

Report on

*Evaluation of Sample Checks of
Afforestation / Tree Planting Activities
During 2005 -06 in Raipur District,
Chhatisgarh State*

Forwarded to

Inspector General of Forests, Govt. of India, Ministry of Environment & Forests,
National Afforestation & Eco-Development Board (NAEB),
Paryavaran Bhawan, 7th Floor, Cgo Complex, Lodhi Road, New Delhi-110003



By

R P Mattoo,

PA M&E, CPM& MIS, Project Management & Planning Sector Expert

For **NATURAL RESOURCES INDIA FOUNDATION (NRIF)**

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Punjab; Himachal Pradesh; J&K; Karnataka; Uttaranchal; Uttar Pradesh; Andhra Pradesh;
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Executive Summary

□ In district Raipur, during the year under reference, only FDA has undertaken the plantations. The total sites treated during the year 2005-06 have been nine covering an area of 400 ha. In order to have 100% coverage it was considered to enumerate all the sites with prescribed sampling methodology prescribed by NAEB.

□ The survival assessment through sample checks has been extensively undertaken during mid October 2006, as per the convenience of the DFO and his staff; covering all the nine-sites planted during the year under reference. The Consultant is pleased to submit this evaluation report as per methodology and findings given in proceeding chapters. The plants were also judged from their health point of view mostly through evaluator's judgment. The local staff available at the site also provided the necessary logistics.

□ The necessary interaction was also held with community in general and JFMC in particular to understand their opinion on level of survival and also a future road map for its sustainability. In each site enumerated, 10-20 villagers depending on their availability were interacted. The major aspects of discussion clustered around sapling quality, nursery, advance work, plantation, maintenance, species selection and protection etc.

□ The treatment prescriptions appear to be uniform and well received by implementing agency since, the deviations in results are almost negligible. The scheme-wise survival

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← of plants planted in year 2005-06 was: a) FDA, Forest Land-under Artificial Regeneration (9,500 sample plants) with 82% survival rate; b) FDA, Forest Land-under Management Intervention (7,500 sample plants) with 87% survival rate.

□ In terms of results by schemes, survival under management intervention is on higher side compared to the artificial regeneration. However, considering the site condition with poor soil moisture regime and biotic pressure, the survival under both the schemes can said to be excellent.

□ The overall survival at 88% is undoubtedly an excellent performance after more than one year of plantation. It should be noticed that the plants have already crossed one summer season with temperature soaring to 48° C.

□ The poor soil moisture regime in few pockets has further added to mortality otherwise the survival would have been cent-percent. Scarcity of water has also adversely affected the plants however; it is maintenance and protection, which has pushed the survival at such a high rate. Casualty has been most in case of teak due to poor planting material.

□ Some of the saplings were below average health not hardened enough to cope up with the field situation and hence could not survive. All the other species have done fairly well.

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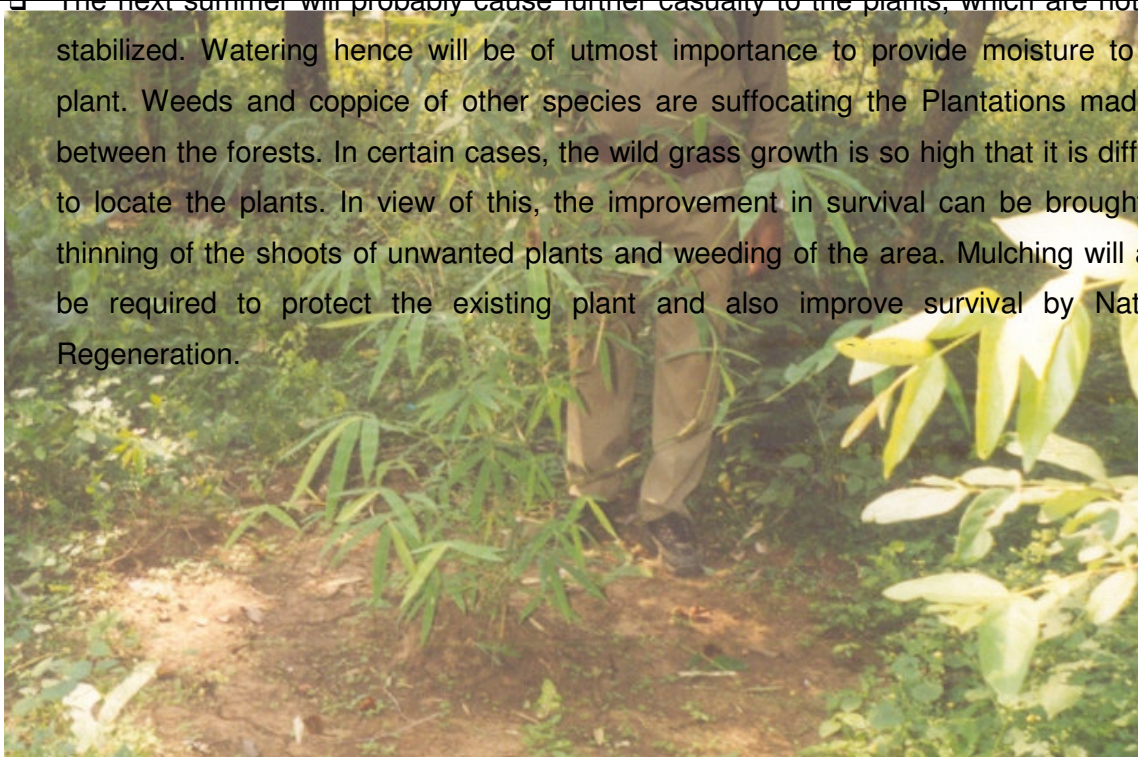
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← The survival in case of *Jatropha* is also very high. The high rate of survival has also been maintained through replacement plantation. Mostly, new one has replaced the plants dead after two-three months of plantation.

The next summer will probably cause further casualty to the plants, which are not yet stabilized. Watering hence will be of utmost importance to provide moisture to the plant. Weeds and coppice of other species are suffocating the Plantations made in between the forests. In certain cases, the wild grass growth is so high that it is difficult to locate the plants. In view of this, the improvement in survival can be brought by thinning of the shoots of unwanted plants and weeding of the area. Mulching will also be required to protect the existing plant and also improve survival by Natural Regeneration.



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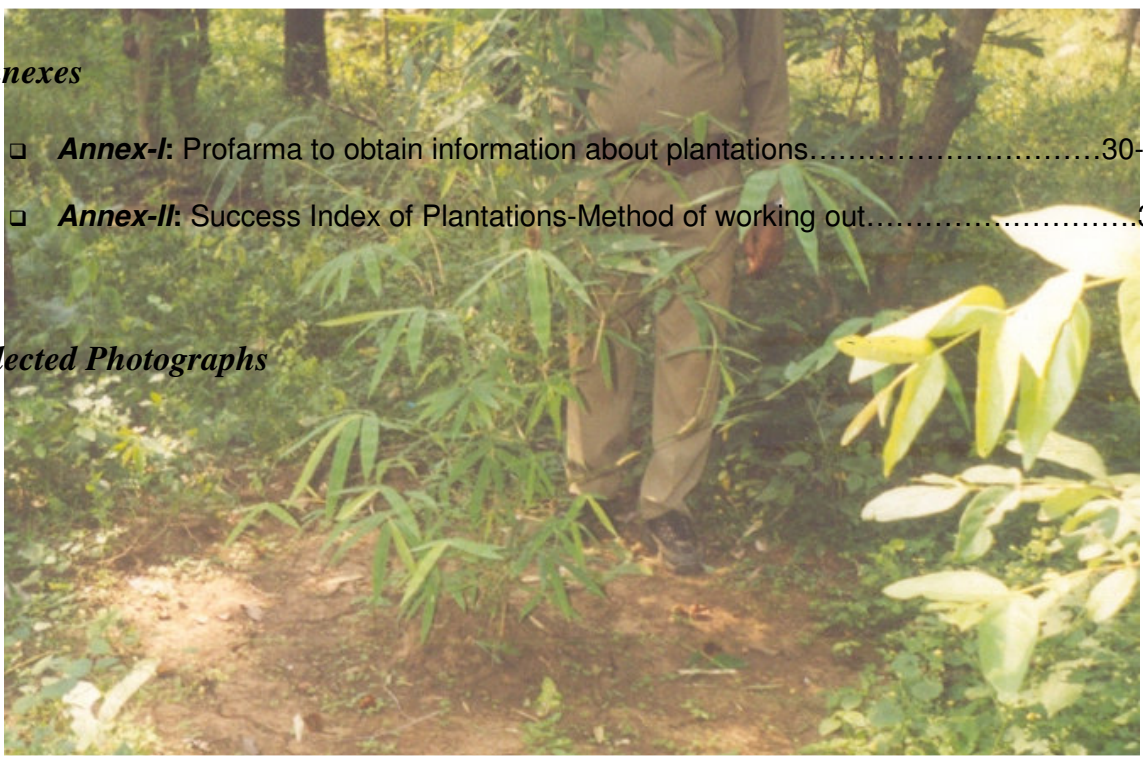
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