## Advertisement for Institute Website



केन्द्रीय नमक व समुद्री रसायन अनुसन्धान संस्थान (वैज्ञानिक तथा औद्योगिक अनुसंधान परिषद, भारत) गिजूभाई बधेका मार्ग,भावनगर 364002 (गुजरात)

> **CSIR- एकीकृत कौशल पहल** CSIR Integrated Skill Initiative



"CSIR- एकीकृत कौशल पहल" के तहत विभिन्न प्रशिक्षण कार्यक्रमों के लिए संभावित और योग्य उम्मीदवारों से

आवेदन आमंत्रित किए गए हैं। योग्यता, सामान्य निर्देश, आवेदन पत्र और अन्य विवरणों के लिए कृपया संस्थान

की वेबसाइट http://www.csmcri.res.in पर जाएं। आवेदन प्राप्त होने की अंतिम तिथि 25/01/2021 है।





# **CSIR Integrated Skill Initiative**

#### Skill Development Programme

#### केन्द्रीय नमक व समुद्री रसायन अनुसन्धान संस्थान



(वैज्ञानिक तथा औद्योगिक अनुसंधान परिषद, भारत) गिजूभाई बधेका मार्ग ,भावनगर 364002 (गुजरात)

CSIR- Central Salt & Marine Chemicals Research Institute Gijubhai Badheka Marg, Bhavnagar-364002, Gujarat (INDIA)

"CSIR-Integrated Skill Initiative" is a national program on skill development initiated by Council of Scientific and Industrial Research (CSIR) using the expertise and infrastructure of CSIR laboratories positioned across the country. CSIR-Central Salt and Marine Chemicals Research Institute (CSIR-CSMCRI), Bhavnagar is a leading constituent laboratory dedicated towards multidisciplinary R&D programs of both basic and applied sciences. Under skill India initiative CSIR-CSMCRI, the only R&D laboratory of CSIR in Gujarat, proposes to organize the following Training programs.

Applications are invited from the eligible candidates for the following training programs as detailed below:

Sr.	Name of	Duration	Maxi	Qualification	Last date of	Course	Written
No.	Training	Bulation	mum	and Remarks	application	fee	Test
1.0.	Program		No. of		application		1050
	riogram		Intake				
1.	Certificate course in theory and practical aspects of household solar thermal gadgets	01st February to 04th February 2021	Seats are limite d for this	Diploma in engineering (mechanical/fabric ation/electrical/ch emical) pass or final year students / ITI pass	to bkmarkam@	Nil	Written exam for selectio n: 28th Jan 2021 (10.00 AM). Venue- CSMCRI Auditori um
2.	Certificate course in Chemical Process Plant	01st February to 04th February 2021	09	12th Science pass/ diploma in engineering pass / ITI pass/ Engineering students /Engineering graduates	25th January 2021 (through e- mail only to psb@csmcri. res.in and vcjoshi@csm cri.res.in	Mentioned below	No written test
3	Certificate Course in Fermentation Technology	01st February to 04th February 2021	19	12th Science pass/ diploma in engineering pass / ITI pass/ Engineering students /Engineering graduates	25th January 2021 (through e- mail only to sourishb@cs mcri.res.in)	Mentioned below	No written test

Course Fee

٠	Rs. 1000/- + Rs. 180/- GST = Rs. 1180/-	٠	Self-sponsored students, individuals
•	Rs. 5000/- + Rs. 900/- GST = Rs. 5900/-	•	Industry sponsored students

- Fee is non-refundable. Only the selected candidates will be intimated regarding online fee payment (Bank details is attached).
- Mode of communication would be either in ગુજરાતી or in ફિન્દ્રી or in English.
- Lunch and tea (two times) will be provided during training program. Lodging & boarding arrangements of selected candidates will be done by their own.
- Certificates will be provided to the candidates who successfully complete the course.
- Training venue: CSIR-CSMCRI, Bhavnagar

How to apply and Selection:

- Candidates have to apply through e-mail (Sr. No. 2, 3) and at the time of written exam document verification (Sr. No. 1) as per the application format given with this advertisement.
- Selection will be made on the basis of "first-cum-first-served basis with having fulfilment of qualification criteria, payment and other terms and conditions" for Serial Number 02, "marks/percentage obtained in B.Sc. / M.Sc. / Diploma Engineering" for Serial Number 03.
- Written exam will be on 28th Jan 2021 (for sr. no. 1 only) and selection will be made based on written exam.
- One self-attested set of documents to be submitted along with application as attachment.
- All documents in original are required to be shown on the joining day for training program.
- For Serial Number 02 and 03 the selected candidates will be intimated by email. The Course fee has to be deposited within 3 days of email from us about selection.
- For sending of applications and any query about the course you can contact by emails: bkmarkam@csmcri.res.in (for sr. no. 1), psb@csmcri.res.in and vcjoshi@csmcri.res.in (for sr. no. 2), and sourishb@csmcri.res.in (for sr. no. 3).
- Incomplete applications shall not be considered.
- It is a training program and it would, therefore, not confer any right/claim implicit or explicit for any candidates for claiming extension or absorption in CSIR CSMCRI/CSIR.
- No traveling or any other allowances will be paid to candidate for training program.



# **CSIR Integrated Skill Initiative**

Skill Development Programme केन्द्रीय नमक व समुद्री रसायन अनुसन्धान संस्थान (वैज्ञानिक तथा औद्योगिक अनुसंधान परिषद, भारत) गिजूभाई बधेका मार्ग ,भावनगर 364002 (गुजरात)



#### CSIR- Central Salt & Marine Chemicals Research Institute Gijubhai Badheka Marg, Bhavnagar-364002, Gujarat (INDIA)

### Application Form (आवेदन पत्र)

1.	Name of the Candidate उम्मीदवार का नाम	:	
2.	Father's / Guardian's Name पिता/ पति का नाम	:	Photo
3.	Date of Birth जन्म तिथि	:	
4.	Category वर्ग	: General / OBC/ SC / ST	
5.	Address (Permanent) पता (स्थायी)	:	
6.	Address (Communication) पता (पत्र व्यवहार)	:	
7.	Educational Qualifications शैक्षणिक योग्यता	:	
8.	Phone No. फोन/ मोबाइल नंबर	:	
9.	E mail ईमेल	:	
10.	AADHAAR Card Number आधार कार्ड नंबर		
11.	Training opted for: (put tick mark / write) प्रशिक्षण के लिए (टिक मार्क लगाएं / लिखे)	<ul> <li>Certificate course in theory and practice household solar thermal gadgets</li> <li>Chemical Process Plant</li> <li>Fermentation Technology</li> </ul>	actical aspects of
		Can	didate's Signature म्मीदवार के हस्ताक्षर
Detail	s of enclosures		

## **Registration form**

### (Payment only through RTGS/ NEFT) Last date for submission of this form: 25/01/2021

Amount (INR):
Bank Name:
Branch Name:
Account No
ransaction ID and Date:

Signature of Depositor/ Candidate

Fee structure (non-refundable):

Rs. 1000/- + Rs. 180/- GST = Rs. 1180/-	Self-sponsored students, individuals
Rs. 5000/- + Rs. 900/- GST = Rs. 5900/-	Industry sponsored students



I. MICR code

### केन्द्रीय नमक व समुद्री रसायन अनुसंधान संस्थान

गिजुभाई बधेका मार्ग, भावनगर- ३६४ ००२

CSIR-CSMCRI CSIR-CENTRAL SALT & MARINE CHEMICALS RESEARCH INSTITUTE Gijubhai Badheka Marg, Bhavnagar 364 002, Gujarat, India Phone No. (O) 0278, 2471792 E-mail: <u>fao@csmcri.org</u>

	Electronic	Fund Transfer Account Details		
1	Name of account holder	DIRECTOR, C.S.M.C.R.I.		
2	Address	GIJUBHAI BADHEKA MARG, BHAVNAGAR 364002		
3	e-mail address	fao@csmcri.org		
4	Phone No./Mobile No.	0278-2471792		
5	Fax No.	0278-2567562		
6	Permanent Account Number (PAN)	AACCC1313P		
7	Particulars of Bank Account			
54 a	A. Name of the Bank	STATE BANK OF INDIA		
	B. Name of the Branch	WAGHAWADI ROAD BRANCH		
	C. Branch Code	10863		
	D. Address	Shubham Shop No.G2/3, Plot No.2569 E1/2, Waghawadi Road Opp. Gulista Ground, Bhavnagar-364002 e-mail: <u>sbi.10863@sbi.co.in</u>		
	E. Telephone No	0278-2569884		
	F. Account No.	30267310153		
	G. Type of Account	SAVINGS BANK ACCOUNT		
	H. IFSC Code (RTGS/NEFT)	SBIN0010863		
0.0				

We/ I hereby declare that the particulars given above are correct and complete. If the transaction is delayed or lost because of incomplete or incorrect information, I/ we would not hold CSMCRI responsible.

364002023

वित्त एवं लेखा अधिकात्री 013 Signature of the account holder कें.न.स.र.अ.स., भावनगर LEINANCE & ACCOUNTS OFFICER C.S.M.C.R.I., BHAVNAGAP **Bank** Certificate has an Account No 30267310 With our Bank and it is It is certified that M/S\_CSNCR1 confirmed that the details given above are correct as per our record Date: Signature of the Authorized Official Place: of Bank with seal

### Syllabus for Certificate Course in Chemical Process Plant

- Safety aspects in Chemical Process Plant,
- Brief introduction regarding SI and other units for various parameters: pressure, temperature, length, volume, humidity etc
- Different types of valves and their utility, and other pipe fittings
- Various Plant Utilities and systems required such as water, air, steam, electricity etc., Systems: Soft water generation, Boiler, Air Compressor, Dry Air Generation
- Reactors to carry out chemical reactions: such as open Pan Vessel, High Pressure Reactor, Glass-lined Reactor. We are having reactors in various volume capacity: 20 L – 1000 L.
- Systems for Separation Operations: Liquid-Liquid Centrifuge, Solid-Liquid Centrifuge, Plate and Frame Filter Press, Distillation, Reverse Osmosis,
- Brief about environment protection

### Syllabus for Certificate Course in Fermentation Technology

#### **Basic learning modules**

- Training on fermentation principles.
- Bioreactor design.
- Growing microorganisms in fermenter.
- Hands on pilot scale fermentation experiences.
- Critical control parameters.

#### Topics to be discussed

- Critical components of an industrial bioreactor.
- Importance of mixing and aeration: Mass Transfer.
- Scale up of fermentation process.
- Downstream (purification) process and product formulation.
- Material and Energy Balance Computations.
- Process Economics.

#### **Practical modules**

- Detailed understanding of the principles of Fermenter design, microbial fermentation process and production economics.
- Apply biological and engineering principles in cultivating microorganisms in fermenters.
- Assess parameters critical for fermentation such as aeration, agitation ad KLa estimation.
- Attain practical skills on fermenter sampling, product yield and microbial growth estimation, harvesting of culture and cleaning of fermenter.
- Analyze problems encountered during fermentation process.

Course Structure: The courses will comprise of lectures and hands-on sessions.

Salient Features of the programme:

- 30% Theory and 70% practical sessions as per the course curriculum
- Tutorials based on specific needs of the candidates.
- Interactive sessions.
- Focus on current needs of fermentation industry.

Course duration: 4 days