

EXTERNALLY AIDED PROJECTS

Project 1: Studies on developing alternative methods of sustainable harvesting of medicinal plants. [ID No.134/TFRI/2008/NWFP-1(NMPB) (22)]

Status: Surveys were conducted to various agro-climatic regions of Madhya Pradesh, Chhattisgarh and Orissa for selection of targeted species i.e. *Terminalia arjuna* (Arjuna), *Bauhinia variegata* (Kachnar), *Holarrhena antidysenterica* (Kutaj), *Oroxylum indicum* (Sheonak) and *Saraca asoka* (Ashoka) growing areas. Experiments were laid out for standardization of sustainable harvest of plant parts of targeted species in forest areas of Jabalpur, Rewa, Satna and Balaghat (M.P.); Harishankar, Bolangir (Orissa); Dhamtari (Chhattisgarh). *Terminalia arjuna*, *Bauhinia variegata* and *Holarrhena antidysenterica* are available in the forests of central India. However, *Oroxylum indicum* and *Saraca asoka* populations were found out only in Orissa. Harvested plant parts like bark, leaves, twigs etc. were collected and brought to laboratory for chemical and biological analysis. The collected plant samples were processed and analyzed for their active chemical constituents e.g. tannins, alkaloids, phenols and flavanoids. Samples were also sent to Central Institute for Medicinal and Aromatic Plants, Lucknow for detailed chemical and biological analysis.

Project 2: Establishment of multilocational trial of superior accession of *Jatropha curcas* under the network programme of DBT. [ID No.135/TFRI/2008/NWFP-2 (DBT)(23)]

Status: A multilocational trial of *Jatropha curcas* comprising of seven accession received from different participating institutes has been laid out at institute campus. These accessions include three from HNBU Garhwal, three from NBRI Lucknow and one from Bio-tech Park Lucknow. The experimental field was divided into 28 equal size blocks and nine plants were planted in each block at the distance of 3 x 3 meter. The trial is performing well and the survival is more than 90 %. Observation on growth attributes like height, collar diameter, number of branches and flowerings has been recorded on monthly basis and sent to biotech park, Lucknow for detailed analysis. Seeds of seventeen accessions were received from different participating institutes for establishment of half sib progeny trial.