of 322 MLD capacity were constructed under YAP in 12 towns against which quantum of sewage received was 254.50 MLD, whereas the level of sewage in these towns was 419 MLD as of 2002-03. Thus, 164.50 MLD sewage was going untreated into the Yamuna river as shown below:

Sr. No.	Name of town	Present level of sewage generated	Capacity created	Sewage received in the STPs	Quantum of untreated sewage
			(MLD)		
1	Yamunanagar/ Jagadhari (2)	40	35	29	11
2	Karnal (2)	50	48	38	12
3	Faridabad (3)	205	115	76	129
4	Panipat (2)	45	45	45	-
5	Sonipat	30	30	30	-
6	Gurgaon	30	30	30	-
7	Chhachhrauli	1	1	-	1
8	Radaur	1	1	-	1
9	Indri	1.50	1.50	-	1.50
10	Gharaunda	3	3	3	-
11	Palwal	9	9	-	9
12	Gohana (2)	3.50	3.50	3.50	-
	Total	419	322	254.50	164.50

Note:- Figures within bracket indicate the number of STPs in the town.

Besides this, 91.50 MLD sewage of 10 other towns (not covered under YAP) was going untreated into Yamuna system for which no remedial measures were initiated by the department except in two towns (where STPs were under construction) as shown under:

Sr.No.	Name of towns	Sewage generated (MLD)	Remarks
1	Samalkha	4.00	
2	Shahbad	6.00	
3	Hodel	4.50	
4	Jhajjar	5.00	STP under construction
5	Ganaur	3.50	
6	Ladwa	4.00	
7	Nilokheri	3.00	
8	Taravari	3.00	
9	Bahadurgarh	8.50	STP under construction
10	Rohtak	50.00	
	Total	91.50	

Only 34 *per cent* of total sewage was treated in the State

Besides, Haryana Urban Development Authority (HUDA) at Panchkula was maintaining a sewage treatment plant. Panchkula town generated 54 MLD sewage but the details of treated sewage were not intimated by HUDA.

The department replied that pre-feasibility reports of these 10 towns were submitted to NRCD for approval, which was awaited.

In the remaining 59 towns in the State, 184.65 MLD sewage was generated but no sewage treatment system existed as no scheme had been approved for the purpose so far. Untreated sewage of these towns was being disposed off into fields/open drains causing environmental hazards.

Thus, in the State, of 749.15 MLD sewage generated as of March 2004, 494.65 MLD of sewage had been going untreated in open areas/drains.

## Underutilisation of Sewage Treatment Plants

**3.2.21** In Haryana, Yamuna Action Plan covers various towns including Faridabad. The waste water from Faridabad town was discharged into *nalas*, drains, (which ultimately reach river Yamuna) becoming the main cause of water pollution in the river. In order to prevent pollution of river in Faridabad area, GOI administratively approved (November 1993) a scheme, estimating the quantum of total sewage as 108.5 MLD, for construction of three STPs of 20 MLD, 45 MLD and 50 MLD capacity. The work of these STPs was completed between August 1998 and March 1999 at a cost of Rs 51.27 crore. However, 50 to 65 MLD sewage going untreated into Yamuna River through Movai Drain, Buria Nala and storm drains escaped the estimates and were not included while preparing detailed project reports.



STPs were underutilised due to ill planning in sewage management



# Movai drain meeting points of Box and RCC Circular Sewer carrying raw sewage which remained to be diverted to STP

It was noticed that all the three STPs never ran to their installed capacity due to less flow of sewage. Zone wise position of inflow of sewage as on December 2003 was as under:

Sr. No.	Installed capacity	Sewage received	Shortage	Percentage of capacity
Zone 1	20 MLD	16 MLD	4 MLD	80
Zone II	45 MLD	25 MLD	20 MLD	56
Zone III	50 MLD	35 MLD	15 MLD	70
Total	115 MLD	76 MLD	39	66

Thus, the STPs were running below their installed capacity. The reasons for receipt of less sewage were large number of sewers getting chocked and outfall sewer of many colonies and HUDA not being connected with the main system. Thus STPs remained underutilized and defeated the very purpose of the scheme as the raw sewage was still being discharged into drains, which ultimately polluted river Yamuna. It was also noticed that no sewage from the initially planned area was going to STP for Zone – I. To utilise the STP of Zone – I, the discharge from Buria Nala and Movai Drain was temporarily diverted to STP – I and thus the STP – I was receiving 16 MLD sewage.

The EE stated (March 2004) that Municipal Corporation, Faridabad had connected the blocked sewers with these drains. The fact remained that the department failed to get the choked sewers cleared/repaired for running the system successfully.

## Discharge standards in Sewage Treatment Plants not maintained

Effluent treated in STPs was not within prescribed standards **3.2.22** The discharge standards for the treated effluent were biochemical oxygen demand (BOD) 30 mg/l and Total Suspended Solids (TSS) 50 mg/l as per YAP standards. Test reports of Central Pollution Control Board revealed that the working of 50 MLD, STP, Zone III at Faridabad and 30 MLD, STP at

Name of ST	<b>P</b>	Levels of treated effluent							
		January 2003	June 2003	November 2003	December 2003	January 2004			
			(Mg/l)						
50 MLD	BOD	128	28	58	88	87			
Faridabad	TSS	168	80	71	222	51			
30MLD Gurgaon	BOD	114	48	62	73	114			
	TSS	53	140	59	62	62			

Gurgaon was not upto the YAP standards as BOD and TSS levels exceeded the desirable limit as depicted below:

The concerned division, however, had not devised any system to check the BOD and TSS level by testing samples of treated effluents.

## Mixing of treated and untreated effluent

**3.2.23** The treated effluent from STPs was discharged into various drains, which also carried untreated domestic and industrial waste at Yamunanagar and Panipat to river Yamuna and Western Jamuna Canal (WJC). As the treated effluent got mixed with the untreated one, the pollution level increased which ultimately polluted river Yamuna/WJC as detailed below:

Sr. No.	Name of towns	Capacity (MLD)	Pollution level after treatment		Pollution level after mixing with untreated effluent	
			BOD	TSS	BOD	TSS
1.	Yamunanagar	25	28	45	94	61
		10	29	55	74	76
2.	Panipat	35	27	50	148	74



Treated effluent from 25 MLD, STP at Camp area Yamunanagar coming out through effluent channel and falling into a Nallah running near the STP which flows into WJC



#### Treated effluent from 35 MLD, STP at Panipat coming out through effluent channel and falling into Panipat drain STP which flows into Yamuna River

Thus, appropriate planning was not done to save river Yamuna /WJC water from pollution.

## Lack of planning

## Unfruitful expenditure due to improper planning

**3.2.24** To check pollution caused by sewage of some colonies in Gurgaon flowing into drain number 8 and river Yamuna, GOI approved a scheme to provide 'Interception and Diversion (I&D)' sewer in Avadhpuri, Rajinder park and adjoining colonies across railway line for Rs 2.65 crore after an assurance from the EE, PH Division, Gurgaon that open drains would be constructed in the area to carry the discharge of streets into the main I&D sewer. This work was to be completed by December 2001. Though the work of main I&D sewer was completed in February 2002 at a cost of Rs 2.64 crore, drains/internal sewer were not constructed to link with I&D sewer. Thus, laying of I & D sewer without constructing the internal sewer had rendered the huge expenditure of Rs 2.64 crore as unfruitful as the I & D sewer was underutilized.

Executive Engineer stated (February 2004) that the work for laying branch sewer was in progress and considerable discharge of the area was going into the I&D sewer through branch line/open drains. The reply was not tenable as revised technical approval for laying sewer in the town was sanctioned only in February 2004 and funds were not allotted as of March 2004.

Internal sewer lines/drains were not constructed to link with I&D sewer

# Construction of oxidation ponds without ensuring disposal of treated effluent

**3.2.25** To treat the sewage water of Karnal, 8 MLD oxidation pond was constructed (completed in December 1999) under YAP at a cost of Rs 1.06 crore. As there was no appropriate arrangement for discharge of effluent, the low lying area near the plant was filled. The Forest Department as well as the farmers objected to the water being released on their land. The proposal for construction of effluent channel from sewage treatment plant to Barota Drain was not accepted by Engineer-in-Chief, as the scope of work was not covered in the detailed project report of the scheme and also in view of GOI's instructions that arrangements for conveying the treated effluent from STPs to final disposal were to be made by State Government. Another proposal for discharging the treated effluent into the irrigation channel was also not accepted by the Irrigation Department.

Executive Engineer stated (April 2004) that permission to construct the effluent channel had been received from Irrigation Department and the work had been started. The reply was not tenable, as Irrigation Department had asked for a certificate that there would be no death of any human and cattle by drinking effluent discharged from the STP. Also, permission of Forest Department on whose land effluent channel was to be constructed had not been obtained. Moreover, due to absence of tackling the colliform load of sewage water in oxidation ponds, the chances of contamination of potable water and occurrence of diseases could not be ruled out.

Thus, the oxidation ponds were constructed without making arrangement for disposal of treated effluent.

## Non-completion of pollution abatement scheme

**3.2.26** With the growing emphasis on abatement of pollution in river Yamuna, GOI (August 1997) approved a scheme for I&D sewers at Palwal, to be completed by August 1998. The work was partially completed in April 2001 at a cost of Rs 1.69 crore. Thereafter, no action to complete the sewer lines in the remaining areas and also to link the already laid sewer lines was taken.

Government of India separately sanctioned (August, 2001) the construction of STP and Main Pumping Station at Palwal at an estimated cost of Rs 3.64 crore with the condition to complete the same by June 2003. The work was still (January 2004) incomplete after spending Rs 1.67 crore. Thus delay in construction of I&D sewer and STP had resulted in nugatory expenditure of Rs 1.69 crore incurred on laying of partial sewer lines besides delay in controlling the pollution level in Yamuna. EE, YAP, PH Division, Faridabad stated (March 2004) that revised proposal for laying of I&D sewer in Palwal town was submitted to GOI in 1998, approval to which was still awaited (May 2004).

Thus, the fact remained that the activities were taken up without any proper synchronisation and planning, as I&D sewers were partially laid and revised

Partial completion of I&D sewers in Palwal town did not serve the desired objective

Effluent was discharged into

areas

nearby low lying

proposal for laying complete I&D sewer in Palwal town was not yet approved by GOI despite its submission six years back.

#### Absence of disposal system for treated effluent

**3.2.27** According to DPRs for construction of 25 MLD Upflow Anaerobic Sludge Blanket (UASB) sewage treatment plant at Yamunanagar (Camp area), the treated effluent from the STP was to fall into adjoining drain, which, ultimately was to join WJC. However, PH Department did not obtain prior permission of the Irrigation Department for discharging the treated effluent into WJC. PH Division 1, Yamunanagar took up the work in May 1996 and completed the construction in January 2003 at a cost of Rs 9.02 crore. The plant was, however, partially commissioned in September 2000 as only one of the two reactors could be completed by that time. Thus the work was completed without ensuring the method and location of release of the treated effluent.

In 1996, the irrigation authorities did not allow the discharge of treated effluent into WJC, because the canal water was utilized for drinking purposes also. The Chairman, Delhi Jal Board also stressed upon the Irrigation Department time and again to stop discharge of treated/untreated sewage in WJC as the water was utilised for drinking purpose in Delhi also.

For discharge of treated effluent the department submitted (December 1997) a proposal to GOI for construction of effluent channel at an estimated cost of GOI refused to finance the project and asked the State Rs 3.83 crore. Government to arrange funds from their own resources. The matter remained undecided till May 2003 when, Haryana State Pollution Control Board (HSPCB) took a decision to construct a ditch drain along WJC at a cost of Rs 7.94 crore of which Rs 3.08 crore and Rs 4.86 crore were to be borne by the Public Health Department and by the industries (who were discharging their effluent into WJC) respectively. No action in the matter had been taken so far (May 2004). Thus, the plant was conceived ignoring the provisions of the Haryana Canal and Drainage Act, 1974, (as amended in July 2001), which did not permit the discharge of treated/untreated sewage into canals. No action had been taken so far though the discharged effluent was being released in WJC against the codal provisions and against the instruction of Irrigation Department.

#### Unutilised sewerage structures

**3.2.28** Government of India approved (June 1996) a pollution abatement scheme under YAPs phase II in Indri, Chhachhrauli and Radaur towns at a cost of Rs 4.30 crore. The works included laying of I&D sewer, construction of STPs and other ancillary works. As no sewerage facilities existed in these towns, it was proposed to complete sewerage works by 2001. Work on laying of I&D sewer was started in 1998 and completed during 2001 at a cost of Rs 1.47 crore. Work on construction of STPs was under progress and a total expenditure of Rs 3.83 crore had been incurred upto March 2004.

As no internal sewer lines were laid, I&D sewer remained nonfunctional

Proper system to discharge treated

effluent not devised

No provision for internal sewer lines was made and thus no internal sewer had been laid in any of these towns due to which I&D sewer laid at a cost of Rs 1.47 crore in these towns remained non-functional thereby defeating the very purpose of the pollution abatement.

# Under utilization of structures resulting in recurring expenditure on running of Sewage Treatment Plant

**3.2.29** Under YAP, the department constructed, 10 upflow anaerobic sludge blanket (UASB) plants in six<sup>8</sup> towns. The domestic waste water treated in a UASB reactor was suitable for discharging in river water; and the biogas generated through process could also be utilized for generating electricity for running the plant. In order to utilize the energy generated from biogas, various structures and equipments were provided and electricity generating system installed at all the UASB Plants at a cost of Rs.2.27 crore.

It was noticed that against capacity of generating electricity for 6-8 hours daily, electricity was generated for 2 hours per day on an average in all the STPs (except STP at Faridabad). This was much less than what was projected during the preparation of detailed project report on the basis of the design of UASB technology. For the remaining time electricity was arranged from external sources to run the STPs and its auxiliary pumps. Had the electricity been fully produced from the biogas as envisaged in the detailed project reports and design of UASB technology, the department would have saved Rs 77,000 per month as energy charges (at the rate of Rs 11,000 per month per STP).

Failure of the department in not generating enough energy sufficient to run the plant had resulted in unfruitful expenditure of Rs 2.27 crore incurred on infrastructures raised for generating electricity.

The EE, Panipat stated (November 2003) that cost of electricity produced from the biogas was equal to the electricity used from external source. The fact remains that since the equipments have been installed for generation of electricity, the same should have been utilized to optimum capacity to save upon electricity that had to be sourced externally particularly in view of electricity being a scarce resource.

#### Unjustified expenditure due to deviation from scheme norms

**3.2.30** In several towns of the State, there were large number of dry latrines, which were environmentally/aesthetically unsuitable and created unhygienic conditions. In these towns, there were certain identified slum areas where people did not have latrines in their houses or nearby. So in order to have better sanitation facilities, it was decided to construct community

8

Structures/machinery installed for generation of electricity were grossly underutilised

Toilet units were constructed at bus stands/administrative complexes, etc., instead of constructing in identified slum areas

Faridabad, Gurgaon, Jagadhari/Yamunanagar, Karnal, Panipat and Sonipat.

toilets/complexes in six<sup>9</sup> towns. However, instead of constructing the community toilets in identified slum areas, the department constructed 33 units at a cost of Rs. 2.95 crore at places like bus stands, administrative complexes, etc. where such facilities were already existing.

Executive Engineers, YAP Division, Yamunanagar and Panipat stated (November 2003) that as per allotment letter, the site was to be selected in consultation with the Non-Government Organisations (NGOs) keeping in view the viability of these units. The reply was not tenable as the purpose of construction of these toilets was to reduce pollution level in slum areas where no such facilities existed. Besides, the reply was silent about the diversion of funds for sites other than slum areas. Thus, the expenditure was not justified under the scheme.

#### Industrial pollution

**3.2.31** A large number of industries are located in the catchments of WJC at Yamunanagar/Jagadhari and Yamuna river at Panipat, some of which were generating heavy organic pollution. At Jagadhari/Yamunanagar, 96.13 MLD of treated, untreated or partially treated industrial and domestic effluent was discharged into the WJC. Central Pollution Control Board in a survey conducted during February 2003 measured high concentration of Total Suspended Solids (TSS) (158mg/l), Bio-chemical Oxygen Demand (BOD) (190 mg/l) and Ammonia Nitrogen (30.5 mg/l). Similarly, 92.81 MLD untreated or partially treated industrial and domestic effluent including treated effluent from Panipat town was discharged into Yamuna river through drain number 2. Details of major industries discharging heavy pollution load in these towns were as under:

Sr.No.	Name of town	Name of industries	BOD	TSS
1	Yamunanagar	Haryana Distillery	292	661
2	Sonipat	Sterling Agro	68	59
3	Kundli	Industrial area of Kundli town	2407	1272
4	Sonipat	Bharat leather	393	223
5	Sonipat	Sugra leather Akbarpur	61	566
6	Samalkha	Haryana organics	139	127

Haryana State Pollution Control Board had not initiated any action against these polluting units to take remedial measures.

## Monitoring

9

Lack of appropriate monitoring at different levels led to non-achievement of goals **3.2.32** SPCB was required to inspect sewage/trade effluents works, plants for the treatment of sewage and trade effluents and review plans, specifications or other data relating to these activities. However, except in six towns, which were covered under YAP, the Board did not monitor the quality of water and

Lack of action against water polluting industrial units

Faridabad, Gurgaon, Jagadhari/Yamunanagar, Karnal, Panipat and Sonipat.

pollution load in the towns/cities where 349.15 MLD untreated sewage was being discharged into open fields/drains.

Besides, the execution/completion of works was required to be effectively monitored by the EIC, with a view to ensure that for each work, targets relating to time, cost, services, etc. were achieved. However, no monitoring cell was created to watch the progress of works. The periodical progress reports (physical & financial) received by the EIC from the field officers were neither scrutinized properly nor effective follow up action taken. The reports did not indicate time frame fixed for completion of schemes. As a result 60 sewerage schemes undertaken by the divisions during 1999-2004 and 25 schemes more than five year old remained incomplete. Funds were not earmarked for completing the left out works resulting in non-commissioning of schemes.

The works under YAP were monitored in YAP wing functioning in the office of the EIC, Public Health and the quality of water was monitored by the HSPCB. The State Government was to constitute Citizen Monitoring Committee (CMC) for each town, as per directive of the National River Conservation Directorate, Ministry of Environment and forest, GOI issued in March 1995, to monitor the progress of execution and timely completion of schemes, their operation and maintenance and to facilitate public awareness / participation. The CMCs were to meet once in a month. However, CMCs were constituted in only 6 out of 12 towns and in these towns also no meeting was held. Thus, CMCs were not functional.

# Conclusions

3.2.33 The department had not completed any of the 85 sewerage and sanitation schemes (25 ongoing schemes prior to March 1999). Sewerage schemes were non-functional because treated effluents disposal works were not completed as was required according to the procedure laid by GOI. Due to non-consideration of already laid sewer, Rs 51.21 lakh were spent on additional work at Sirsa town. Sewerage facilities were provided to only 10 per cent of the population of Ambala City even after 20 years of the approval of sewerage scheme. Under YAP, treated effluent was being discharged in a drain carrying untreated effluent in Yamuna System. STPs constructed at Faridabad at a cost of Rs 51.27 crore remained underutilised. STPs failed to maintain prescribed level of pollutants in treated effluents in Faridabad and Gurgaon. Main Interception and Diversion sewers in five towns could not be made functional due to non-construction of internal sewer lines for carrying the sewage into main I&D sewer. Pollution Control Board failed to take effective action against large number of industrial units, which discharged untreated effluents into Yamuna system. All these factors led to nonachievement of goals of reducing water pollution and improving sanitary conditions.

## Recommendations

- ➤ 3.2.34 Government should ensure that sewerage schemes are formulated in such a way that sewerage works are started from the final disposal points going backwards as laid down in the GOI's Sewage and Sewerage Manual;
- Works should be completed within prescribed time frame to make the sewerage system effective;
- Sewerage system should be provided for towns where this facility does not exist to achieve the objective of providing hygienic sanitary conditions;
- Government should ensure that capacity of STPs is utilised to the optimum level in order to treat the maximum sewage of concerned towns;
- Effective controls should be put in place to ensure that industrial units treat the effluents before releasing into drains; and
- It should be ensured that pollutants in treated effluents are brought down to the level of YAP standards.

These points were referred to the Government (June 2004); reply had not been received (August 2004).

# **Public Works Department**

# (Buildings and Roads Branch)

# 3.3 Pradhan Mantri Gram Sadak Yojana

# Highlights

The primary objective of Pradhan Mantri Gram Sadak Yojana (PMGSY), a cent per cent Centrally sponsored scheme, was to provide connectivity by way of an all weather road to unconnected habitations in rural areas. Though there were only two unconnected habitations with a designated population of 500 persons and above in the State, these were not connected during 2000-04 not withstanding the fact that the focus of the scheme was on new connectivity. The entire funds received under the scheme were spent by the Government on upgradation of roads though the scheme guidelines had provided only for 20 per cent of funds for upgradation and balance bulk of funds for new connectivity. Even in the roads, which were taken up for upgradation, there was a shortfall in achievements of targets as out of 67 roads taken up, only 41 were upgraded. Non-achievement of targets was also attributed to nonutilisation of funds by the State Government. Test-check of records brought to light the cases of designing of upgradation works with inadequate specifications, diversion of funds to other schemes, non-levy of penalty for delayed completion of works, non-obtaining of bank guarantees from contractors for the works executed for their maintenance, etc.

About 24 *per cent* of funds received from Government of India remained unspent, although one-third the length of roads targeted for completion remained incomplete/not taken up.

(Paragraph 3.3.6)

Department failed to connect even the two unconnected habitations in the State in spite of availability of funds. No plan to identify rural roads for their upgradation and coverage in a given time frame was prepared. Against the target of upgradation of 67 village roads, 41 were upgraded during 2000-04.

(Paragraph 3.3.8)

Chandimandir-Jallah road strengthened and widened at a cost of Rs 45.03 lakh had deteriorated within one year and six months of its completion and in certain reaches, the road was even non-existent due to inadequate specifications, non-provision of side drains, etc.

(Paragraph 3.3.9)

Contrary to the scheme guidelines, eight divisions did not obtain bank guarantees for Rs 3.58 crore to serve as performance guarantees for five years after completion of works.

(Paragraph 3.3.11)

Provincial Division, Naraingarh did not invoke penalty clause for delay in completion of works within prescribed time frame, which gave undue financial benefit of Rs 46.36 lakh to the contractor.

(Paragraph 3.3.12)

An expenditure of Rs 2.41 crore was incurred on works in violation of scheme guidelines on repair of road, adoption of rich specifications, charging of cost overrun to scheme and on other works/schemes.

(Paragraph 3.3.13)

## Introduction

**3.3.1** Rural road connectivity is a key component of rural development in promoting access to economic/social services and thereby generating increased agricultural income and productive employment opportunities. About 40 *per cent* of the habitations in the country are still not connected by all weather roads. With a view to redressing the situation, Government of India (GOI) launched a 'cent *per cent* Centrally sponsored' Pradhan Mantri Gram Sadak Yojana (PMGSY) in December 2000. GOI created Dedicated Road Fund by way of levy of cess at Rupee one per litre on high speed diesel. Fifty *per cent* of the cess levied is transferred to Ministry of Rural Development (MORD) to be used under PMGSY. In Haryana, of the total 6,876 habitations as of March 2000, only 2 were unconnected which had a population of 500 and above persons.

#### **Programme objectives**

**3.3.2** The primary objective of PMGSY is to provide connectivity, by way of an all weather road (with necessary culverts and cross-drainage structures

operable throughout the year), to unconnected habitations in the rural areas in such a way that habitations with a population of 1,000 persons and above are covered in three years (2000-2003) and all unconnected habitations with a population of 500 persons and above by the end to the Tenth Plan Period (2007).

# Organisational set up

**3.3.3** The Commissioner and Secretary to Government Haryana, Public Works Department (PWD), Buildings and Roads (B&R), the administrative head at government level, is responsible for implementation of the programme. The Engineer-in-Chief (EIC), (B&R) is the Head of Department and is assisted by one Chief Engineer (CE) (Roads) at headquarters, eight Superintending Engineers (SEs) and 19 Executive Engineers (EEs) as a programme implementation units (PIU) in the field. Regional Engineering College, Kurukshetra is designated as the State Technical Agency (STA) and detailed cost estimates of all works to be executed under the scheme are required to be approved by them. Besides, there is one State level autonomous agency i.e. Haryana State Roads and Bridges Development Corporation (SRBDC) which is a nodal agency and receives funds from MORD and transfers them to the PIUs for their utilization on works.

# Audit objective

**3.3.4** The main focus during review study was to verify whether the objectives of connectivity of habitation in rural areas and upgradation of rural roads were achieved and the works were executed as per scheme guidelines. Important audit findings are discussed in the succeeding paragraphs.

## Audit coverage

**3.3.5** Records relating to the implementation of PMGSY for the years 2000-04 were test checked in the office of the EIC (B&R) and in eight Divisions<sup>1</sup> (out of 22 Divisions where the scheme was implemented) during February to May 2004.

The divisions for test-check were selected on the basis of expenditure incurred. Four divisions were those where expenditure exceeded Rs 6 crore each, two divisions, where expenditure ranged between Rs 3 crore and Rs 6 crore each and two divisions, where expenditure was less than Rs 1 crore. Thus, expenditure of Rs 37.59 crore, out of total expenditure of Rs 80.74 crore (47 *per cent*) was covered under test-check.

<sup>&</sup>lt;sup>1</sup> Bridge Construction Division, Chandigarh, Provincial Divisions, Naraingarh, Bhiwani, Sirsa, Fatehabad, Narwana, Kurukshetra and Karnal.

#### Financial out lay and expenditure

**3.3.6** According to scheme guidelines, the funds released by MORD, GOI to the State Government were to be kept in a separate bank account. PIUs were to issue account payees cheques in favour of the contractors, firms supplying material, etc.

**Funding pattern not followed** GOI released funds through bank draft to SRBDC, which deposited them in their bank account opened exclusively for this scheme. SRDBC transferred the funds into treasury under 'Civil Deposits' on the basis of demands raised by PIUs for execution of works. Thereafter, the State Government issued letter of credit (LOC) on the basis of which PIUs withdrew funds for meeting expenditure on works. Depositing of funds into 'Civil Deposits' and following the system of LOC was contrary to the procedure laid down in the scheme.

Details of grants received from GOI, funds deposited into 'Civil Deposits' and expenditure incurred under the scheme during 2000-2004 were as under:

Year	Grants from GOI	Interest earned on fixed deposits of SRBDC	Fund deposited in Civil Deposits	Expenditure	Balance with SRBDC in bank at the year end
			(Rupees in crore)		
2000-01	25.18		25.18	-	-
2001-02	30.29		-Nil-	14.28	30.29
2002-03	32.74		5.00	24.43	58.03
2003-04	21.01	4.36	57.14	42.03	26.26
Total	109.22	4.36	87.32	80.74	

Out of a total of Rs 113.58 crore, available by way of grants and interest on fixed deposits, Rs 87.32 crore were deposited into government account (Civil Deposits) for implementation of the scheme and balance Rs 26.26 crore remained unspent with SRBDC in their bank account in the shape of fixed deposits, etc. Besides, Rs 6.58 crore remained unspent in Civil Deposits as of March 2004.

**3.3.7** As per guidelines, money accruing as interest was to be added to PMGSY fund. The State Government/SRBDC were required to intimate the interest amount to National Rural Road Development Agency (NRRDA) from time to time. Expenditure from the interest amount was to be guided by MORD's instructions. It was, however, noticed that SRBDC earned interest of Rs 4.36 crore (net) upto March 2004 on bank deposits but neither any intimation was sent to NRRDA nor MORD's instructions received for utilizing the interest component on specific activities/works. The amount was lying unspent in the bank account of SRBDC.

Out of total central grant of Rs 113.58 crore including interest, Rs 80.74 crore were utilised

> Interest earned on bank deposits remained unspent

## Execution of works

Plan to connect, unconnected habitations and upgradation of roads not prepared

Against the target of upgradation of 67 roads, only 41 roads were upgraded **3.3.8** The primary focus of the PMGSY was to provide all weather road connectivity to the unconnected habitations having designated population size. In Haryana, there were only two such unconnected habitations in 2000-01 but the department had not prepared any block level master plan to connect them by constructing new roads during 2000-04 though the connectivity of habitations was to be given priority as laid down in the scheme.

The department had taken up the works mainly for upgradation of roads for which also no plan had been prepared to identify rural roads requiring upgradation and their coverage in a given time frame. Phase-wise physical targets and achievements of upgradation works were as under:

Phase	Year	Number o	of road works	Percentage	Length of roads		Percentage
		Targets	Achievements	shortfall	Targets	Achievements	shortfall
						In Kms	
Ι	2000-01	21	21	-	374.31	374.31	-
Π	2001-03	32	20	38	382.71	256.79	33
II	2003-04	14	5 (In progress)	-	274.80	-	-

As evident from the above table, there was shortfall of 38 *per cent* in completion of roads in terms of number while the shortfall was 33 *per cent* in terms of length of roads during 2001-03.

Engineer-in-Chief attributed (June 2004) the shortfall to closure of quarries in Gurgaon and Faridabad areas and lack of response from contractors because of the condition of maintenance of works for five years under the scheme. The reply was not tenable as the condition of maintenance of works for five years was a common feature all over the country and the contractors could include the element of maintenance cost while quoting the rates against the tendered works.

Scrutiny of records of execution of works brought out wasteful expenditure on work designed with inadequate specifications, irregular expenditure, nonobtaining of performance bank guarantee for maintenance of works for five years, non-levy of penalty for delayed execution of works, execution of works in deviation of MORT&H specifications, irregular expenditure on repair of road, extra-expenditure due to adoption of rich specifications, cost overrun, execution of work without technical sanctions, etc. as discussed in the following paragraphs:

## Designing work with inadequate specifications

Execution of works with inadequate specifications **3.3.9** The work 'widening and strengthening of Chandimandir-Jallah road' was completed in May 2002 at a cost of Rs 45.03 lakh. The road developed major defects within six months of its completion. The condition of road was bad and in certain reaches, the road was even non-existent.

The Director, Research and Design, PWD (B&R) Branch, Haryana during surprise inspection in November 2003 pointed out that the road was damaged

due to adopting of inadequate specifications i.e. specifications required as per California Bearing Ratio (CBR) value for such heavy/high frequency of vehicular traffic were not followed, non-provision of side drains and nontaking of action against stone aggregate washing plant owners who were causing over topping<sup>2</sup> of water on the road. It was noticed during audit that the Division had prepared and submitted a revised cost estimate to EIC, PWD (B&R) in March 2003 for the improvement/upgradation of this road, which proposed 570 mm crust thickness as per requirement at site in view of traffic intensity on this road. It was thus evident that the division failed to design the road with the required crust thickness initially.

In reply to Audit observation, the EE stated (August 2004) that due to paucity of funds, crust thickness was kept as 150 mm in the first phase against the requirement of 570 mm. The reply was not factually correct as funds were available under the scheme every year and crust thickness should have been designed as per site requirement.

# Works executed in contravention of scheme guidelines

Irregular expenditure of Rs 64.59 crore on upgradation works

Bank guarantees for

works for five years

maintenance of

not obtained

**3.3.10** The scheme permitted the upgradation of existing roads in those districts where all the habitations of designated population size had been provided all weather road connectivity. However, upgradation was not central to the programme and could not exceed 20 *per cent* of the State's allocation where unconnected habitations in the State existed.

In Panchkula district, two unconnected habitations with a population size of 500 persons and above each existed. However, entire expenditure of Rs 80.74 crore incurred pertained to upgradation works against the permissible limit of Rs 16.15 crore (20 *per cent* of Rs 80.74 crore). The priority to be given to connectivity of habitations as per scheme guidelines was ignored by the department. Thus expenditure of Rs 64.59 crore was incurred in contravention of scheme guidelines.

# Non-inclusion of work maintenance clause in the contract document

**3.3.11** As laid down in the scheme, the roads constructed under this programme were expected to be of very high standard requiring no major repairs for atleast five years after completion of construction. In order to realise this objective, suitable clause relating to performance guarantee/routine maintenance was to be included in the Contract Documents. The department should have included a clause regarding performance guarantee/routine maintenance in the Notice Inviting Tenders (NIT) and accordingly should have obtained bank guarantees valid for five years from the contractor equivalent to 10 *per cent* of the contract price (five *per cent* from March 2003). However, eight Divisions did not include the requisite clause in

2

Over topping means overflow of water on the road.

Sr. No.	Name of PWD (B&R) division	Contract price of works	Amount of	mount of bank guarantees			
			Required	Obtained	Deficit		
			(Rupees in lakh)				
1	Bridge Construction Division, Chandigarh	54.04	5.40	-	5.40		
2.	Provincial Division, Naraingarh	463.59	46.36	-	46.36		
3	Provincial Division – I, Sirsa	655.29	65.53	-	65.53		
4.	Provincial Division, Bhiwani	482.03	48.20	6.73	41.47		
5.	Provincial Division, Fatehabad	619.02	61.90	18.00	43.90		
6.	Provincial Division, Narwana	92.64	9.26	-	9.26		
7.	Provincial Division – I, Karnal	813.06	81.31	-	81.31		
8.	Provincial Division – II, Kurukshetra	457.98	45.80	-	45.80		
		378.62 <sup>3</sup>	18.93		18.93		
	Total	4,016.27	382.69	24.73	357.96		

the NIT and thus could not obtain adequate bank guarantees from the contractors as detailed below:

The concerned EEs (Chandigarh, Narwana, Kurukshetra II and Karnal divisions) stated (February/May 2004) that since there were no guidelines regarding obtaining of bank guarantees, the clause was not included in the tenders. The reply was not convincing as the condition of obtaining bank guarantees for five years was clearly envisaged in the PMGSY guidelines.

## Non-levy of compensation

**3.3.12** The EE, Provincial Division, Naraingarh allotted (July 2002) the work 'providing, widening and strengthening of existing road from Naraingarh-Sadhaura to Badhuli and Nariangarh-Sadhaura road to Jeolly (Ambala district)' to a contractor at an estimated cost of Rs 4.64 crore. The work was to be completed within nine months i.e. by April 2003, failing which, the contractor was liable to pay compensation equal to 10 *per cent* of estimated cost. The contractor applied for extension in time limit upto April 2004 (which was awaited as of December 2003) on the grounds that there was delay in installation of hot mix plant, for want of 'No Objection Certificate' from Pollution Control Board, increase in rate of royalty on stone metal, severe winter and rainy seasons and delay in department's decision for providing "A" type seal coat instead of "B" type.

Accordingly, the EE recommended the time-extension case to the SE which was injudicious as increase in rates of royalty, weather conditions, installation of hot mix plant, etc. were normal features and should have been taken into account by the contractor at the time of contract agreement. Further, provision of laying of 'A' type seal coat was already provided in the agreement.

3

Penalty for delayed execution of works not levied

Work was awarded in June 2003, performance bank guarantee was required at the rate of five *per cent* of contract price.

The agency failed to complete the work within prescribed time frame. Till June 2004, 98 *per cent* of the work had been completed and payments were released regularly to the contractor. The division was required to recover Rs 46.36 lakh as penalty under clause 2 of the contract agreement which was not done. The EE stated (March 2004) that all the above mentioned points had been taken into account while recommending the case. He further intimated (August 2004) that approval of the extension was still awaited. The reply was not acceptable, as the grounds on which the extension was sought did not merit extension as these conditions were already envisaged and covered in the contract agreement.

# Expenditure in violation of scheme guidelines

**3.3.13** A scrutiny of records revealed that an expenditure of Rs 2.41 crore was incurred on works in violation of scheme guidelines on repair of road, adoption of rich specifications, charging of cost overrun to scheme and diversion of funds to other schemes as discussed below:

Expenditure on repair of road in violation of scheme guidelines

Extra expenditure of Rs 0.34 crore incurred due to adoption of rich specifications

Cost overrun to be borne by the State Government, was charged to PMGSY • The scheme did not permit repairs to black topped or cement roads even if the surface condition was bad. It was, however, observed that a proposal of work, which essentially entailed only repairs to an existing road was also got included under PMGSY. Provincial Division, Naraingarh had got special repair done on 'Naraingarh-Sadhaura road to village Badhuli kms 4 to 17' during 2002-04 at a cost of Rs 0.21 crore in violation of scheme guidelines.

• In seven works relating to four divisions, it was noticed that in the cost estimates, there was provision of seal coat 'B' type using 0.06 cum crushed sand and 6.8 kg bitumen for 10 sqm, as per MORT&H specifications. The Regional Engineering College (REC), Kurukshetra (State Technical Agency) and Central Road Research Institute (CRRI), New Delhi also approved the specifications. In contravention of the above specifications, however, this item was replaced by the Engineer-in-Chief with the item "laying and providing 'A' type seal coat by using 9.8 kg. Bitumen" for 10 sqm area without the approval of MORT&H which led to an extra expenditure of Rs 0.34 crore.

The EEs, Provincial Division II, Kurukshetra and Karnal intimated (April-May 2004) that change in specification had been made by their head office and there was no need of approval from any other authority. The reply was not tenable as the works under the scheme were to be got executed as per MORT&H specifications.

• As laid down in scheme guidelines, if the value of tenders received was higher than the cost estimates approved by MORD, the difference would be borne by the State Government. In Provincial Divisions, Bhiwani and Kurukshetra-II, an expenditure of Rs 8.60 crore was incurred on execution of

five works<sup>4</sup> against the approved cost of Rs 7.78 crore resulting in cost overrun of Rs 0.82 crore. The entire expenditure in contravention of scheme guidelines was charged to PMGSY though the difference was to be borne by the State Government.

• The scheme envisaged that funds released by MORD, GOI to the State Government were to be kept in a separate bank account and programme implementation units were to issue account payees cheques in favour of the contractors/suppliers of material. Though LOC system was not permitted under the scheme, the State Government introduced LOC system as per the rules relevant for State Government schemes. Even the state rules were not followed properly. Under State financial rules, diversion of LOC from one work/scheme to another work/scheme was prohibited. However, in four<sup>5</sup> divisions, Rs 1.04 crore were diverted (for other works) out of LOC of Rs 15.82 crore received under PMGSY during 2000-04 in total disregard to accepted State Financial Rules from original received from Headquarters office.

While admitting the facts the concerned EEs stated (March-April 2004) that the funds were utilised on some other urgent works.

#### Execution of work without technical sanction

**3.3.14** As laid down in the scheme, the clearance of a project by the Ministry would not imply administrative or technical sanction of the proposals. Public Works Code provides that no work should be commenced unless detailed cost estimates were prepared and technically sanctioned by the competent authority. Thus technical sanctions were required to be obtained under this scheme also. However, test-check revealed that Rs 23.20 crore were spent by  $six^6$  divisions against 10 works during 2001-2004 without obtaining technical sanction of the competent authority.

Bhiwani to Sangarwas road, Bawanikhera to Sorkhi road, Bodri-Mahindergarh road, Ladwa-Mustafabad road and Thanesar to Kirmich road.

		(Rupees in Crore)					
Sr. No.	Name of Division	Period	LOC issued	Amount diverted			
1.	Provincial Division – I Sirsa	2000-04	5.55	0.53			
2.	Provincial Division – II Sirsa	2000-04	2.17	0.55			
3.	Provincial Division, Faridabad	2001-04	6.85	0.19			
4.	Provincial Division, Narwana	2000-02	1.25	0.32			
	Total		15.82	1.04			

<sup>6</sup> Provincial Division-I, Karnal: Rs 8.12 crore, Provincial Division, Fatehabad: Rs 6.63 crore, Provincial Division-II, Kurukshetra: Rs 1.66 crore, Provincial Division-I, Sirsa: Rs 1.80 crore, Provisional Division, Bhiwani: Rs 1.35 crore and Provisional Division, Naraingarh: Rs 3.64 crore.

Diversion of funds of Rs 1.04 crore towards the schemes not covered under PMGSY

4

5

## **Non-recovery of Sales Tax**

**3.3.15** According to Haryana General Sales Tax Act, 1973, sales tax at the rate of 10 *per cent* was leviable on bitumen. In a meeting of SEs and EEs held in August 2001, under the Chairmanship of Financial Commissioner and Secretary to Government Haryana, PWD (B&R), it was decided that where the contractors were arranging bitumen at their own level and were paying sales tax at the rate of four *per cent*, the difference i.e. six *per cent* would be recovered from their bills.

In Provincial Divisions, Bhiwani and Fatehabad, in respect of works 'providing, widening and strengthening of Bawani Khera-Jamalpur road upto District boundary kms 7.40 to 16.14' and 'upgradation of road by providing, laying and strengthening at Fatehabad-Hasanpur road' executed during 2002-04, recovery of Rs 2.50 lakh and Rs 6.81 lakh respectively towards difference of sales tax had not been made from the contractors so far (March 2004).

# Monitoring

Ineffective monitoring

**3.3.16** The State Government/department did not monitor the progress of financial performance properly as the funding and accounting pattern laid down in the scheme was not adhered to; and on the contrary, LOC system was followed resulting thereby in large funds having remained unutilised. The execution/completion of work was not monitored effectively by the Engineer-in-Chief as targets for execution of works were not achieved, performance bank guarantees for maintenance of works for five years were not obtained, works were executed in deviation of prescribed specifications and cases of cost overrun existed. Periodical inspections of works were to be carried out by quality control units/independent Executive Engineers of the State Government and random tests of material used were also to be conducted in laboratories but these aspects were not monitored.

# Conclusions

**3.3.17** Though the focus of the scheme was on connectivity of the habitations, the entire expenditure was incurred on upgradation of roads. The only two habitations requiring connectivity in the State had not been connected. Even for upgradation works, no block level master plan was prepared as envisaged in the scheme. Further, only 41 works were completed against the target of 67 works as a result of which huge funds remained unutilised. Scrutiny of record relating to execution of works brought out the cases of execution of works in violation of MORT&H specifications, non-levy of penalty for delay in completion of works, non-obtaining of performance bank guarantees from contractors for maintenance of works for five years, extra expenditure due to adoption of rich specification, etc. Thus the scheme was not implemented as per GOI guidelines.

# Recommendations

3.3.18 Public Works Department (Buildings and Roads) should:

- prepare appropriate plan to connect the unconnected habitations and a time bound programme for completion of upgradation works, so that the funds do not remain unspent;
- ensure that the works are executed as per MORT&H specifications;
- ensure that delays in completion are avoided and wherever delays occurred, penalty should be levied as per codal provisions; and
- make arrangements for obtaining performance bank guarantees for maintenance of works for five years from the contractors as per scheme guidelines and ensure inclusion of this clause in all contracts.

These points were referred to Government in July 2004: their reply had not been received (August 2004).

# **Revenue Department**

# **3.4** Working of Shivalik Development Board

# Highlights

Shivalik Development Board was constituted with the objective of raising the living standards of the people in the areas of Shivalik range through integrated development of hilly and semi-hilly areas. Thrust was on creation of infrastructure viz. construction/repair of roads, construction of buildings for health centres, schools, colleges, installation of tubewells, etc. The Audit study revealed that the Board had not functioned in an efficient manner. Its members were high ranking Government nominees with the State Chief Minister at the helm of affairs besides Ministers/Chief Secretary and Secretaries of various departments being ex-officio members. Although the original intention of having high profile nominees was to provide special focus to the development of the area, it so turned out that none of the officials could provide adequate attention to monitor the progress of works since the Board failed to meet regularly. Manpower shortage with scheme implementing departments, especially Health and Education, was discussed at meetings but was not pursued effectively with the State Government for filling up of the vacant posts. The Board failed to formulate specific schemes on long- term basis to achieve the objective of raising the living standard of the people in the area. Physical targets/time schedule for completion of works were not fixed as a result of which execution of works got delayed and funds remained unspent with the implementing agencies. A large number of tubewells remained non-functional for want of repairs. Co-ordination Committee required to monitor the schemes did not hold its meeting even once during the last five years as the Government failed to appoint the President of the Committee. The Board had never evaluated the extent of improvement brought about in the standard of living of people in the area as a result of implementation of the various programmes/schemes. The basic intent of having a separate Board to provide focused development of the area, therefore, remained unachieved. Lackadaisical approach to implementation coupled with the unwieldy nature of the Board, thus, presents a case before the Government for consideration of winding up of this Board and instead pursuing the development of the area through the normal implementing departments, who, in any case, are the implementing agencies for the Board.

• The Board did not formulate schemes/programmes on long-term basis specifying aims, objectives and targets for raising the standard of living of the people.

(Paragraph 3.4.8)

• More than 90 *per cent* of the funds (Rs 3.15 crore) received from Government of India in 2001-02 for installation of tubewells, remained unutilized due to non-formulation of schemes.

(Paragraph 3.4.12)

• In five divisions, 44 works were got executed at a cost of Rs 4.83 crore without obtaining technical sanction of estimates from competent authority.

(Paragraph 3.4.9)

• Abandonment of two roads, after execution of earthwork at a cost of Rs 60.40 lakh, rendered the entire expenditure wasteful.

(Paragraph 3.4.10)

• Out of 72 deep tubewells to be handed over to village Farmers' Co-operative Societies after their repair, only 20 were handed over and the remaining 52 were lying non-functional/un-repaired.

(Paragraph 3.4.14)

• Co-ordination Committee, which was responsible for monitoring the progress of implementation of schemes, did not meet even once during 1999-2004.

(Paragraph 3.4.22)

• Shivalik Development Agency (SDA) did not evolve any system to watch actual utilization of funds released to implementing agencies as a of result of which Rs 15.03 lakh remained unspent with an implementing agency and the same was not in knowledge of the SDA.

(Paragraphs 3.4.7)

# Introduction

**3.4.1** Haryana Government constituted in March 1993 Shivalik Development Board (the Board) and its associate agencies known as Coordination Committee and Shivalik Development Agency (SDA) for overall integrated development of hilly and semi-hilly areas of Shivalik ranges in Panchkula, Ambala and Yamunanagar districts. Shivalik Development Agency (SDA) is the executive agency for development programmes and the State Government provides funds to it.

# **Programme objective**

**3.4.2** The primary objectives of the Board are to strengthen the infrastructure and to raise the living standards of the people of these areas by implementing various schemes in the fields of agriculture, floriculture, herbal plantation, education, public health, buildings and roads, irrigation, watershed management, banking, tourism, forest, poultry, animal husbandry and wild life, etc.

To achieve its objectives, the Board released funds to the concerned departments mainly for construction/repair of roads, school buildings, health centres, installation/repair of tubewells, improvement of village ponds, construction of village harvesting dams, etc.

# **Organizational set up**

The Board is an Apex Policy Making Body and exercises control with 3.4.3 regard to formulation and review of special schemes in Shivalik area. A Coordination Committee (23 member body) monitors the implementation of schemes and is to report regularly to the Board.

Shivalik Development Agency (SDA) executes development programmes through implementing agencies as given in Appendix XVII.

The composition of the Board and other agencies is indicated below:

## **Shivalik Development Board**

Chairman: **Chief Minister** 

Members

- Ministers and Administrative Secretaries of the following departments •
  - Finance
- Irrigation and Power
- Cooperation - Forests
- Development
- Education
  - Industry
- Fisheries
  - Chief Secretary
  - Member of Parliament representing the area
  - Members of Legislative Assembly representing the area

- Animal Husbandry
- Health
- Tourism

- Buildings and Roads
- Public Health

# Co-ordination Committee*President*

To be nominated by the Government

Vice President

Commissioner, Ambala Division

## **Members**

- Heads of Departments concerned with development programmes;
- Deputy Commissioners of the districts concerned; and
- Chief Executive Officer of the Shivalik Development Agency.

## Shivalik Development Agency*Chairman*

Commissioner, Ambala Division

## Members

- Deputy Commissioners/Additional Deputy Commissioners of the districts concerned;
- Heads of district level offices of the districts concerned; and
- Members of Legislative Assembly representing the area of the districts concerned.

# Audit objective

**3.4.4** The review of the functioning of the Board was undertaken for assessing the extent of integrated development of hilly/semi-hilly areas of Shivalik range in the fields of agriculture, education, public health, roads, irrigation, etc. Though the Board did not prescribe specific indicators for the purpose of evaluation of improvement in the living standard of the people in the area, following parameters were adopted:

- formulation of schemes for area development on long term basis;
- utilisation of funds by implementing agencies;
- completion of infrastructure within prescribed time frame;
- proper utilisation of infrastructure created;
- number of villages provided electricity facilities; and
- adequacy of monitoring at various levels.

## Audit coverage

**3.4.5** Records relating to the working of the Board for the period 1999-2004 were reviewed through test-check of records during January-April 2004 in the offices of the CEO and  $13^1$  implementing agencies of 4 Blocks (out of 36 implementing agencies functioning in 11 Blocks) as indicated in *Appendix XVII*.

Main criteria for selection of units for test-check was the magnitude of expenditure incurred and critical importance of activities in relation to development of the Shivalik area.

#### Financial management

#### Budget and expenditure

**3.4.6** The details of budget proposals, funds released by Government and funds released by SDA to various implementing agencies for the period 1999-2004 were as under:

Year	Budget estimate/Funds provided by Government to SDA	Funds released by SDA to implementing agencies	Actual expenditure				
	(Rupees in crore)						
1999-2000	1.65	1.59	1.59				
2000-01	5.00	5.05	4.95				
2001-02	8.00	5.81	4.93				
2002-03	5.90	5.75	4.83				
2003-04	6.50	6.32	2.70				
Total	27.05	24.52	19.00				

As evident from the above table, out of the total grant of Rs 27.05 crore, only Rs 24.52 crore were released to various implementing agencies. Balance amount of Rs 2.53 crore was kept by the SDA in saving bank accounts/FDRs in various banks. It was noticed that funds to the tune of Rs 5.51 crore (refer *Appendix XVIII*) though released, remained unspent with the implementing agencies as discussed below:

Rupees two crore were paid (September 2003) to the SE, Public Health, Ambala Circle for water supply scheme and Rs 80 lakh (Rs 35 lakh in October 2002 and Rs 45 lakh in March 2004) were paid to Haryana Police Housing Corporation for construction of 12 water harvesting dams. These activities had not yet been taken up (March 2004) and the funds were lying with these agencies. Besides, funds ranging between Rs 0.05 crore and Rs 0.98 crore

Rupees 2 crore for water supply scheme and Rs 0.80 crore for water harvesting dams remained unutilised

<sup>&</sup>lt;sup>1</sup> Public Works Department (Buildings and Roads) Divisions at Naraingarh, Panchkula and Yamunanagar, Public Health Division at Ambala, Panchayati Raj Division at Ambala, Divisional Forest Officers, Territorial and Kandi at Yamunanagar, Panchkula, District Horticulture Officer, Yamunanagar, District Fisheries Officer, Ambala, Haryana Police Housing Corporation, Panchkula, Haryana Vidyut Prasaran Nigam, Naraingarh and Haryana State Minor Irrigation (Tubewells) Corporation.

were lying unutilised with eight implementing agencies aggregating amount of Rs 2.71 crore as indicated in *Appendix XIX*.

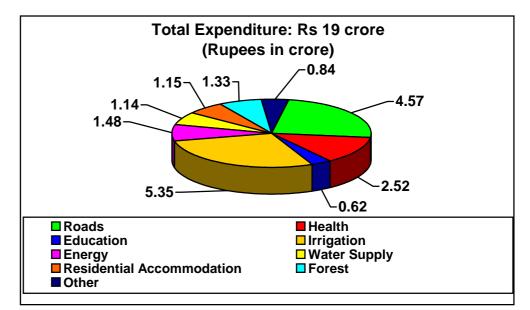
# Non-maintenance of expenditure control register

**3.4.7** The Chief Executive Officer, SDA was responsible for monitoring the progress of expenditure incurred by implementing agencies through a consolidated expenditure register, to be prepared on the basis of monthly physical and financial progress reports furnished by individual implementing agencies. However, neither was such a register maintained during 1999-2004 nor were monthly reports received from the concerned agencies. Non-maintenance of such an important document was fraught with the risk of serious irregularities such as huge unutilised amounts with implementing agencies remaining unnoticed. As a result of non-maintenance of expenditure control register, an unspent amount of Rs 15.03 lakh lying with a Division did not come to the notice of SDA as discussed below:

The Executive Engineers (EEs), PWD (B&R), Ambala released Rs 35.30 lakh to Executive Engineer, Electrical Division, Ambala during 1996-2003 for 17 works pertaining to electric installations though no cost estimates had been prepared for these works. The works were completed by spending Rs 20.27 lakh and unspent balance of Rs 15.03 lakh was lying with the Electrical Division. The fact of the unutilised amount did not come to the knowledge of SDA, as the entire amount released was debited to the concerned works by PWD (B&R) Divisions as expenditure. On being pointed out in Audit, Rs six lakh were refunded to the SDA in June 2004.

# **Programme Implementation**

Sector-wise/activity wise expenditure was as shown in graph below:



A review of the programme implementation revealed cases of non-formulation of specific schemes, non-fixation of physical targets, execution of works

System to Watch utilisation of funds not evolved

Unutilised amount of Rs 15.03 lakh remained with Electrical Division even after completion of works without technical sanctions, non-completion of works, non-construction of link roads, non-installation of tubewells, unfruitful expenditure due to nonlaying of pipelines, defunct tubewells, non-providing of infrastructure for power supply, delay in construction of primary health centres, inadequate coverage of income generating schemes, inadequate focus upon manpower management, etc. These are discussed below:

## Non-formulation of specific schemes

**3.4.8** Co-ordination Committee was to formulate specific schemes, which could raise the economic status/living standard of the people. The Committee was also to identify prospective beneficiaries belonging to weaker sections in particular. However, no scheme was formulated either by the Co-ordination Committee or by the SDA. The works for execution were selected from the proposals submitted by the concerned Deputy Commissioners each year.

The CEO, SDA while admitting the facts stated (August 2004) that the schemes could not be formulated as the Co-ordination Committee was non-functional.

Non-fixation of physical targets The SDA did not conduct any survey during 1999-2004 and therefore schemes formulated by the Board were not based on any techno-economic study or other relevant details. Budget proposals submitted by SDA were not supported by the estimates of the respective departments/implementing agencies. The Board did not fix any physical targets or time schedule in respect of any scheme and thus achievements were not comparable in audit. Further, no parameters were set by the Board to measure the effectiveness of the implementation of the programme.

## Execution of works without technical sanction

**3.4.9** As per codal provisions, before commencement of construction works, detailed cost estimates should be technically sanctioned by competent authority. Five EEs, PWD (B&R) Divisions at Ambala, Panchkula and Yamunanagar spent Rs 4.83 crore on construction of 44 works (33 link roads, 6 PHCs and 5 school rooms) in 11 blocks during 1999-2004 without obtaining technical sanctions of the cost estimates.

## Non-completion of roads rendered the expenditure unfruitful

**3.4.10** The Board accorded (June 1995) administrative approval for construction of two link roads viz link road from village Badyal to Raji Tikkari and Tikkartal to Meerpur for Rs 1.40 crore and Rs 1.04 crore, respectively. For this purpose, Rs 50 lakh were provided by the SDA during 1996-2002 (Rs 40 lakh in March 1997 and Rs 10 lakh in 1998-99) to EE, Provincial Division, Panchkula. The Division took up the works without obtaining technical sanction to their cost estimates and executed upto earth level (7.5 km out of 12 km and 2 km out of 10 km) during August 1997 to March 2000 at a cost of Rs 60.40 lakh. Thereafter, further execution of works was stopped because funds were not provided by SDA. The SDA did not provide funds because the Deputy Commissioner failed to send demands for

Detailed survey for formulation of schemes not conducted

Earthwork on roads worth Rs 60.40 lakh was rendered unfruitful as balance funds were not received for completion of the roads funds to complete the work. The roads were in neglected condition and chances of the earthwork getting washed away could not be ruled out due to vagaries of weather. Executive Engineer, Provincial Division, Panchkula stated (February 2004) that revised cost estimates of Rs 2.02 crore for construction of road from Budyal to Raji Tikkari had been submitted to Government for approval which was still awaited. No action was indicated in the reply with respect to completion of Tikkartal to Meerpur road. However, reasons for starting the work without obtaining technical sanctions were not furnished.

## Non-construction of link road

**3.4.11** The Board accorded administrative approval for construction of link road from Tikker to Bharat in September 2001 for Rs 44 lakh for which the SDA released Rs 7 lakh to the EE, Provincial Division, Panchkula in July 2001. The work was transferred to Haryana Police Housing Corporation (HPHC), Panchkula in May 2003. It was noticed that the division did not prepare detailed cost estimates and without obtaining technical sanction to cost estimates, Rs. 0.87 lakh were spent on survey, advertisement, calling of tenders, etc. upto May 2003. Neither had the balance amount of Rs 6.13 lakh been transferred to HPHC nor had the remaining funds of Rs 37 lakh, after according administrative approval, been released (March 2004).

#### Non-installation of deep tubewells

3.4.12 The Board approved an outlay of Rs 3.15 crore (out of Central assistance of Rs four crore received in July 2001) for installation of deep irrigation tubewells to facilitate irrigation by farmers in the project area. For this purpose, HSMITC was to prepare a detailed project report indicating the number of deep tubewells to be installed and their estimated cost. Accordingly, HSMITC prepared (December 2001) the project report for installation of 80 tubewells at an estimated cost of Rs 14.73 crore. This, however, was not approved by the Board for want of funds of the scale cited in the project report. SDA, while retaining Rs 2.15 crore with them, released Rs one crore during 2001-02 to HSMITC. It was noticed that the HSMITC reported to SDA an expenditure of Rs 27 lakh for conducting survey but no supporting expenditure details/records were furnished. Rupees 60 lakh were returned to SDA in September 2003 and balance of Rs 13 lakh was still with HSMITC, which had been wound up with effect from July 2002. Thus Central assistance of Rs 2.88 crore (SDA: Rs 2.75 crore and HSMITC: Rs 0.13 crore) under this scheme remained unutilized (March 2004). Due to non-preparation of detailed cost estimates for the works by HSMITC, the activity was not taken up and no deep tubewell was sunk and the farmers of the area were deprived of the intended benefits.

## Unfruitful expenditure due to delay in laying of pipeline

**3.4.13** SDA released Rs nine lakh in April 2000 to HSMITC for extension of pipeline from 1500 ft to 3000 ft in Pinjore block to use the full potential of the tubewells in the area. HSMITC utilized Rs 0.13 lakh on another work (laying of pipeline upto 1500 ft). The work of extension of pipeline on the stretch

Due to non-formulation of scheme, funds remained unspent

> Non-execution of extension work, despite availability of funds

between 1500 ft and 3000 ft, however, was not done and balance Rs 8.87 lakh were lying in bank in the form of FDR in the joint account of EE, HSMITC and CEO, SDA till date (May 2004). Due to non-laying of pipeline from 1500 ft to 3000 ft, full potential of tubewells in the area could not be utilized. Thus due to slackness on the part of HSMITC coupled with absence of monitoring on the part of the Board led to denial of intended benefits of the scheme to the inhabitants of Shivalik area.

#### Non-repairing of tubewells

**3.4.14** The Board released Rs 43.63 lakh to HSMITC in 1997 for repair of 72 tubewells. In July 2001, the Board, further decided that possession of 72 damaged tubewells, after repair, should be handed over by HSMITC to the Village Farmers' Co-operative Societies. However, the HSMITC handed over only 20 tubewells; the remaining 52 damaged tube wells were neither got repaired nor handed over to the Farmers Co-operative Societies as of May 2004. The SDA had no clue whether the 20 handed over tubewells were functioning. Specific reasons for non-repair of 52 tubwells could not be ascertained from records. Non-functioning of the tubewells defeated the very objective of the scheme.

# Absence of details of expenditure spent on creation of infrastructure for power supply

**3.4.15** To provide power infrastructure for electricity facility in the remote area of Shivalik range, the Shivalik Development Board released Rs 1.03 crore to Haryana State Electricity Board during February 1995 to July 2000. The Electricity Board submitted expenditure account for Rs 99.80 lakh for electrification works carried out in 351 dhanies of Morni block and unspent balance of Rs 2.80 lakh was returned (January 2003) to SDA. Of the above expenditure, Rs 52.29 lakh were spent for creation of infrastructure for power supply but Rs 47.51 lakh were irregularly spent on purchase of electric material instead of on infrastructure for power supply. Further, vouchers/ documents in support of these purchases were also not available on record of the EE, Haryana Vidyut Prasaran Nigam (HVPN), Naraingarh though the payment was stated to have been made to the respective firms. Executive Engineer, HVPN stated (February 2004) that neither vouchers in support of purchase of material nor any inspection note was submitted to the division by the purchase committee (consisting of Executive Engineer, Accounts Officer, Sub-Divisional Officer and a nominee of the Additional Deputy Commissioner). In the absence of details of expenditure, the extent to which funds were spent on creation of infrastructure for power supply remained unverified in audit.

#### Non-electrification of dhanies due to non-conducting of survey

**3.4.16** To provide electricity to the people living in *dhanies* in rural areas of Morni Block (District Panchkula), the Board directed (December 2001) the DC, Panchkula to constitute joint survey team of HVPN and revenue staff to carry out a survey of all *dhanies* having a minimum habitat of five households. The HVPN was to frame a self contained proposal with correct cost estimation

Large number of tubewells lying non-functional for want of repair

Diversion of funds and non-submission of vouchers

Survey for electrification of *dhanies* not conducted for seeking requisite funds for the electrification of the unelectrified *dhanies*. No such survey was conducted so far (March 2004) and the work of electrification of remaining *dhanies* could not be taken up. Of the 658 *dhanies* in Morni block, 351 *dhanies* were electrified as of December 2000 but the remaining 307 *dhanies* (which might have increased over the years) had not been electrified so far and the people living in these *dhanies* were deprived of the intended benefits.

## Delay in construction of Primary Health Centres

**3.4.17** The Board released Rs 2.52 crore to PWD (B&R) during 1999-2004 for construction of Primary Health Centre buildings for promotion of health service activities in Shivalik area.

SDA released to EEs, PWD (B&R) Division, Yamunanagar, Panchkula and Ambala Rs 2.66 crore (Rs 14 lakh prior to 1999 and Rs 2.52 crore thereafter) during 1997-2004 for construction of five<sup>2</sup> PHCs but no time schedule was fixed for their completion. Further, detailed cost estimates for obtaining technical sanction were not prepared in respect of any of the PHCs. Till March 2004, only two<sup>3</sup> PHCs had been completed after incurring an expenditure of Rs 35.05 lakh and the remaining three had not been completed even after lapse of three to four years. The administrative approvals accorded initially for Rs 1.25 crore in respect of these three incomplete works had been revised to Rs 1.61 crore in the years 2001-04, an increase of 28 *per cent*. Besides, the delay in completion of works had adverse impact on making health service activities available in the Shivalik area.

## Decrease in production of vegetables, mushrooms and spices

**3.4.18** The Board took up the development of horticulture through Horticulture Department. Rs 4.90 lakh were released to District Horticulture Officer (DHO), Yamunanagar during 2001-02 for supply of certified seeds at subsidized rates to the farmers for cultivation of garlic, ginger, mushroom and vegetables to raise the income of the people of the area. As a result of supply of certified seeds, the production of vegetables, mushrooms and spices increased from 24,500 tonnes, 11.50 tonnes and 3,200 tonnes respectively in 2000-01 to 55,000 tonnes, 22 tonnes and 6,050 tonnes respectively in 2001-02. However, the production in subsequent years declined and dwindled to 46,800 tonnes for vegetables, 18.50 tonnes for mushrooms and 5,700 tonnes for spices in 2003-04 as the scheme for providing certified seeds was discontinued after 2001-02. Reasons, if any, apart from discontinuance of the scheme, for the declining trend were not intimated by the DHO and the same was mainly attributed to the discontinuance of scheme.

Even though this was the only scheme, which was directly related to increasing the income of farmers, the scheme was discontinued without any justification.

Buildings' construction cost escalated due to delay in their completion

<sup>&</sup>lt;sup>2</sup> PHC, Kot (Panchkula), Sadhaura (Yamunanagar), Pathreri, Majri and Panjokhra (Ambala).

<sup>&</sup>lt;sup>3</sup> PHC, Kot and PHC, Pathreri.

#### Inadequate coverage of income generating schemes

Schemes in the field of tourism, poultry, banking and wild life were not taken up **3.4.19** The Board was constituted for integrated development of area in Shivalik ranges by providing self-employment to improve the living standard of the people. However, no schemes in important sectors which could increase the income of the people such as tourism, poultry development, banking and wild life, were taken up though activities in these fields were envisaged in the objectives of the Board.

The CEO, SDA stated (August 2004) that the schemes under these sectors could not be undertaken due to non-receipt of proposals from the concerned departments through DCs. The reply is indicative of absence of monitoring at various levels.

#### Inadequate focus upon manpower management

**3.4.20** The Board had no manpower of its own for execution of schemes/programmes. The schemes were implemented through other concerned Government Departments, which had their own sanctioned manpower.

The Board had reviewed the vacancy position of such departments from time to time. The maximum shortage of manpower was in Education and Health Departments as indicated below:

		2000	-01		2003-04			
Education Department	Panchkula	Ambala	Yamuna- nagar	Total post vacant	Panchkula	Ambala	Yamuna- nagar	Total posts vacant
Principal/ Headmaster	22	87	42	151	23	88	57	168
Lecturers/ Teachers	16	221	278	515	16	398	306	720
Total	38	308	320	666	39	486	363	888
Health Department		2000	-01			20	03-04	
Sr. MO/MO	1	2	3	6	1	3	-	4
Other staff	37	26	38	101	36	31	36	103
Total	38	28	41	107	37	34	36	107
Grand total	76	336	361	773	76	520	399	995

Note: Manpower position indicated in the above table is of blocks of three districts falling under the Shivalik area.

The Board suggested at each meeting to these departments to fill up the vacant posts expeditiously but the vacancies continued to persist, impacting upon efficient implementation of scheme and services.

Large number of vacancies (888) at the critical level i.e. in the cadre of head of institutions/teaching staff (principals, headmasters, lecturers and teachers) had adverse consequences on extent and quality of education that was being imparted. Similarly, health care was another critical area where large vacancies of medical/para medical staff existed, adversely affecting the health care services.

Large number of posts remained vacant in Education and Health Departments The Board, however, failed to get the vacant posts filled by pursuing the matter with the Government.

#### Internal audit

**3.4.21** No internal audit system existed in the Board.

# Monitoring

**3.4.22** The Board was to meet twice a year for framing policies and exercising control over the formulation and implementation of schemes. Against the requirement of 10 meetings, only four meetings were held during 1999-2004. The Board failed to formulate any policy for formulation and implementation of specific programmes for raising the income and living standards of the people of Shivalik area.

Co-ordination Committee responsible for monitoring the progress of the schemes and reporting it regularly to the Board, was required to meet at least quarterly but it did not hold any meeting during 1999-2004 and was thus non-functional.

Shivalik Development Agency, the main executive body of the Board responsible for getting the actual programmes implemented, failed to monitor the progress of works and proper utilization of funds. Monthly progress reports were not being obtained from the implementing departments. Since there was no regular CEO or the Administrative Officer or project Officer(s) in place, the part time officers apparently could not devote adequate time and attention to the activities of the Board. It was observed in Audit that SDA held only five meetings against the requirement of having 20 meetings to monitor the progress of activities during 1999-2004.

Thus despite the high profile Board and highest level of nominees in the Board and the State Level Co-ordination Committee, the Board was not managed very professionally and its functioning was far from satisfactory, both, for programme implementation and financial management, as brought out in the previous paragraphs.

## Evaluation

Impact of the schemes not evaluated

**3.4.23** Evaluation of the schemes implemented by various departments/agencies had not been got done from any independent/outside agency during 1999-2004 to assess the impact of the schemes. The Board did not evaluate the extent of improvement, if any, in the living standard of the people of Shivalik area as a result of implementation of the schemes.

Inadequate monitoring

## Conclusions

**3.4.24** The Board did not formulate schemes/programmes on long term basis to achieve its aims, objectives and scope for raising the standard of living of the people of Shivalik area. Funds remained unutilised due to non-formulation of schemes. Delay/non-execution of works led to non-achievement of the desired objectives. Large number of tubewells remained non-functional for want of repairs. Co-ordination committee did not hold its meeting even once during last five years to monitor the implementation of schemes. The Board failed to manage the utilization of funds and implementation of schemes effectively. Neither were any parameters fixed by the Board to measure the improvement in the living standard of the people in the area nor was any evaluation got done to assess the impact of schemes.

# Recommendations

**3.4.25** As a result of the review of the activities of the Board, Audit is of the opinion that Government of Haryana should seriously consider winding up the Shivalik Development Board since it has so far not been able to give adequate special attention to the development of the three districts of Panchkula, Ambala and Yamunanagar in the Shivalik range, although this was the basic objective at the time of setting up of the Board. In case the Government still wants to continue with it, we suggest that the following recommendations may be considered to gear up the efforts of the Board:

- Shivalik Development agency should have a regular dedicated Chief Executive Officer supported by Project Officers and an Administrative Officer in order to manage the affairs of the Board professionally;
- The Board must formulate schemes/programmes on a long-term basis based on techno-economic surveys of the area, prepare Detailed Project Reports specifying special needs of the area and set measurable targets for assessing the achievements and impact on the living standards of the inhabitants of Shivalik area; and
- Evolve a system to monitor and evaluate the progress effectively for taking measures to ensure proper execution of the schemes/projects and utilisation of funds.

These points were referred to Government in July 2004: their reply had not been received (August 2004).

# Ayurveda Department

#### 3.5 Indian System of Medicines and Homoeopathy

#### Introduction

**3.5.1** Indian System of Medicine and Homoeopathy (ISM&H) covers both, the systems which originated in India and those which originated outside but were adopted/adapted in India in the course of time. These systems have wide acceptance among the public in Haryana, particularly in rural areas. The programme aimed at providing medical relief to public through Indian System of Medicines and Homoeopathy and imparting of Ayurvedic medical education through undergraduate and diploma courses.

The Financial Commissioner and Secretary to Government of Haryana, Health and Ayurveda Departments is responsible for implementation of policy decisions of the Government relating to medical and health services. Director of Ayurveda is the head of Ayurveda Department and is assisted by one Deputy Director, one Assistant Director, one Establishment Officer and one Accounts officer in the Directorate at Chandigarh. At district level, District Ayurvedic Officers (DAOs) are responsible for implementation of various health programmes.

The scheme was reviewed in audit during March 2004 to May 2004 through test-check of records for the period from 1999-2000 to 2003-04 in the office of the Director, Ayurveda and in  $6^1$  districts (out of 19) covering 200 units (out of 528 in the State) which also included the Ayurvedic College.

#### Financial outlay and expenditure

**Original** Final Year Total Expenditure on Percentage Expenditure Percentage budget expenditure budget salary and wages on medicine (Rs in crore) 1999-2000 18.06 18.65 18.55 16.93 91 0.66 4 2000-01 21.52 19.48 19.16 17.68 92 0.73 4 2001-02 21.71 21.14 20.94 18.92 90 0.74 4 2002-03 22.08 22.31 21.59 19.64 91 1.19 5 23.61 2003-04 24.55 24.02 21.41 89 1.81 8 94.58 Total 106.98 106.13 104.26 91 5.13 5

**3.5.2** The details of budget provisions and expenditure during 1999-2004 were as under:

Audit observed that per patient per annum expenditure on establishment ranged between Rs 64 and Rs 68 while on medicines it ranged between Rs 2.47 and Rs 5.70 only during 1999-2004.

Huge expenditure was on establishment

Bhiwani, Gurgaon, Jhajjar, Kurukshetra, Panchkula and Sirsa.

The table above included Central assistance of Rs 98.02 lakh (expenditure Rs 87.09 lakh) for purchase of medicines/equipment (Rs 72.50 lakh), home remedial kits (Rs 5.57 lakh), construction of girls' hostel (Rs 15 lakh), purchase of books (Rs 2 lakh) and training programme (Rs 2.95 lakh). Audit scrutiny brought out drawal of funds without immediate requirement and non-utilisation of Central assistance as discussed below:

#### Drawal of funds without immediate requirement

Essential Drugs not purchased
3.5.3 Central assistance of Rs 15 lakh for 60 dispensaries (March 2003) and Rs 47.50 lakh for 190 dispensaries (December 2003) was released by Government of India (Department of ISM&H) for the purchase of medicines from the listed government pharmacies. The department purchased medicines worth Rs 33.38 lakh upto March 2004. For the balance of Rs 29.12 lakh, the department got prepared a bank draft in favour of a firm in March 2004 for the purchase of medicines. However, medicines had not been received so far (June 2004) and the bank draft was lying with the Director, Ayurveda. Thus, the essential drugs could not be provided in backward and remote areas as envisaged in the scheme.

#### Non-utilisation of Central assistance

Non-purchase of equipments
 3.5.4 For strengthening undergraduate colleges of Indian System of Medicines and Homoeopathy, GOI sanctioned (December 2001) Rs 10 lakh (released in March 2002) for the purchase of medical equipment. The College purchased (January 2004) equipment for Rs 1.97 lakh only and balance grant of Rs 8.03 lakh had been lying unutilised (March 2004).

#### **Delivery of health care services**

Ayurvedic, Homoeopathic and Unani hospitals/dispensaries aimed at delivery of medical services to the people in the State. Scrutiny of records brought out non-fixation of norms in regard to doctor-patient ratio to assess the workload, low bed occupancy in Government Ayurvedic Hospitals, non-availability of testing facilities for determining the quality of medicines, issue of expired medicines to patients and lack of facilities of drinking water and electricity in dispensaries as discussed below:

#### Absence of norms for doctor-patient ratio

**3.5.5** Year-wise number of doctors as well as outdoor patients treated under Ayurvedic, Homoeopathic and Unani systems during 1999-2004 was as under:

Year	Number of doctors as of December every year	Number of OPD patients (in lakh)					
		New patients	Old patients	Total			
1999-2000	409	19.17	7.35	26.52			
2000-01	404	20.05	7.57	27.62			
2001-02	405	21.52	7.83	29.35			
2002-03	426	22.25	7.83	30.08			
2003-04	426	23.17	8.39	31.56			

Norms for Doctor-patient ratio not prescribed The State Government did not prescribe any norms in regards to doctor-patient ratio for dispensary/hospital for assessment of workload and requirement of doctor/para-medical staff. However, actual doctor patient ratio worked out to 1:24 to 1:27 during 1999-2004. The department did not assess the number of OPD patients for each institution in order to determine the workload. In the absence of such norms, performance of institutions and justification for their continuance and sanctioned strength for medical/para-medical staff could not be verified in audit.

The Director replied (August 2004) that a committee to give specific suggestions to assess the workload of doctors/para-medical staff was being constituted.

#### Low bed occupancy in Government Ayurvedic Hospitals

Bed occupancy in three Government Ayurvedic Hospitals was very low

**3.5.6** The bed occupancy during 1999-2004 in three hospitals was low, as indicated below:

	Ayurvedic	na Governme College and 1 Curukshetra			Governmer Hospital, B			Governme Hospital, I	
Years	No. of beds		Percent-	cent- No. of beds Percent- No. of beds		s	Percent-		
	Available	Occupied	age	Available	Occupied	pied age Available Occup		Occupied	age
	In terms of	days		In terms of days		In terms of days		f days	
1999-2000	36,500	5,134	14	9,125	2,972	33	3,650	56	2
2000-01	36,500	11,066	30	9,125	2,630	29	3,650	103	3
2001-02	36,500	6,624	18	9,125	3,143	34	3,650	43	1
2002-03	36,500	3,264	09	9,125	5,923	65	3,650	43	1
2003-04	36,500	7,317	20	9,125	4,312	47	3,650	39	1

In Shri Krishna Government Ayurvedic College, Kurukshetra, average bed occupancy ranged between 9 and 30 *per cent* only. Audit observed that non-availability of services of specialist doctors, ambulance, etc. were the reasons for low bed occupancy at the Institute. The Director, Ayurveda stated (June 2004) that the matter regarding filling up the vacant posts had been taken up with the State Government.

As regards Government Ayurvedic Hospital, Bhiwani, the District Ayurveda Officer, Bhiwani attributed (May 2004) the low occupancy to improper location of hospital building.

## Non-testing of medicines to check quality standards

**3.5.7** According to the Drugs and Cosmetics Act, 1940, the department was to ensure availability of standard quality drugs to consumers, which otherwise cause a serious problem to public health. It was, however, observed in audit that testing facilities for determining the quality of Ayurvedic, Homeopathic and Unani medicines were not available in the State. Medicines worth Rs 5.13 crore were purchased during 1999-2004. However, samples of these medicines were never got tested from any laboratory to ensure their quality. In the absence of any quality controls, possibility of issuing spurious/sub-standard drugs to patients could not be ruled out. While the

Tenth five year plan (2002-07) had a provision of Rs 38 lakh for setting up of Drug Testing Laboratory, the State Government had not provided funds during 2002-04 for the purpose.

#### Issue of expired medicines to patients

**3.5.8** Dycon<sup>2</sup> tablets, purchased by the department in the year 1997-98, had the expiry date as 30 November 1999. Ayurvedic dispensaries in Bhiwani and Jhajjar districts issued to patients 8,160 packets (30 tablets in each packet) of expired dycon tablets valuing Rs 0.97 lakh till April 2004. 1,592 packets of dycon tablets valuing Rs 0.19 lakh were still lying in the stock of DAO, Sirsa and five dispensaries in Sirsa district. The distribution of expired medicines could lead to undesirable consequences.

#### Lack of basic facilities of drinking water and electricity

**3.5.9** Out of 190 dispensaries test checked, in  $98^3$  dispensaries and in  $70^4$  dispensaries drinking water and electricity facilities respectively were not provided. However, water arrangements were made through part –time water carriers. Director stated (July 2004) that instruction had been issued to the dispensaries for providing these facilities after personally contacting the Gram Panchayats or the concerned departments.

#### Medical facilities under major therapies not provided

**3.5.10** The State Government constituted (February 1991) the Council of Haryana Institute of Alternative Medicines and Research, an autonomous body, for providing relief through various drugless therapies like naturopathy, herbal medicines, food therapy, acupuncture, acupressure, yoga therapy, etc. Subsequently, the State Government took over the Institute in January, 2000 alongwith the staff (Acupressurist-I, Homeo Medical Officer-I, Chowkidar-1, Sweeper-1), as part of the Ayurveda department in Government.

It was noticed that treatments in naturopathy, herbal medicines, food therapy, acupuncture and yoga therapy, etc. had not been started ever since the inception of the Institute in 1991. Thus, the Institute could not fulfill its aims and objectives, as major therapies had not been introduced despite lapse of four years even after the State Government took over the Institute. Director stated (August 2004) that these therapies could not be provided as the qualification for specialists for these therapies were yet to be prescribed by the State Government.

8,160 packets of expired dycon tablets were issued to patients

Basic facilities of drinking water and electricity not provided

Major therapies not introduced in the Institute

<sup>&</sup>lt;sup>2</sup> Dycon tablets are meant for the treatment of dysentery.

<sup>&</sup>lt;sup>3</sup> Bhiwani : 7, Gurgaon : 41, Jhajjar : 13 and Sirsa : 37.

<sup>&</sup>lt;sup>4</sup> Bhiwani : 3, Gurgaon : 38, Jhajjar : 9, Kurukshetra : 7, Panchkula : 8 and Sirsa : 5.

## Shortage of doctors and para-medical staff

**3.5.11** Against the sanctioned posts of 553 doctors and 1090 para-medical staff, 84 and 250 posts respectively were vacant in the department (except Shri Krishna Government Ayurvedic College, Kurukshetra) as of December 2003.

The Director stated (June 2004) that vacant posts could not be filled due to ban on recruitment by the State Government and steps had now been taken to fill all the vacant posts after obtaining permission from the Government.

# Medical education facilities

Shri Krishna Government Ayurvedic College and Hospital, Kurukshetra, earlier in private sector, was taken over by the State Government in June 1975. The institute offers undergraduate course namely Bachelor of Ayurvedic Medicines and Surgery (BAMS) and also provides medical treatment facilities to the people. From 2001-02, a diploma course in Ayurvedic Pharmacy was started. The institute incurred an expenditure of Rs 5.92 crore on these activities during 1999-2004.

Scrutiny of records revealed shortage of teaching staff, more than 50 *per cent* of total seats for diploma in pharmacy remaining unutilised, inadequate growing of species in herbal garden, insufficient number of indoor patients for practical training to students, non-purchase of ambulance, etc. as discussed in the following paragraphs:

# Shortage of teaching staff

**3.5.12** As per norms laid down by the Central Council of Indian Medicines (CCIM), in March 2001, 43 faculty members (Professors: 12, Readers: 14 and Lecturers: 17) were required for 14 teaching departments of the college but the Institute had a sanctioned strength of only 19 posts in various cadres (Professors: six, Readers: five and Lecturers: eight) of which only eight to 11 posts were filled during 1999-2004. Five posts of Professors and two to three posts of Readers remained vacant during this period.

Further, the post of the Principal remained vacant during 1999-2004 and his functions were being discharged by a professor.

For diploma course in Pharmacy, no separate teaching staff was sanctioned and the teaching work was being done by BAMS faculties, which were already short of requirement. Thus due to absence of adequate teaching staff, there was every likelihood of quality of education being affected.

A team of CCIM during inspection in June 2002 and an Inspection Committee from Kurukshetra University in March 2004 also stressed the need for filling up the vacant posts of teaching staff.

The Director stated (June 2004) that the posts could not be filled up due to ban on recruitment. He further stated that the demand for recruitment had been

Against the requirement of 43 teaching staff, only 8 to 11 were in position sent to Haryana Public Service Commission after getting special permission from the Government to fill the vacancies.

#### Seats of education courses remained vacant

**3.5.13** The college had intake capacity of 50 students each for BAMS and Diploma course in Pharmacy. During 1999-2004, all the seats of BAMS were filled except six to eight seats meant for Non-resident Indians and three seats for management quota, etc. in the years 2001-04. However, for diploma course in pharmacy, 26 to 29 seats, which constituted more than 50 *per cent* of intake capacity, remained vacant during different years ever since the course was introduced in 2001-02.

#### Inadequacies in imparting practical training

**3.5.14** The College had a Pharmacy for imparting practical training to the students. Scrutiny of stock register of pharmacy department revealed that meagre quantities of material/raw medicine (*Desi Ghee*: 1.2 kg; *Gandhak*: 1 kg and cloth: 11 metres) were issued to the Pharmacy for the purpose of practicals during 1999-2004.

The Principal stated (April 2004) that practicals were undertaken as per syllabus and the students arranged raw material themselves. Reply was not convincing as no record of medicines prepared during the course of practicals was shown to audit.

## Inadequate plantation in herbal garden

**3.5.15** As per standards and requirements laid down by CCIM, there should be a Herbal Garden not away from the Ayurvedic college and it should grow all possible herbal plants; atleast 100 species relevant to the syllabus of Dravyaguna and 400 plants of other species useful for identification and demonstration. Accordingly, for setting up a Herbal Garden at Kurukshetra adjoining the College, GOI released a grant of Rs 5 lakh in August 1998.

The college could utilize only Rs 1.23 lakh up to March 2004. Only 46 species of herbal plants were grown against the minimum requirement of 100 species. Irrigation/green house facilities were not provided in the garden.

The Principal stated (April 2004) that grant could not be utilised due to other construction works in the college campus. The reply was not satisfactory considering that the grant was received about six years back.

## Insufficient indoor patients for practical training of students

**3.5.16** The College had 15 beds each in the department of Prasuti Tantra, Shalya Tantra, Shalkya Tantra and Kumar Bhritya. The number of indoor patients in these departments was negligible as average patients per year ranged between one and seven during 1999-2004. As per CCIM norms, bed occupancy to the extent of 60 *per cent* was necessary for imparting training to

Inadequate number of species were grown in the herbal garden

More than 50 *per cent* seats of diploma in

pharmacy course

remained vacant

BAMS students. As such sufficient number of patients was not available for BAMS students/internees for their practical training.

# Non-purchase of ambulance

**3.5.17** The State Government provided (February 2003) Rs 5 lakh for the purchase of an Ambulance for the Ayurvedic College at Kurukshetra to facilitate transportation of patients from and to the hospital. The department, instead, purchased 192 display boards in March 2003 at a cost of Rs 4.99 lakh as the sanction for the purchase of ambulance was not received from the Government. Sanction to regularise the diversion of funds had not been obtained (June 2004) from the Government.

# Post of pathologist not provided for laboratory tests

**3.5.18** The hospital laboratory provided facilities to indoor/outdoor patients for testing blood, urine, stool, etc. to help proper diagnosis of diseases. During 1999-2003, 19,445 tests were undertaken.

As per norms of CCIM, there was requirement of atleast one Pathologist for the Laboratory, but the same had not been provided by the State Government. Test reports were prepared by the Laboratory Technician, which could not be treated as reliable. It was observed that the test reports were used for diagnosis of diseases and further treatments though the reports were not authenticated by a Pathologist.

# Conclusions

**3.5.19** Major expenditure of the department was on establishment. Doctorpatient ratio was not prescribed to assess the work load and requirement of doctor/para-medical staff. Bed occupancy in hospitals was very low. Medicines supplied to various institutions were not being tested to check their quality and even date expired medicines were issued to patients. Large number of posts of doctors and para-medical staff remained vacant. In Shri Krishna Government Ayurvedic College and Hospital, Kurukshetra, there was acute shortage of teaching staff. More than 50 *per cent* seats for diploma course in pharmacy remained unfilled. All these factors led to deficient medical services in the State in the Indian system of medicines and homoeopathy.

## Recommendations

**3.5.20** The department should consider to:

> initiate expeditious and co-ordinated efforts for deployment of required manpower in hospitals, dispensaries and the Medical Education Institute with a view to obtaining effective utilisation of infrastructure created;

Laboratory tests reports prepared by laboratory technicians were not authenticated by Pathologist > prescribe doctor-patient ratio to assess the workload and requirement of doctors/para-medical staff;

 $\succ$  make arrangement for testing medicines to ensure quality standards; and

 $\succ$  evolve system to guard against issuance of expired medicines to patients.

These points were referred to the Government in July 2004; their reply had not been received (November 2004).