Accumulation of silt in the reservoir of Tungabhadra Dam has seriously reduced its storage capacity

By P.K. Hariyabbe

Large deposits of silt in the Tungabhadra reservoir, which paved the way for the green revolution in about 14 lakh hectares in Karnataka and Andhra Pradesh, have reduced the water storage capacity. This has fallen by about 22 feet during the last 35 years. If the trend continues, the entire reservoir area may become a dry expanse of land in the next few decades.

This being the first and biggest masonry dam in the region, builders did not foresee the silt problem. Thus adequate steps were not taken to avoid flow of silt into the reservoir.

The catchment area is 26,856 sq miles and the maximum water discharge is about 3,30,000 cusecs, which is considerable during monsoon. Maximum rainfall in the catchment area is about 170 inches in the Western Ghats. Minimum rainfall is 20 inches in the plains. While the water flows into the reservoir from the catchment, a large amount of silt also enters the reservoir.

DUST FROM MINES

Besides this, due to mining operations in Sandur taluk, near the reservoir, a large volume of blue dust is deposited which enters the reservoir along with water. Thus, for the first time, the reservoir's waters touched the Hagenbanmanahalli-Hospet road. Onlookers could see the silt deposit brought from the hills during rains on the road rising to 2 to 3 feet.

Though afferestation has been taken up in the catchment area, this does not appear to check siltation. Effective measures like putting gully plugs cannot be taken up, but this has not been done on a large scale.

A spokesman of the Tungabhadra Project said a Rs 10 crores proposal for massive afforestation was sent to the State Government but it has been shelved. Union Water Resources Minister B Shankaram, who visited the project two years ago and reviewed the silt problem with engineers, told newsmen he had announced a special programme to avoid silt throughout the river bank and few areas of the catchment. This programme has, however, not yet been launched.

EXPERT OPINION

To remove silt from the nearly 140 sq miles area of the reservoir is a stupendous task and would cost several crores of rupees besides men and machinery. In doing this, both the Karnataka and the Andhra Pradesh Governments would have to share the expenditure as both States derive the benefits of irrigation and power generation. But both the Governments do not appear serious about the silt problem.

Karnataka engineers feel the water storage loss due to silt can be overcome by raising the crest gate level of the dam by two feet. The Andhra Pradesh Government is not in a mood to consider this proposal, as the State benefits when the reservoir overflows the water flows into the Srisaila project in Kurnool district.

A section of farmers feels it would be advantageous to remove the silt from the Tungabhadra reservoir, as the same could be used as manure under BLEGDP and NREP. Some feel the silt can be exploited to manufacture good quality tiles, but unfortunately tiles are not used in this region.

If there is no change in the attitude of the Governments of two States towards the siltation problem, the region could well become a desert.
Special wasteland project
for Bellary

From Our Delhi Bureau
NEW DELHI, May 5 — Bellary District in Karnataka has been selected under the restructured programme to prepare detailed village level auction plans for integrated management of wastelands.

The action plans for integrated management of wastelands include treatments like soil and moisture conservation, grass and tree cover.

The Ministry of Environment and Forests has sent guidelines in this regard to the Governments of Karnataka, Rajasthan, Orissa, West Bengal and Uttar Pradesh for preparation of district-level plans. One district in each State has been selected for village development plans.

The National Wastelands Development Board in conjunction with the National Remote Sensing Agency and the Survey of India had undertaken a survey to identify the wastelands in the country. Under the project, wastelands maps have been prepared for selected 146 districts in 19 States. The survey has shown 13 categories of wastelands. On the basis of this wastelands identification survey, a restructured programme for wastelands development has been drawn up.

TEAMS Multi-disciplinary teams are being set up in these five districts, under the leadership of the Deputy Commissioners. The methodology developed would then be adopted for the preparation of such plans in the remaining 141 districts.

Another thrust area under the restructured programme is reclamation of lands having special disabilities. The Centre proposed to reclaim such problem lands by extension of appropriate available technologies, in order to make them suitable for bio-mass production.

The National Wastelands Development Board was set up in June 1985, with the principal aim of reclaiming wastelands in the country through a massive programme of afforestation and tree planting to meet the major ecological and socio-economic crises brought about by continuing deforestation.
By Kamla Mankeluu

Almost 70 per cent of agricultural operations in India are handled by women, and the tasks conventionally assigned to them are physically more strenuous and economically less rewarding than those performed by men. The need, therefore, for evolving new technologies to raise productivity and improve their working conditions, assumes importance. It was this problem that some 500 scientists, planners, administrators, policy makers and representatives of non-government organisations addressed themselves to at a recent conference at New Delhi.

The conference on agricultural technologies for farm women, as it was called, set itself the objective of sensitising farm scientists towards the needs of women and identifying technologies that would reduce drudgery, improve efficiency and create more jobs. However, the conclusions reached after week-long deliberations were vague.

Primarily, the participants provided no fresh insight into the prevailing problems of farm women, nor were their recommendations any different from those of similar earlier conferences. There is no dearth of reports and recommendations made by study groups over the years, suggesting measures to improve the lot of these women. The need of the hour is to implement some of the policies and programmes which have long been accepted by authorities at various levels.

The New Delhi conference laid emphasis on raising living standards and overall prosperity of village communities so that some of the benefits would percolate down to the women. The immediate need is to provide them the tools and means to reduce drudgery and raise incomes was effectively stressed. Also relevant is the need to devise methods for making available fuel and drinking water so that instead of spending long hours trekking distances for acquiring these basic necessities, women have the time for productive activity and some leisure to acquire skills and improve the quality of their lives.

Scientists have a point in stating that technologies are gender neutral. Indeed, implements are the same for specific jobs, whether handled by a man or a woman. Yet, for certain jobs like weeding, transplanting, picking cotton, plucking chilies and tea leaves, which are assigned to women only, technologies have not been developed at all. In the process, women are left exhausted with bruised hands, bleached fingers, back aches and cramps.

The depressing situation is perpetuated because neither women demand better facilities for work, nor are employers sympathetic to their plight. And if mechanisation is introduced in the jobs traditionally handled by them, men step in and take over! The major obstacle, usually tendered for this unfair displacement, is that women are not receptive to new ideas and in any case, being mostly illiterate, cannot easily absorb fresh know-how.

This is a fallacy. Though formal education improves receptivity and absorption of new technologies, illiteracy is not an impediment for acquisition of skills. In the various Krishi Vigyan Kendras, where women are trained in new job methods, the system adopted is “learning by doing.” It has been observed that women are always eager to imbibe knowledge and more than enthusiastic in improving their status and earning capacity. As suggested in the conference, mobile training teams should be organised to teach women who are unable to take up residential courses at the Krishi Vigyan Kendras. Above all, it must be ensured that new technology does not displace women and they themselves are helped to improve their skills and efficiency through appropriate training.

Another recommendation of the conference relates to design development and testing of agricultural implements with active participation of rural women. However, as it is not practical at this stage to expect existing women’s organisations in India to develop and manufacture farm implements, it would be more prudent to devise programmes for training in skills like carpentry and smithy.

The concept of farming today has been broadened to include fisheries, forestry, animal husbandry, horticulture and allied occupations, besides crop cultivation. In all these, women’s organisations like Mahila Mandalas can play a more decisive role than merely organising “kurti” classes and classes for cooking, embroidery and tailoring. For instance, developing veterinary skills and helping in weavmg fishing nets could engage their attention.

Subject to the availability of funds, educational and farm training programmes may be introduced. However, it is for the grant giving agencies to insist that besides organising entertainment programmes, funds are put to productive use. It might also be useful to attract girls from peasant families to undertake courses in agricultural research, education and extension work. According to recent studies, nearly 35 per cent of the rural households in the country are headed by women and these are among the poorest in a community. Many of these women have been seeking loans to buy milch cattle, sheep and poultry as means to generate income and become self-sufficient. But as they generally do not own assets to serve as loan security, financial institutions are reluctant to entertain their requests. Moreover, the procedures for obtaining loans are so cumbersome that many deserving women just give up out of sheer frustration. Those who do manage to get funds soon realise that their income from an investment goes almost entirely in repaying the loan instalments along with interest. As they are not offered any guidance or trained in undertaking new activities, they tend to suffer heavy losses and the loans prove more of a burden than help.

All apprehensions in this regard stem from the root problem of illiteracy. For some odd reason, the potential of the mass media, especially radio and television, has not been fully exploited in disseminating information to farm women. Probably, the only obstacle in pursuing this is that many women do not enjoy the privilege or leisure to hear and watch programmes like their men folk. — PTI Feature