

**B. V. V. Sangha's**  
**Basaveshwar Engineering College (Autonomous), Bagalkot**  
**Department of Biotechnology**

**RESEARCH CENTRE DETAILS**

**I. About Research Centre:**

- Year of Establishment: 2011
- Major Research Areas :
  1. Food processing
  2. Biofuels technology
  3. Solid waste management and bioremediation
  4. Fermentation technology
  5. Molecular biology and Bioinformatics
- No. of research guides enrolled at our research centre : 4
- No. of internal faculty guiding the candidates :2
- Faculty with Ph. D. : 4
- Our Faculty pursuing Ph. D. :2
- Total number of registered candidates at the research centre :15
- No. of candidates awarded Ph. D. till date :6
- No. of candidates pursuing Ph. D. :9

## II. Research guides at the research centre

Sl.No.	Name of the Guide	Area of Specialization
1.	Dr. Bharati S. Meti	<b>Plant Biotechnology</b>
2.	Dr. Virupakshaih D.B.M	<b>Biotechnology and Bioinformatics</b>
3.	Dr. MSRC Murthy	<b>Biotechnology, Upstream and Downstream Processing Technology</b>
4.	Dr. Sharada P.	<b>Molecular biology</b>

### III. Research Scholars pursuing Ph. D program

Sl.No.	Name of the Student	Name of the Guide	Year of Registration	Research Topic
1.	Shilpa K. Jigajinni	Dr. MSRC Murthy	2012	Immobilized lipase catalysed biodiesel production from <i>Pongamia</i> seed oil
2.	Preeti S. Kumarmath	Dr. Sharada P.	2013	Biochemical and Pharmacological Evaluation of Bioactive Molecules in <i>Bryophyllum pinnatum</i>
3.	Shivaleela V.B.	Dr. MSRC Murthy	2013	Biochemical properties for recombinant tly -A protein <i>Mycobacterium tuberculosis</i>
4.	Sushma Hallad	Dr. Bharati S Meti	2013	Study on the production of Ethanol from Cellulosic material by Biochemical process
5.	Asiya Rozindar	Dr. Virupakshaih D.B.M	2016	Production of human chymase from yeast to treat chronic disorders like Asthma
6.	Pavana kumar	Dr. Bharati S Meti	2016	Bio -formulations for enhanced resistance against bacterial blight of pomegranate
7.	Mahananda Math	Dr. Virupakshaih D.B.M	2016	Development of phage from dairy products to control pathogens - <i>Listeria monocytogenes</i>
8.	Sujata Jagadish	Dr. Virupakshaih D.B.M	2017	Bacteriophage therapy for food borne <i>Klebseilla</i> species.
9.	Mallikarjun Goni	Dr. Virupakshaih D.B.M	2017	Molecular identification and gene expression analysis of sialyltransferase levels in oral malignancy

#### IV. Ph. D`s awarded from Research Centre

Sl.No.	Name of the Student	Name of the Guide	Title of Thesis	Year of Degree Awarded
1.	Krishnamurty Bhat	Dr. Bharati S Meti	Design and development of a sensor for real time monitoring of transesterification progress in reaction chamber for Biodiesel production	2018
2.	G. B. Megeri	Dr.G.M. Madhu	Adsorption of lead and cadmium using synthesized nanometal oxides	2019
3.	Hemalata V.B	Dr. Virupakshaih DBM	Bacteriophage are alternative biocontrol agents to prevent the food born Pseudomonas spp	2019
4.	Vikas C Gattaragi	Dr. Bharati S Meti	Evaluation of healthy human Gut isolates as potential probiotics	2020
5.	Premjyoti C. Patil	Dr. Bharati S Meti	Studies on biomass, lipid enhancement and molecular characterization of Chlorella spp. for Biofuel production	2021
6.	Madhumala Y.	Dr.Veena Soraganvi	Biofilm induced reduction of hexavalent chromium by indigenous microbes	2021

## V. Research Projects carried out in the department

Sl.No.	Title	Funding Agency	Amount	Year
1.	Cellulosic Conversion to Bioethanol from <i>Pongamia</i> Pod-A Biodiesel industry waste	TEQIP-II	20,000	2014-15
2.	Morphological, Physico-chemical and genetic variations in biofuel tree <i>Pongamia pinnata</i> at Bagalkot District	TEQIP-II	13,000	2014-15
3.	Microbial product of statin from <i>Aspergillus terreus</i>	TEQIP-II	25,000	2014-15
4.	Effect of nitrogen on growth and lipid synthesis in <i>Chlorell vulgaris</i> for biofuel production	KSCST	13,000	2014-15
5.	Morphological physico-chemical and genetic variations in <i>Pongamia pinnata</i> seeds at Bagalkot Dist	KSCST	12,000	2014-15
6.	A Novel Approach for the synthesis of Bioplastic from poultry waste	VGST	40,000	2015-16
7.	Simple photo bioreactor design for cultivation of algae	TEQIP-II	25,000	2015-16
8.	Production of bio-diesel from <i>Pongamia pinnata</i> by enzymatic methods	TEQIP-II	25,000	2015-16
9.	Identification and extraction of silicon (si) from bio-diesel industrial waste	TEQIP-II	25,000	2015-16
10.	Bio-reduction of hexavalent chromium from waste water using bio films.	TEQIP-II	25,000	2015-16
11.	Studies on Biomass, lipid enhancement and molecular characterization of <i>chlorella sps.</i> for Biofuel production	TEQIP-II	1,34,000	2016-17
12.	Cyanide Remedition by Adsorption and Biosorption process	KSCST	7,000	2017 -18

<b>13.</b>	Biochemical and Molecular Study of Glutathione Peroxidase enzyme in <i>Bryophyllum pinnatum</i> leaves	KSCST	7,000	2017 -18
<b>14.</b>	Biodiesel Production from waste cooking oil using Immobilization Lipase	KSCST	6,500	2018 -19
<b>15.</b>	Cyanide reduction by Bioseparation process	KSCST	6,500	2018 -19
<b>16.</b>	Combined effect of immobilized cells of <i>Pseudomonas putida</i> & <i>Chlorella sorokiniana</i> as biofertilizer	KSCST	5,000	2019 -20
<b>17.</b>	Health and wellness from pomegranate pee	KSCST	5,500	2019 -20
<b>18.</b>	Novel formulation of herbal based cleaner to wash fruits and vegetables	KSCST	6,000	2020-21
<b>19.</b>	Conversion of acid oil to biodiesel by enzymatic transesterification process	KSCST	5,500	2022-21
<b>20.</b>	Biosorption of cyanide using biofilm producing bacteria	VTU		2020-21