



Academy of Scientific and Innovative Research (AcSIR)

# Why study at AcSIR?

Innovation | Passion | Excellence | Relevance.

The objective of AcSIR is pursuit of excellence as well as doing something relevant. We promote the culture of being singularly dynamic and innovative. The Academy has been established as an "Institution of National Importance" in the year 2010, with a view to maximize the number of qualified researchers and professionals of impeccable quality in the domain of science and engineering; and to equip them with the skills to innovate and conduct seamless interdisciplinary research.

The PhD in Science, Engineering and Direct PhD in Engineering programmes, which equip students to undertake interdisciplinary research by providing a broad-based practical training in best in the class national laboratories of CSIR. The Programmes are structured around two initial years of coursework, including formal coursework in first two semesters; one Project Proposal & one Review Article in third semester; and CSIR-800 project in fourth semester; followed by three years of research (this can also run in parallel).

The courses are intellectually demanding and intensive in nature of the course, hence, entry to the PhD programmes of AcSIR is highly selective. Additionally, two students of the PhD Science programme have already submitted their PhD thesis while a few more are on the verge of submitting their thesis- a further indication of the quality of students and the research training.



AcSIR student at CSIR-CSMCRI during CSIR-800 project

# **About the Programmes**

**The Academy offers** following Doctoral programmes:

- (i) PhD in Science
- (ii) PhD in Engineering
- (iii) Direct PhD in Engineering

# **Eligibility Criteria**

#### PhD in Science

Candidates with a Bachelor's degree in Engineering/ Technology/Medicine or B.S (of 4 year duration) or Master's degree with a keen sense of scientific enquiry for pursuing advanced research in frontier areas of Biological, Chemical, Physical and Mathematical Sciences leading to a Ph.D degree. The candidate should be having a valid National level fellowship (JRF/SRF of various funding agencies, e.g. CSIR, UGC, DBT, DST etc.), INSPIRE or other equivalent fellowships.

## PhD in Engineering

Candidates with a Master's degree in Engineering/Technology/ Pharmacy with a good academic record or with a Master's degree in Sciences with a good academic record and with a valid GATE score or UGC/CSIR NET/NBHM or valid CSIR-SRF or equivalent fellowship or Bachelor's degree in Engineering/Technology with exceptionally good academic record and having a valid GATE score having keen interest in research in various disciplines in Engineering.

#### Direct PhD in Engineering

Candidates having following qualifications are eligible to apply:

- i. B.E./B.Tech+GATE/NET (Engg)
- ii. B.E./B.Tech+2-year experience as PA/ CSIR-SRF/ Industrial Candidates
- iii. B.E./B.Tech or M.Sc. + National level fellowship/ Ranked first in University

#### Personnel from Industry for PhD

Candidates having Master's degree in Science/Engineering with endorsement from a Industry for financial support during studies.

Candidates whose final results are awaited,

but who are otherwise eligible as per the screening criteria, can also apply. If selected, they will be provisionally admitted to the programme. Their continuation in the programme will be subjected to securing required percentage/equivalent grade (depending on the cut -off marks for screening for the specific programme) and submission of marks-sheet of their final result by October 31, 2013.

#### **Admission Process**

The candidates can exercise a maximum of three preferences for labs. Candidates will be screened based on their preferences. However, it does not give any right to the candidate to determine their preference/ choice, as the selection is purely based on performance and/ or available vacancies. Please visit AcSIR website (http://acsir.res.in) for on-line application form submission and additional details.

Short-listed candidates will be intimated electronically and they will be required to appear for interview for selection at the designated centres on the dates announced. Details of interview centres will be posted on the AcSIR website (http://acsir.res.in) in due course.

In addition to their academic performance and/or depending on the vacancies, final selection will be based on performance of the candidate in the aptitude test/ interview.

**Sponsored candidates** shall contact the CSIR lab of interest and should receive  $\alpha$ -priori approval from the lab for the position. Also, such candidates are advised to receive a commitment from a faculty of the concerned lab agreeing to act as a Guide/Advisor.

The Employing organisation of such Sponsored Candidates will have to support

the student during his/her tenure as a student at AcSIR and will have to provide a no objection certificate for such an enrolment. Such candidates will have to remain a residential student for the first two semesters to complete the coursework.

# **Fellowship**

Generally, the admission is for the candidates who have tenable National Eligibility based Fellowship, and Candidates will obtain fellowship as applicable.

However, some labs may offer fellowships from other sources. Please visit respective lab advertisement in this regard.

## **Programme Fee Structure**

The fee structure for the programme in the year 2013-14 will be as follows:

#### For Regular Candidates:

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Year 1	Rs. 12,000/-
Year 2	Rs. 12,000/-
Year 3	Rs. 12,000/-
Year 4	Rs. 12,000/-
Year 5	Rs. 12,000/-
Thesis Submission Fee:	Rs. 5,000/-

### For Industry/Project Sponsored Candidates:

Year 1	Rs. 24,000/-
Year 2	Rs. 24,000/-
Year 3	Rs. 24,000/-
Year 4	Rs. 24,000/-
Year 5	Rs. 24,000/-
Thesis Submission Fee	Rs. 25,000/-

# **Evaluation Procedure and Grading Scheme**

Letter grades will be awarded for each course reflecting the student's proficiency and instructor's expectation. The grades and their description along with their equivalent numerical values, where applicable, are as

follows:

Letter Grade	Performance	Numerical Value	
A+	Outstanding	10	
Α	Excellent	9	
B+	Very Good	8	
В	Good	7	
C+	Average	6	
С	Not Qualified	5	
S	Satisfactory (for Thesis)		
Χ	Unsatisfactory (for Thesis)		

Performance of the student will be evaluated by two indices, semester grade point average (SGPA) and cumulative grade point average (CGPA). These will be calculated as follows:

- SGPA = {Sum of (Course credit X Numerical value of course grade)} / Total course credits earned in the semester
- CGPA = Cumulative points scored in all passed courses / Cumulative credits earned

A student needs to have a SGPA of over 6.0 in each semester and a CGPA of over 6.5 from second semester onward for continuation. Minimum grade point to be earned to pass any subject is 6.0.

For distinction, the student need to score CGPA = 8.0 or above.

#### Sponsored Candidates:

After enrolment such candidates shall be required to complete courses equivalent to 8 credits as a residential candidate for a semester.

These candidates shall be allowed to earn 8 credits relate to writing a Project Proposal, a Review Article and fulfilling the requirements of CSIR-800 as a non-residential student.

These students shall only be allowed to take Comprehensive Examination after completing 8 credits of coursework as a residential student.

# **Academic Requirements**

Program	Min.	Min. Credits	Credits thro'	Min.	Normal	Max.
	Total Credits	thro' Coursework	Research/ Project	Residence Period	Period of Completion	Duration of Completion
M. Tech.	64	32	32	4 Sems	2 Years	3 Years
Integrated Ph.D. (Engg)	12*	4	Completion of thesis	3 Sems	3 Years	4 Years
Ph.D. (Sciences)	20*	12	Completion of thesis	4 Sems	4 Years	5 Years
Ph.D. (Engg)	20*	12	Completion of thesis	4 Sems	4 Years	5 Years
Direct Ph.D. in E	ngineering	for candidates with	:			
B.Tech + Gate/NET	36	24 (M.Tech. level) + 4 (Ph.D. level)	Completion of thesis	4 Sems	5 Years	6 Years
B.Tech + 2 Year experience as PA/CSIR-SRF/ Industrial Sponsored Candidates	28	16 (M.Tech. level) + 4 (Ph.D. level)	Completion of thesis	3 Sems	5 Years	6 Years
B.Tech or M.Sc. + National level fellowship/ Ranked first in University	36	24 (M.Tech. level) + 4 (Ph.D. level)	Completion of thesis	4 Sems	5 Years	6 Years

# **Important Dates**

Milestone	Date	
Commencement of Online	April 18, 2013	
Application Process:		
Last date of Online	May 23, 2013	
Application Process:		
Screening of Applications	May 24 to May	
	29, 2013	
Intimation to Shortlisted	May 31, 2013	
Candidates (Electronic)		
Aptitude Test/Interviews	June 17 to July	
	12, 2013	
Declaration of results (on	July 17, 2013	
web)		
Enrolment	August o8,	
	2013	
Commencement of Session	August 09,	
	2013	