



ICFRE NEWSLETTER

Vol 21 No. 9 September 2021



Azadi ka Amrit Mahotsav

- The National Campaign 'Ayush Aapke Dwar' aims to distribute medicinal plants freely throughout India to create awareness on medicinal plants. In this connection, the IFGTB, Coimbatore, in close association with the National Medicinal Plants Board organized a seedling distribution programme on 3 September 2021. The programme was organized in association with CUBE - Centre for Urban Biodiversity Conservation and Education, an organization that creates awareness about urban biodiversity and promotes urban greenery. 50 persons participated in the programme.
- IWST, Bengaluru organized a webinar on "Sandalwood farming and management of its health in Tamil language, on 20 September 2021. Stakeholders and Farmers from Tamil Nadu attended the webinar.
- IWST, Bengaluru organized a webinar on Identification, Certification and Utilization of Timber on 27 September 2021. Participants from Wood industries, forest department, agriculture universities & researchers attended the webinar.
- TFRI organized a webinar on "Increase in Forest Productivity through Tree Improvement" from 6 to 12 September 2021. 35 Scientists, Students, Technical officers and Research scholars participated in the webinar.
- IFB, Hyderabad conducted the Freedom Run inside the IFB campus on 1 September 2021. 35 persons participated in the programme.
- IFB, Hyderabad organized a webinar on "Scientific achievements and technological advancement in India", from 20 to 24 September 2021. 150 persons participated in the programme.

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- FRC-CE, Visakhapatnam along with an NGO, Wildlife Conservation Through Research and Education (WCTRE) organized a Beach cleanup programme on the eve of International Coastal Cleanup Day with the theme for 2021 as Trash free Seas on 18th September 2021.



Webinar on Identification, Certification and Utilization of Timber at IWST, Bengaluru



Tree planting as a part of webinar on Increase in Forest Productivity through Tree Improvement at TFRI, Jabalpur

Significant Research Findings

Forest Research Institute, Dehradun

- Biodiversity assessment survey was carried out along the 10 km radius of the dam site on the river Ravi, in Chamba district for birds and butterflies. A total of 31 species of butterflies and 35 species of birds were sampled. Secondary data was also collected from Forest Department of the adjacent Kukti Wildlife Sanctuary, (that lies in the boundary of the impact zone).
- Kairomones based extracted bast samples, IPM, ML, HXD, MA, DLH and BP were tested for bioassay in both the sexes of Hoplo beetle with Olfactometer in the laboratory and analysed data showed that HXD and MA compound have maximum attraction towards *Hoplocerambyx spinicornis* beetle. Rearing of field collected insects was carried out in the laboratory.
- Survey for sampling of moths was carried out in the Shiwaliks in Kalesar Wildlife Sanctuary, Haryana; Simbalbara Wildlife Sanctuary, Himachal Pradesh and Timli Forest, Dehradun Forest Division, Uttarakhand. A moth screen with CFL lamp was used for sampling and collection of moths. 45 species of moths belonging to 8 families were recorded and 12 specimens preserved. The moth database was updated with 180 species belonging 10 families.
- *In vitro* α glycosidase inhibitory activity of the 25% aqueous methanol extract isolated from *Cupressus torulosa* needles was determined. The extract displayed bioactivity comparable to the positive control Acarbose.
- Antioxidant activity of the fatty oil isolated from *Princepia utilis* seeds using DPPH free radical scavenging assay was examined and the oil was found to display notable antioxidant activity.
- Extraction of aerial parts of *Eupatorium adenophorum* with solvents of eluotropic series was done. The yield of the petroleum ether, chloroform and methanol extract was found to be 8.0, 5.96 and 11.0 percent respectively.
- Established field trial on use of hydrogel for increasing availability of soil moisture and use of waste-treated soil for increasing soil fertility at Global Centre for Nuclear Energy Partnership (GCNEP), Bahadurgarh. Four species have been planted in the field trial.

Institute of Forest Genetic and Tree Breeding , Coimbatore

- The X-Ray diffraction (XRD) pattern of nano chitosan and nano chitosan encapsulated fungal endophyte powders showed the presence of crystallographic structures and characteristic diffraction peaks. The XRD study of nano chitosan encapsulated fungal endophytes viz., *Aspergillus terrus*, *Lecanicillium lecanii*, *Trichoderma harzianum*, *Acremonium borodine* nse, *Colletotrichum* sp. *Aspergillus* sp. exhibited a characteristic peaks at 10° and 20° which is the typical fingerprint of semi-crystalline chitosan known for a crystalline and amorphous structure respectively.
- Leaf transcriptome of *Gmelina arborea* was mined for microsatellite repeats and twenty primer pairs including tri (15), tetra (3), penta (1) and hexa (1) repeat motifs were designed and synthesized. The PCR conditions were optimized.

Arid Forest Research Institute, Jodhpur

- Ten candidate plus trees of Shisham have been marked and identified at Gujarat.
- Isolates of Ganoderma and Fusarium, casual agents of Shisham mortality, has been isolated from Shisham trees in Gujarat region.

Himalayan Forest Research Institute, Shimla

Needles of conifers were screened for the mass cultivation of *Trichoderma* species and maximum sporulation (5.71×10^6 spores/mg) was observed on *Pinus roxburghii* needle powder supplemented with potato dextrose broth and yeast extract.

Memorandum of Understanding

- An MoU has been signed by TFRI, Jabalpur with Forest Department, Chhattisgarh for smooth operation of approved extension activities under Van Vigyan Kendra on 14th September 2021.
- An MoU was signed between AFRI, Jodhpur and DFO, Social Forest Division (Himmatnagar, Sabarkantha), SFD, Gujarat on 17 September 2021.
- An MoU was signed between HFRI and Pradhan, Gram Panchayat, Rajhana, Shimla, HP (India) on 23 September 2021 at HFRI for establishment of Demonstration Village (DV) at village Baragaon, Gram Panchayat Rajhana, Shimla (HP).

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Tree Growers Mela/Exhibition

Institute	Organized/Participated	Duration	Place
IFGTB, Coimbatore	Tree Growers Mela	17 September 2021	Gobichettipalayam, Erode District
HFRI, Shimla	Exhibition: Destination Himachal Pradesh – 2021	28-30 September 2021	Centarosa Resort Majhgaon Village, Himachal Pradesh



IFGTB, Coimbatore organized Trees Growers Mela



HFRI, Shimla participated in Exhibition: Destination Himachal Pradesh – 2021

Workshops/Seminars/Meetings

S.No.	Topic	Duration	Beneficiaries
Forest Research Institute, Dehradun			
1.	Webinar on Income Enhancement from Agroforestry	16 September 2021	-
Institute of Forest Genetics and Tree Breedings, Coimbatore			
2.	Seminar on "Sensitization of Researchers on Bio-safety and Chemical Safety Guidelines"	28 September 2021	Scientists, Officers, Technical staff members and Scholars

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| 3. | Seminar on Population Genetics and Genomics Research for Conservation, Climate Adaptation, Sustainable Management and Breeding of Tropical Trees | 29 September 2021 | Research Scientists |
|----|--------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|---------------------|



Seminar on Sensitization of Researchers on Bio-safety and Chemical Safety Guidelines at IFGTB, Coimbatore



Seminar on Population Genetics and Genomics Research for Conservation, Climate Adaptation, Sustainable Management and Breeding of Tropical Trees at IFGTB, Coimbatore

Institute of Wood Science and Technology, Bengaluru

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| 4. | Stakeholders meet (through VC) to discuss the concerns raised by Department of Promotion of Industry and Internal Trade (DPIIT) regarding limited availability of certified wood for furniture industry, zero import duty on certified wood | 24 September 2021 | Stakeholders from furniture & wood industries participated |
| 5. | Research Advisory Group meeting | 23 September 2021 | ADG (RP), ICFRE, Director, GCR, Officers, Scientists, CTO, ACTO, and STO of IWST |
| 6. | Webinar on Bamboo Propagation and Management | 17 September 2021 | Farmers and state government departments |

Tropical Forest Research Institute, Jabalpur

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| 7. | Webinar on What to look for: Sustainable Ways to protect the Forest Health | 13 September 2021 | Scientists, Students, Technical officers and Research scholars |
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Rain Forest Research Institute, Jorhat

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| 8. | Workshop on 'Developing Cadre of Para-hydrogeologist for Springshed Management' | 7 and 8 September 2021 | Arunachal University of Studies |
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| 9. | Workshop on Reclamation of coal mined land using integrated biological approach | 24 September 2021 | - |
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Arid Forest Research Institute, Jodhpur

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| 10. | Seminar on 'Watershed Development' | 7 September 2021 | Scientists, Technical Officers, Research associate, and Project Fellows |
| 11. | Research Advisory Group Meeting | 29 September 2021 | RAG members, AFRI officers and scientist, technical staff, and Stakeholders |

Himalayan Forest Research Institute, Shimla

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|-----|--------------------------------------------|-------------------|-------------|
| 12. | XXII Research Advisory Group (RAG) Meeting | 15 September 2021 | RAG members |
|-----|--------------------------------------------|-------------------|-------------|

Institute of Forest Productivity, Ranchi

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| 13. | Workshop on Capacity Building of State Forest Departments for Developing State REDD+ Action Plan | 30 September 2021 | Officers of SFD, West Bengal |
|-----|--------------------------------------------------------------------------------------------------|-------------------|------------------------------|



Research Advisory Group Meeting at AFRI, Jodhpur



IFP, Ranchi conducted workshop on Capacity Building of State Forest Departments for Developing State REDD+ Action Plan

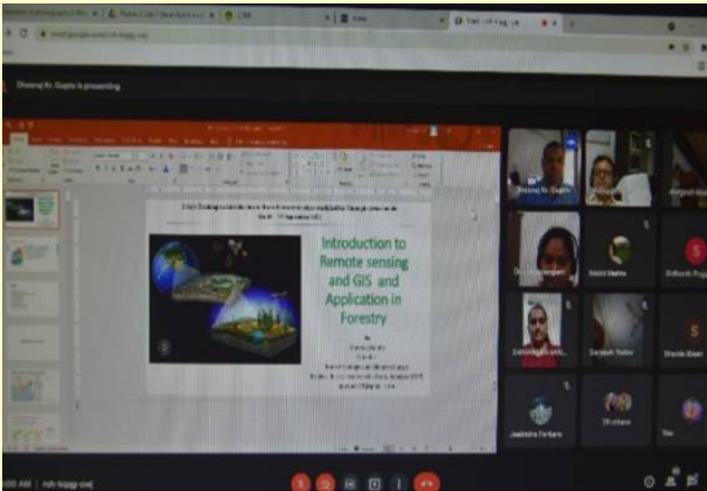
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Training Programmes

S.No.	Topic	Duration	Beneficiaries
Forest Research Institute, Dehradun			
1.	Forest Fire Risk Mitigation and Emergency Response	6 and 7 September 2021	SFD
2.	Conservation, cultivation and utilization of NTFPs	14 and 15 September 2021	-
3.	Forest Certification in India	27 September to 1 October 2021	ICFRE scientists
Tropical Forest Research Institute, Jabalpur			
4.	Basic Forestry	16 and 17 September 2021	Students, Farmers and other stakeholders
5.	Introducing to Remote Sensing and GIS and Application in Forestry	16 and 17 September 2021	-
6.	Biological control of Teak defoliator and skeletonizer through TFRI-Trichocard	23 and 24 September 2021	Front line staff of Forest Division at Korba and Katghora, Chhattisgarh
7.	Gmelina with Betel vine based agroforestry system in Madhya Pradesh	27 September 2021	Farmers
Rain Forest Research Institute, Jorhat			
8.	Bamboo Charcoal Production and Briquetting	22, 23 & 25 September 2021	Unemployed youth of Rongbongghat area, Karbi-Anglong
Arid Forest Research Institute, Jodhpur			
9.	Computer application and internet	20 to 24 September 2021	-

Himalayan Forest Research Institute, Shimla

10. Community Engagement for Co-Production of Ecosystem Services from Hill Forests 20 to 24 September 2021 IFS officers from different States and Union Territories



Training on Introducing to Remote Sensing and GIS and Application in Forestry at TFRI, Jabalpur



Training on Bamboo Charcoal Production and Briquetting at RFRI, Jorhat



Training on Computer application and internet at AFRI, Jodhpur



Training on Community Engagement for Co-Production of Ecosystem Services from Hill Forests at HFRI, Shimla

Prakriti Programme

IFGTB, Coimbatore hosted webinar as a part of "Online Knowledge Series - PRAKRITI – Nature Connect programme" in collaboration with CUBE organization, Singanallur, Coimbatore on 25 September 2021 on the topic "Quality Planting Material for

successful planting", on 11 September 2021 on the theme "Seeds to Trees" & on 4 September 2021 on the theme "Sacred Groves and their in-comparable values". A total of 70 participants participated in the programme.

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Patent

A patent has been granted to IWST, Bengaluru for an invention titled A Transparent Wood Composite (Inventors: K. K. Pandey, A. S. Rao, Giridhar B. N., S. Nair), for a term of 20 years from the 3rd day of September 2018 in accordance with the provisions of the Patents Act, 1970.

Rajbhasha Activity

ICFRE and its institutes celebrated Hindi Week/Fortnight/ during the month of September 2021, various Hindi competitions were conducted during the Week/Fortnight.



ICFRE, Dehradun celebrated Hindi Week/Fortnight



IFGTB, Coimbatore celebrated Hindi Week/Fortnight



FRI, Dehradun celebrated Hindi Week/Fortnight



AFRI, Jodhpur celebrated Hindi Week/Fortnight

Miscellaneous

Institute	Special Day/theme	Duration
FRI, Dehradun and HFRI, Shimla	Himalayan Day	9 September 2021
FRI, Dehradun	National Forest Martyrs Day	11 September 2021

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IFGTB, Coimbatore

IUFRO World Day- Digital Forest
Science Forum 2021

29 September 2021

IFGTB, Coimbatore, HFRI, Shimla

World Ozone Day

16 September 2021

TFRI, Jabalpur

World Bamboo Day

17 September 2021



HFRI, Shimla celebrated Himalayan Day



IFGTB, Coimbatore celebrated World Ozone Day



HFRI, Shimla celebrated World Ozone Day



TFRI, Jabalpur celebrated World Bamboo Day

HR News

Appointment (Regular)

Name of Officer

Shri Manish Kumar Vijay, Scientist -'B',
FRC-SD

Date

15.09.2021

Appointment (Deputation)

Name of Officer

Shri Shiva Kumar C.M., IFS (HR:2003), CF,
IWST, Bengaluru

Date

15.09.2021

Retirements

Name of Officer

Shri. Akhilesh Garg, Store Officer, FRI, Dehradun

Date

30.09.2021

Patron:

Shri. A.S. Rawat, IFS, Director General, ICFRE, Dehradun

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