

# Skill Development Training Programme

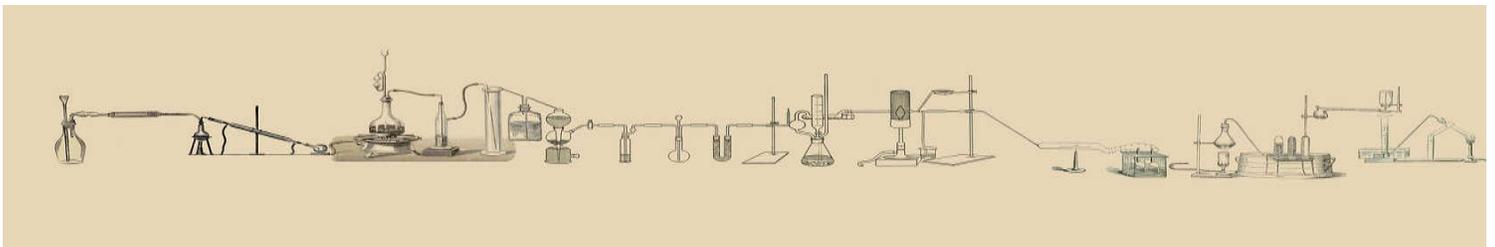
On

## Basic and Advance Skill for Water Testing and Analysis

16<sup>th</sup>-20<sup>th</sup> December, 2019



**CSIR-Central Scientific Instruments Organisation**  
**Sector-30C, Chandigarh**



## About Program

Council of Scientific and Industrial Research (CSIR) is embarking upon “Skill India” mission of the Government of India under its CSIR Integrated Skill Initiative (CISI). Under this umbrella of skill India, CSIR laboratories have taken up different skill training programs in domain of biological, chemical, physical, instrumentation, etc., such as industrial catalysis, solid state fermentation, nutraceutical, material characterisation, bioinformatics, molecular biotechnology, data analysis, animal breeding and housing practices, analytical instrumentation, plant tissue, floriculture, disaster mitigation, etc. CSIR-Central Scientific Instruments Organisation (CSIR-CSIO) is one of the premier national laboratory of CSIR and is working in domain of instrumentation for societal and industrial benefit. Under CISI, CSIR-CSIO is taking up several skill programs in field of mechatronics, conventional machines, AutoCAD, Industrial Robotics, CNC Machines, Water Testing and Analysis, etc.

In this line, a skill training program on “**Basic and Advanced Skill Training for Water Testing and Analysis**” is to be scheduled during 16<sup>th</sup>-20<sup>th</sup> December, 2019 at CSIR-CSIO, Chandigarh. Water is one of the vital components of life. Looming water crisis is becoming a major global issue for the 21<sup>st</sup> century, and according to a report by World Water Council about 1.2 billion people worldwide don’t have access to safe drinking water. The groundwater is reported to accumulate varied chemical pollutants of concern. Also, the government of India (GoI) has established a new Jal Shakti Ministry to take up challenges related to depleting ground water level, water conservation, and deteriorating water quality. The government aims to supply piped water supply to all rural households by 2024. In this context, it is important to ensure safety of supplied water and monitoring of water resources in terms of quality. Which otherwise may lead to several water borne disease such as diarrheal, dysentery, chronic and acute diseases associated with inorganic water pollutants. This skill training program will meet the aspirations of students, young researchers, and industry sponsored personnel looking for an opportunity for skill development and hands-on experience in the area. The objective of this training is:

- To create qualified skilled workforce relevant to water testing to ensure water quality.
- To provide theoretical as well as practical knowledge on water quality testing in terms of its physical, chemical, and biological parameters.
- To nurture talent and manpower in the area of water chemistry that they can be engaged in different water testing laboratories including state, centre government, and private laboratories.

This training program aligns with GoI missions such as Jal Shakti Abhiyan, National Water Mission, Jal Jeevan Mission, etc. CSIR-CSIO is also actively engaged in developing techniques and technologies to develop portable water quality systems for rural and urban sector. Thus the skilled manpower of CSIR-CSIO will cover various aspects of water parameters. The program *is structured to have laboratory and class-room experience including hands on experiment on water analysis with Ion Chromatography (nitrite, nitrate, phosphate, selenate, arsenite, etc.), ICP-MS (heavy metals and metalloids), physical parameters analysis such as like pH, conductivity, colour, turbidity, odour, temperature, etc., chemical parameters such as residual chlorine, Total Organic Carbon, Hardness, biological oxygen demand (BOD), chemical oxygen demand (COD), dissolved oxygen (DO), Total Suspended Solid, Nitrate, etc.*

This skill training course have limited seats (maximum 30 Numbers). Registration on or before December 10, 2019 is necessary (registration form attached). The payment for skill training should be made to “**Director, CSIO Account**” (A/c No.: 30267029400, IFSC: SBIN0001443). Please write to Dr. Pooja D. ([poojaiitr1987@gmail.com](mailto:poojaiitr1987@gmail.com)) for any query related to course work. The confirmation of seat will be made via email and/ phone call only after receipt of registration fee. The registration fee includes, training kit, study material, working lunch and tea. Participants have to bear their accommodation charges and other two meals (break first and dinner) while arrangement for accommodation can be made at CSIO guest house on prior request and availability of rooms. The participants will receive training certificate only after completion of training program.



CSIR-Central Scientific Instruments Organisation  
Sector-30C, Chandigarh-160030  
(www.csio.res.in)



**CSIR-INTEGRATED SKILL INITIATIVE PROGRAM**

**Basic and Advance Skill for Water Testing and Analysis**  
**16<sup>th</sup>-20<sup>th</sup> December, 2019**  
**REGISTRATION FORM**

1. Name
2. Correspondence Address
3. E-mail Address
4. Organisation/Company
5. Highest Educational qualification
6. Mobile Number

**Important Dates for Registration:**

- Deadline for Registration and Fee Payment: December 10, 2019

**Registration Fee: REGISTRATION FEE SHOULD BE DEPOSITED ONLINE TO CSIO ACCOUNT: 30267029400, IFSC: SBIN0001443**

- Students : Rs 2000/-
- Technician : Rs 2500/-

Registration Fee Payment Detail:

Amount (INR)..... Transition ID and date.....

Please submit filled form on/before December 10, 2019  
at Email: [poojaiitr1987@gmail.com](mailto:poojaiitr1987@gmail.com)/[nsjassal@csio.res.in](mailto:nsjassal@csio.res.in)

Skill Coordinator: Mr. N.S. Jassal, Principal Scientist and Principal ISTC, CSIR-CSIO  
Event Coordinator: Dr. Pooja, Sr. Scientist, CSIR-CSIO  
Resource Persons: Dr. Preetismita Borah and Mr. Manish Kumar