

**Department of Biochemical Engineering and Biotechnology**

**Minutes of the meeting of  
Departmental Research Committee (DRC)  
(DRC-04/2013-2014)**

April 11, 2014

The fourth meeting of *Departmental Research Committee* (DRC) for the academic session 2013-2014 was held on **Monday, April 07, 2014** at **4 PM** in the Committee Room (I-230) of the Department.

The following members were present:

Prof. Prashant Mishra (*Chairman*)  
Prof. T.R. Sreekrishnan  
Prof. V.S. Bisaria  
Prof. Saroj Mishra  
Prof. A.K. Srivastava  
Dr. Atul Narang  
Dr. Ritu Kulshreshtha  
Dr. D. Sundar (*Convener*)

**Item No. 1 - To confirm the minutes of the 3<sup>rd</sup> meeting of the DRC for the session 2013-2014 (DRC-03/2013-2014) held on January 20, 2014.**

The Minutes of the DRC meeting No. 3/2013-2014 were confirmed as circulated.

**Item No. 2 - Matters arising out of the minutes of DRC-03/2013-2014.**

The position in respect of the following matters was noted with observations/decisions as indicated against each:

**(i). PhD project floated by Dr. Preeti Srivastava jointly with IOC R&D.**

Dr. Preeti Srivastava was earlier requested by DRC to obtain a letter of approval from IOC R&D granting permission to the proposed Co-Advisor from IOC R&D to be formally associated with the PhD project entitled "Biocatalytic viscosity reduction of heavy crude oil". It was noted that all the required documents from IOC R&D such as Permission Letter, CV of the proposed Co-Advisor Dr. Manoj Upreti and the MoU with IIT Delhi has now been submitted. The Committee discussed and recommended the proposal to be forwarded to Dean (Academics) for his approval.

*(Action: Chairman DRC to forward the letter to Dean - Academics)*

**(ii). Shortlisting criteria for admission to PhD program under QIP and Sponsored categories.**

Prof. A.K. Srivastava raised the issue of revising the short-listing criteria for admission to PhD program in the Department under the QIP and sponsored categories. The Committee decided to refer this item to the Departmental Faculty Board (DFB) as it was this body that

deliberated and approved the shortlisting criteria for admission to PhD program in August 2013.

*(Action: Head of the Department)*

**Item No. 3 - Synopsis** of the PhD thesis submitted by the following students:

Sl.	Student	Entry Number	Title of the thesis	Supervisor(s)
1	Rashi Gupta	2009BEZ8092	Effect of bioinoculants on <i>Cajanus cajan</i> and its rhizospheric microbial community	SS & VSB
2	S. Bhuvanesh	2009BEZ8507	Biological denitrification of wastewater using a hybrid reactor	TRS
3	Neha Nagpal	2009BEZ8509	Regulatory and functional dissection of miR-191 in breast cancer	RK & PKRC
4	Dhara Thakore	2009BEZ8512	Mass propagation of hairy root cultures of <i>Catharanthus roseus</i> in Bioreactor	AKS

Based on the recommendations of respective SRCs, the Committee discussed and approved the synopsis submitted by all the four PhD students mentioned in the table above. The Committee also approved the panel of Examiners for the four theses and authorized the Chairman to forward the same to Dean (Academics).

*(Action: 1. Respective Supervisors to send the following documents to the DRC Convener - (a) Filled-in form for PhD synopsis submission & Appointment of Examiners (b) 2 hard copies of the Synopsis and (c) soft copy of the Synopsis on CD and by email)*

*(Action 2: Upon receipt of the above documents, Chairman DRC to forward it to Dean - Academics)*

**Item No. 4 – Report on Comprehensive Examination and Approval of Research Plan of the PhD students.**

Sl.	Student	Entry Number	Supervisor(s)
1	Anamika Singh	2011BEZ8228	AN
2	Tushar Dash	2011BEZ8420	PM
3	Rahul Agrawal	2011BEZ8421	RK & PKRC
4	Anveshika Aditya	2011BEZ8423	AKS
5	Neeti	2011BEZ8424	PM
6	Sunil Kumar	2011BEZ8480	GPA
7	Arpita	2012BEZ8188	SM
8	Anees Kaprakkaden	2012BEZ8192	VSB & PS
9	Ashwani Gautam	2011BEZ8481	SM

The Plan of Work for Ph.D. submitted by the students mentioned in the table above were discussed, and based on the recommendations of respective SRC's, they were approved.

*(Action: Chairman DRC to forward the Form w/ enclosures to Dean - Academics)*

**Item No. 5 – Finalization of results of the PhD written Comprehensive Exams conducted during January 9-10, 2014.**

The Committee finalized the results of the PhD written Comprehensive Exams conducted during January 9-10, 2014 and approved the list of successful students who have passed the examination as given in **Annexure 1**.

**Item No. 6 – Applications received for PhD program from the Embassy of the Federal Democratic Republic of Ethiopia, New Delhi, through the Office of Dean (Academics).**

The Committee scrutinized the following three applications that were received:

Sl. No. of Appln	Name of candidate	Background Degree	Grade obtained	Institution	Comments of DRC
16	Mr. Mulugeta Desta Rundassa	Diploma in Veterinary Medicine and M.Sc Applied Biology (Jan 2011)	Cumulative Average 3.53	Haramaya University, Dire Dawa, Ethiopia	Not Eligible
19	Mr. Daniel Tadele Tsegaye	M.Sc Dry Land Forestry (April 2011)	CGPA of 3.08	Hawassa University, Shashemene, Ethiopia	Not Eligible
40	Mr. Hunegnaw Baylie Mengstie	B.Sc Chemical Engg (Process Engg) (June 2013)	Major GPA of 3.46 and CGPA of 3.34	Adama Science and Technology University, Adama, Ethiopia <a href="http://www.astu.edu.et">www.astu.edu.et</a>	<b>Eligible</b>

The Committee however noted that the detailed transcript and courses studied by the candidate **Mr. Hunegnaw Baylie Mengstie** has not been submitted along with the application. It was decided to request the PG Section to collect this additional information of the candidate and forward it to the Department, before any decision on the application can be made by the DRC.

*(Action: Chairman DRC to forward the recommendations to Dean-Academics)*

**Item No. 7 - Applications received for admission to PhD program during the semester (Ms. Shivani Sharma, Ms. Divya Vahi and Ms. Sneha Sinha).**

The Committee decided that the eligible candidates be called for the written test/interview along with other candidates who have applied for 1<sup>st</sup> semester 2014-2015 admissions during May 15-16, 2014.

**Item No. 8 - A note received from Dr. Ritu Kulshreshtha for mentoring Dr. Prerana Jha who has already been awarded a project under the Scheme for Young Scientists (Start-up Research Grant) of SERB, Govt. of India.**

The Committee discussed and recommended the application to be forwarded to Dean (R&D).

*(Action: Dr. Ritu Kulshreshtha)*

**Item No. 9 - A note received from Prof. Saroj Mishra to consider forwarding the proposal submitted by Dr. Swati Ojha to SERB, Govt. of India for funding under their *Scheme for Young Scientists (Start-up Research Grant)*.**

The Committee discussed and recommended the application to be forwarded to Dean (R&D) for onward transmission of the application of Dr. Swati Ojha to SERB, Govt of India.

*(Action: Prof. Saroj Mishra / Dr. Swati Ojha)*

**Item No. 10 - A note received from Dr. Shilpi Sharma for a change of topic of PhD thesis allotted to Mr. Gautam Anand (2013BEZ8024) and constitution of SRC for the student.**

Previously allotted PhD topic	Proposed PhD topic
Effect of application of bioinoculants and "bioirrigation" for sustainable mixed cropping of pigeon pea and finger millet on rhizospheric community	Diversity of ACC deaminase positive bacteria in stressed agricultural environments

The request of Dr. Shilpi Sharma was discussed and the new PhD project mentioned above was allotted to the student Mr. Gautam Anand. The Committee also constituted the SRC for the student as given in **Annexure 2**.

**Item No. 11 - A note received from Prof. A.K. Srivastava for including Prof. T.R. Sreekrishnan as Co-Supervisor for the PhD thesis of Mr. Jitender Singh Verma (2012BEZ8551) and constitution of SRC for the student.**

The request received from Prof. A.K. Srivastava for including Prof. T.R. Sreekrishnan as Co-Supervisor for the PhD thesis of Mr. Jitender Singh Verma (2012BEZ8551) was discussed and approved.

**Item No. 12 - Formation of Student's Research Committee (SRC) for the following students.**

*PhD students*

Sl.	Student	Entry Number	Supervisor
1	Jitendra Singh Verma	2012BEZ8551	AKS
2	Moolchand	2012BEZ8550	SM
3	Sakshi Aggarwal	2013BEZ8027	SM
4	S. Vidhu	2013BEZ8510	RE & SN

*MSR students*

Sl.	Student	Entry Number	Supervisor
1	Gaurav Sinsinbar	2013BEY7503	PM
2	Kavitha Sharma	2013BEY7504	TRS & AKS
3	Sanjay Singh	2013BEY7510	PM

The Committee discussed and constituted the SRC for all the students mentioned above as given in **Annexure 2**.

**Item No. 13 - Allotment of MTP projects to dual degree students and constitution of committee for their evaluation.**

Sl.	Student	Supervisor	Previously allotted project	Proposed project
1	Soaham Sharma (2008BB50030)	RK	None	Identification of novel small RNA species
2	Shivkesh Dahiya (2009BB50030)	SM	Synthesis of oligosaccharides using glycosynthase variant of $\beta$ -glucosidase of <i>Pichia etchellsii</i> .	Hexyl glycoside and polyglycoside synthesis using solvent adapted cells of <i>Microbacterium paraoxydans</i>

The project allocation and evaluation committees were constituted for the dual degree students by the DRC as given below:

Sl.	Student	Project that is allocated	Evaluation Committee
1	Soaham Sharma (2008BB50030)	Identification of novel small RNA species	Preeti Srivastava (Expert) Ritu Kulshreshtha (Supervisor)
2	Shivkesh Dahiya (2009BB50030)	Hexyl glycoside and polyglycoside synthesis using solvent adapted cells of <i>Microbacterium paraoxydans</i>	Prashant Mishra (Expert) Saroj Mishra (Supervisor)

**Item No. 14 - A note received from Dr. D. Sundar seeking recommendation for providing *Assistantship* to his PhD student Mr. Shashank Katiyar (2012BEZ8193) from one his sponsored projects in IRD.**

The Committee discussed and approved the award of *Assistantship* to the PhD student Mr. Shashank Katiyar (2012BEZ8193) from one of the sponsored projects of Dr. D. Sundar through IRD.

(Action: Dr. D. Sundar)

**Item No. 15 - Matters for information of the DRC.**

- Research Scholar Travel Award applications of the following PhD students were forwarded to Dean (Academics) during the past two months:

Sl.	Student	Entry Number	Conference
1	Jyoti Batra	2007BEZ8278	247 <sup>th</sup> ACS National Meeting and Exposition, March 16-20, 2014, TX, USA
2	S. Bhuvanesh	2009BEZ8507	Interface in Water and Environmental Science, May 25-28, 2014, Netherlands

**Item No. 16 - Any other item with the permission of the Chair.**

- a) *A note received from Prof. Tapan K. Chaudhuri, KSBS for appointing an internal expert in the SRC of the PhD student Ms. R. Gayathri (2007BEZ8175), in place of Dr. Vikram Sahai who had superannuated*

The Committee discussed and approved the re-constitution of SRC for Ms. R. Gayathri (2007BEZ8175) as given in **Annexure 2**.

- b) *Application received by the Office of the Director for the possibility being a host for Ramalingasami Re-entry Fellowship of DBT.*

It was noted that the Director's Office had received an email on March 21, 2014 from Dr. Ramkumar Mathur, Associate Research Scientist at the Department of Microbiology and Immunology at Columbia University, NY, USA, to explore the possibility of IIT Delhi being a host for his application to the DBT, Govt of India for the Ramalingaswami Re-entry Fellowship. The Head of the Department subsequently received this note on March 31, 2014 through Establishment Section-1. On scrutiny of the application, the Committee felt that the specialization of the candidate does not match with the current interest of the Department and was more suited to a Department that is involved in infectious disease research.

*(Action: Head of the Department)*

- c) *Application received from a Foreign National Mr. Varun Kumar Mahadeo, a candidate from Mauritius for the MS (Research) Program under the Self Financing Scheme.*

On scrutiny of the application, the Committee found the applicant Mr. Varun Kumar Mahadeo to be ineligible to be considered for admission, as he doesn't satisfy the minimum short-listing criteria of the department.

*(Action: Chairman DRC to forward the recommendations to Dean-Academics)*

- d) *A note received Dr. Ziauddin Ahammad regarding the request of MSR student Ms. Manisha Lamba (2013BEY7506) to convert to a PhD program.*

For conversion from MSR to PhD program, a student is required to have completed two semesters of course work of 20 credits and should have scored a minimum of 8.0 CGPA. It was noted that the student Ms. Manisha Lamba has not yet completed the required number of course credits. It was decided that, upon completion of these requirements and on the recommendations of her SRC, the request of the candidate can be considered by the DRC.

- e) *Conduct of entrance test/interview for admission to PhD/MSR Program (2014-2015, 1<sup>st</sup> Semester).*

The Chairman informed the committee about the schedule for PG admissions. It was decided to hold an entrance test/interview for MSR/PhD during May 15-16, 2014 (Thursday/Friday). Prof. V.S. Bisaria and Dr. Ziauddin Ahammad will coordinate the setting of question paper and solicit questions under specific topics from the departmental faculty. Further, a Committee consisting of Dr. Shilpi Sharma, Dr. Ritu Kulshreshtha and Dr. Preeti Srivastava was constituted for

conducting the examination and in the evaluation of answer scripts. The Chairman DRC was authorized to short-list the candidates for interview based on their performance in written test.

All the DRC members were requested to be available during May 15-16, 2014 to participate in the conduct of entrance test and interview.

The meeting ended with thanks to all the members.

  
**D. SUNDAR**  
DRC Convener

**Distribution**

*All DRC members and other DBEB Faculty (by email)*

Cc: DRC File

**Results of the PhD written Comprehensive Exams conducted during January 9-10, 2014**

List of PhD students who have passed the Written Comprehensive Examination:

<b>Sl. No.</b>	<b>Entry Number</b>	<b>Name of the student</b>
1	2012BEZ8189	Himanshu Singh
2	2012BEZ8193	Shashank Prakash Katiyar
3	2013BEZ8023	Apoorva Verma
4	2013BEZ8024	Gautam Anand
5	2013BEZ8026	Richa Sharma
6	2013BEZ8027	Sakshi Aggarwal
7	2013BEZ8029	Siddhi S
8	2013BEZ8030	Sonam Takkar



## Student's Research Committee (SRC) approved by DRC

*PhD students*

<b>Student</b>	<b>Chairman, DRC or his nominee</b>	<b>One expert in the field from the Department</b>	<b>One Institute faculty expert, preferably in the concerned area, from outside the Department to which the student belongs</b>	<b>Supervisor (s)</b>
Gautam Anand (2013BEZ8024)	Saroj Mishra	Preeti Srivastava	K. Annapurna Division of Microbiology IARI, New Delhi	Shilpi Sharma VS Bisaria
Jitendra Singh Verma (2012BEZ8551)	Atul Narang	Ziauddin Ahammad	S.K. Khare Dept of Chemistry IIT Delhi	AK. Srivastava TR. Sreekrishnan
Moolchand (2012BEZ8550)	Atul Narang	Preeti Srivastava	Biswajit Kundu KSBS, IIT Delhi	Saroj Mishra
Sakshi Aggarwal (2013BEZ8027)	Prashant Mishra	Ritu Kulshreshtha	S.K. Khare Dept of Chemistry IIT Delhi	Saroj Mishra
S. Vidhu (2013BEZ8510)	Prashant Mishra	Ziauddin Ahammad	Sujeet Chaudhary Dept of Physics IIT Delhi	E. Ravikrishnan Sunil Nath
R. Gayathri (2007BEZ8175)	Saroj Mishra	Ziauddin Ahammad	KJ. Mukherjee School of Biotechnology JNU, New Delhi	Tapan Chaudhuri James Gomes

*(Action: Respective Supervisors to send the filled-in form to Chairman DRC for forwarding to Dean Academics)*

*MSR students*

<b>Student</b>	<b>Chairman, DRC or his nominee</b>	<b>One expert in the field from the Department</b>	<b>Supervisor (s)</b>
Gaurav Sinsinbar (2013BEY7503)	Ravikrishnan Elangovan	Preeti Srivastava	Prashant Mishra
Kavitha Sharma (2013BEY7504)	Atul Narang	Ziauddin Ahammad	TR. Sreekrishnan AK. Srivastava
Sanjay Singh (2013BEY7510)	Ravikrishnan Elangovan	Preeti Srivastava	Prashant Mishra