

International Symposium

on

# Breeding and Improvement of Asian Conifers during 20<sup>th</sup>Century

11th to 13th September, 2006

at

# Forest Research Institute, Dehradun, UA, India







#### Organized Under

IUFRO Working Party No. 2.02.23 (Breeding and Genetic Resources of Asian Conifers)

Organized by

Indian Society of Tree Scientists, Nauni, Solan-173230, India

&

Forest Research Institute, Dehradun – 248 006, India

## **BACKGROUND**

Conifers are the important class of the gymnosperms with 6 living families representing nearly 50 genera and more than 560 species and have been contributing immensely both to the productivity of forests and conservation of sites. Conifers are identified as erect evergreen trees to grow as dense forests, forming a characteristic feature of vegetation of the temperate climate. Some conifers like Junipers grow in extreme climatic and edaphic conditions, either beyond the limit of the tree line (*J. communis* var. nana), on rocks (*J. prostrata*) or in the arid cold desert (*J. macropoda*). Nonetheless, under suitable conditions they grow luxuriantly well and produce exceptionally higher yield. The group is also identified with the tallest (Sequoia sempervirens), oldest (Pinus aristata) and gigantic (Sequoidendron giganteum) trees. Whereas species like Pinus gerardiana yield highly priced edible nuts.

The common conifers like *Larix*, *Abies*, *Pinus* and *Cryptomeria* have particularly been improved genetically for productivity. But a large amount of endemism also exists in the group with some genera and species confined to Japan, China and the Himalayan region. At the same time about 140 species (16%) of the group are known as threatened.

Amongst all forest species, conifers have maximally been improved genetically and enabled establishment and development of monocultures or plantations with high productivity. Utilization of heterosis through intra- and inter-specific hybridization has contributed immensely towards higher productivity. Japanese, Korean, and Siberian larch hybrids, and hybrids of pine in Korea have been in use for almost a century now. Hence it is imperative to review the progress of conifer breeding and improvement and also define the challenges that lie ahead.

The Symposia therefore would revolve around the following broad sessions:

Session I : Genetics and breeding

Session II : Role of molecular markers in improvement

Session III : Endangered species and conservation

Session IV : Silviculture and management

Session V : Reproductive biology and seed orchards

Session VI : Industrial utilization

#### **Location and Climate:**

Dehradun, the capital of the newly formed state of Uttaranchal, lies at the center of the Doon valley (about 600 m above msl), bounded by the Himalaya in the north and Shivaliks in the south. The city is approximately 260 km from New Delhi and is well connected through road, rail and air. The city is a proud host to numerous institutions and research centers of national importance such as Survey of India, Botanical Survey of India, Indian Institute of Remote Sensing and Indian Military Academy. The Forest Research Institute (FRI) is situated on the Chakrata road about 5 km from the railway station and has all the necessary facilities including guest house, hostels well-equipped seminar and conference hall. The weather during September is normally pleasant with temperature ranges of 15 to 30° C with occasional showers. Normally light clothing is required during this month but sometimes light woolens are required.

#### **Boarding/Lodging:**

Accommodation is available in the FRI campus in the Rest Houses and Scientist Hostels at a nominal cost. However, the participants who wish to stay in hotels will have to meet the cost of the stay. The organizers shall render assistance for reservation of the hotels, etc. Accommodation in the Guest House will be provided on first come first serve basis. There are good multi-cuisine hotels available in the city ranging from US\$ 40 to US\$ 100.(Please note that the registration fee does not include accommodation charges)

#### **Registration Fee (nonrefundable/nontransferable)**

Participants/delegates (Foreign) : US\$ 150

Participants/delegates (SAARC countries) : Rs 3000 INR

Accompanying person (Foreign) : US \$ 100

Corporate delegates (SAARC countries) : Rs. 3000 INR

Students (With identity cards) : US\$75/Rs. 1500 INR

The registration fee may please be sent to the Organizing Secretary (Conifer-Asia-2006), Indian Society of Tree Scientists, UHF Campus, Nauni, Solan – 173 230, H.P. Registration fee includes symposium material, sessional tea and local transportation. Boarding & lodging for the participants and the accompanying person(s) would be arranged on request with prior payment of at-least one days advance. However, the details of such a participant should reach the organizers well in advance. Field trips to Pine forests of Mussorie, or Cedrus-Abies-Picea coniferous forest of Kullu-Manali-Rohtang Pass or

Chandigarh-Shimla-Narkanda are optional and can be arranged on Participants request through Tourism Development Corporations of Uttranchal or Himachal Pradesh. The participants can visit the sites (<a href="http://www.uttaranchaltourism.gov.in">http://hptdc.nic.in</a>). for other tours and bookings.

#### **Submission of Abstracts**

Intending participants are invited to submit one page abstract (s) of the paper (s) and/or poster (s) in English for presentation at the symposium. The abstracts many please be sent by surface or electronic mail to the organizing secretary before **May 31, 2006** with following details:

- \* Title of paper
- \* Author (s)
- \* Address for correspondence (e-mail address)
- \* Name of the author/ presenting paper (underlined)
- \* Passport No., place of issue, date of issue, expiry date (for foreign delegates only)
- \* Affiliations of author (s)
- \* Abstract (300 words)
- \* Key words (4-5)

Full-length paper/articles for selected abstracts to be submitted positively by July 31, 2006 electronically (CD/3.5" floppy diskette) typed in Times New Roman (12 font size), alongwith a hard copy. The full-length papers/articles would be edited by the group of eminent researchers and published in the proceeding of the symposium.

#### DATES TO REMEMBER:

Registration details and expression of interest : March 31, 2006

Submission of Abstracts : May 31, 2006

Submission of full papers : July 31, 2006

Receipt of Registration fee : August 31, 2006

### **International Organizing Committee**

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