



Karnataka State Council for Science and Technology

Indian Institute of Science Campus, Bangalore - 560 012

Telephone: 080-23341652, 23348848, 23348849 ♦ Telefax: 080-23348840

Email: office@kscst.iisc.ernet.in, office@kscst.org.in ♦ Website: www.kscst.iisc.ernet.in, www.kscst.org.in

Dr. S. G. Sreekanteswara Swamy
Executive Secretary

7th April, 2016

Ref: 7.1.03/SPP/17

The Principal
Sapthagiri College of Engineering
14/5, Chickasandra,
Hesaraghatta Main Road,
Bangalore - 560057

Dear Sir,

Sub : Sanction of Student Project (Biofuel)-39th Series : Year 2015-2016

Your Project Proposal Reference No. :

39S_B_BE_050

Ref : Your Project Proposal entitled "

SIMAROUBA OIL CAKE: THE SOLID LOW VALUE SUBSTRATE TO
PRODUCE LIPASE WITH POTENTIAL APPLICATION IN
BIODIESEL EXTRACTION AND TO ASSAY THE TOXICITY OF
PHYTOCHEMICAL IN INHIBITION OF LIPASE ACTIVITY

I am happy to inform that your project proposal referred above, has been approved by the Secretary, KSCST for "Student Project Programme (Biofuel) 39th Series" and has been sanctioned with a budgetary break-up as detailed below:

Students	Ms. Vinitha N. and others	Budget		Amount (Rs)
		Materials/Consumables		12,000.00
Guide/s	Prof. Shobha G.	Labor		-
		Travel		500.00
Department	Biotechnology	Analysis		-
		Miscellaneous		-
		Report		500.00
		TOTAL		13,000.00
Rupees	THIRTEEN THOUSAND	ZERO HUNDRED	ONLY	

The following are the guidelines to carryout the project work :

- The project should be performed based on the objectives of the proposal sent by you.
- The project should be completed in all respects and a) **One copy** of the hardbound report b) Softcopy of the full report (including coverpages, abstract & preliminary pages in a CD (.doc and .pdf format) c) A Poster in Flex (2 x 3') for display should be submitted to KSCST.
- The project report shall mention the name of "Karnataka State Biofuel Development Board and Karnataka State Council for Science and Technology" as Sponsored Organisations in the title page. Project Title or the Objectives can be altered only with prior permission of KSCST. Any change in the project are strictly prohibited and liable for rejection and the amount sanctioned needs to be returned back to KSCST. The fund is to be utilised only to the activities to which it has been released.
- Please quote your project sanction reference number printed above in all your future correspondences.
- Important: After completing the project, 2 to 3 page write-up (synopsis) needs to be sent by e-mail [biofuelcell.kscst@gmail.com] and should include following points:
 - Title of the project
 - Name of the College & Department
 - Name of the students & Guide(s)
 - Keywords


Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057

From,
Shobha G /Saranya D
Assistant Professor
Department of Biotechnology
Sapthagiri College of Engineering
Bangalore-57

Date: 20/06/2016

To,
The Principal
Sapthagiri College of Engineering
Bangalore-57

Respected Sir,

Subject: Requisition for the release of project fund sanctioned by KSCST.

With respect to the above subject, we request you to kindly release the fund towards completion of the objectives of the project accepted by KSCST. We request you to release the fund in the name of the guides mentioned below. The expenditures done during the course of project, bill has been enclosed. Kindly do the needful.

Guide: Shobha G (Rs 13,000)
Saranya D (Rs 9,000)

Thanking You,

AKS

@21/6/16

Shobha

Yours faithfully

B
Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road
Bangalore-560 057

From,
Shobha G
Assistant Professor
Department of Biotechnology
Sapthagiri College of Engineering
Bangalore-57

Bill No	Product Description	Amount
1	Chemicals	5725 ✓
2	Sample analysis	2863 ✓
3	DD – Sample analysis Including courier charges	650 ✓
4	Sample analysis	1500 ✓
5	Report	2040 ✓
6	Olive oil	115 ✓
7	Miscellaneous (Travel + Simarouba oil Cake)	500 ✓
	Total	13393 ✓


Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057



Sakhala Enterprises

#966, "Shreeyaa" II Phase, V Stage, BEML layout, R.R. Nagar, Bengaluru-560098
Email: sakhala13@gmail.com M: 09845156415 / 09845717528

ONE TO ONE SOLUTION

Supplier & Channel Partner of Laboratory Consumables, Instruments, Research Services & Stationery Items.

VAT TIN.: 29171119444, PAN No.: ACGFS9635M

"WE SERVE THE QUALITY"

INVOICE

Original Buyer's Copy

To
Prof. Shobha
Sapthagiri College of Engineering
#14/5, Chikkasandra
Hesaraghatta Nain Road
Bangalore - 560057

No. : SE/1617/089A

Date: 17.06.2016

Sl.No.	Pro. No.	Product Description	Pack Size	Price Rs.	Qty	Amount
1	SE460090T	Petridish with triple vent Radiation Sterile - 90 x 14	100Nos.	1000	1	1,000
2	SETC287	Tween-20®	100ml	1750	1	1,750
3	SEGRM682	Gum acacia, powder	500gm	750	1	750
4	SEMV157	Tributyrin HiVeg™ Agar Base w/o Tributyrin	100gm	1500	1	1,500
						Sub Total 5,000
						VAT 14.5% 725
						Grand Total R/C 5,725

Rupees.: Five Thousand Seven Hundred and Twenty Five Only .
Grand Total Inclusive all.

Our Bank Details:

Account Name: SAKHALA ENTERPRISES

Account No.: 34422344190

IFSC Code: SBIN0017780

Bank Name: State Bank of India

Bank Address: Channasandra, Rajarajeshwari Nagar, Bengaluru - 560098

*Order once placed will not be cancelled or materials once sold will not be taken back

Payment: Please make your DD/Cheque in the Name of "SAKHALA ENTERPRISES" Payable at Bengaluru.

* Subject to Bengaluru Jurisdiction

for SAKHALA ENTERPRISES.



Authorised Signatory

Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057

INVOICE**BANGALORE TEST HOUSE**

D-36, 4th Main, KSSIDC Industrial Estate, Rajajinagar,
Bengaluru - 560 044. INDIA

Ph.: 23356415, 23385979, 23502684, 23388895, Fax: 080-23502689
e-mail: bthr@bthindia.com bthindia@hotmail.com
website: www.bthindia.com

Certifications/Approval
ISO:9001-2008
ISO:18001-2007
FSSAI

M/s.: **Shobha.G**
Sapthagiri Engineering College,
Hesarghatta Main Road,
Bangalore

Phone : 9964591024

Invoice No: FC-0102

Date : 26/04/2016

Area Code: General

Ref.No. : RFA Dt:22.04.16

Sl.	Name of sample	Report No.	Batch No.	Amount
1	Seeds	FC/2016/04/0753	Mkd-01	500.00
2	Seeds	FC/2016/04/0802	Mkd-0.1	500.00
3	Seeds	FC/2016/04/0803	Mkd-0.4	500.00
4	Seeds	FC/2016/04/0804	Mkd-0.8	500.00
5	Seeds	FC/2016/04/0805	Mkd-Control	500.00
Total Amount				2500.00
Gross Amount				2500.00
Collection Charges				0.00
Boarding & Lodging Charges				0.00
Transportation Charges				0.00
Service Tax 14.00%				350.00
Swachh Bharat Cess 0.50%				12.50
H.S.E.C. 0.00%				0.00
Rounded Off				0.00

(IN WORDS): Rs. TWO THOUSAND EIGHT HUNDRED SIXTY THREE ONLY

Service Tax NO.: STC/TIC/AZPC8617L/ST001

- * Service Tax Category : Technical Testing and Analysis
- * The sample is accepted by us subject to our general conditions of services which is available on request
- * The testing has been performed to the best of our ability & total liability of our laboratory is limited to the invoice charges/testing charges only. The test certificate does not relieve the parties from their contractual obligations etc.
- * All disputes are subject to BANGALORE Jurisdiction

Prepared By

Kaipana

For BANGALORE TEST HOUSE

Authorised Signatory

Sapthagiri College of Engineering
Chikkasandra, Hesarghatta Road
Bangalore - 560 057
PAN-NO: AAZPC861

From,

Shobha G,
Assistant professor,
Dept. of Biotechnology,
Sapthagiri college of Engineering,
Bangalore-560057.

Miscellaneous Expenses Details

Sl No.	Particulars	Amount
1	Paper prints	150/-
2	Stationary	100/-
3	Seed oil cake	250/-
	TOTAL	500/-





Principal
Sapthagiri College of Engineering
Chikkasandra, Hesarghatta Road,
Bangalore-560 057



BANGALORE TEST HOUSE

D-36, 4th Main, KSSIDC Industrial Estate, Rajajinagar, Bangalore - 560 044.

Ph.: 23356415, 23388895, 23502689 Fax : 080-23385979

e-mail : bthr@bthindia.com bthindia@hotmail.com

website : www.bthindia.com

Certifications/Approval

ISO:9001-2008

ISO:18001-2007

FSSAI

Format No. BTH/QF/116

CASH RECEIPT No. 224

Date 5/5/16

Received an amount of Rs. 1500/- (Amount in words) Rs. _____

One thousand five hundred Only.

PARTY'S NAME	BILL NO.	DATE	AMOUNT Rs.	BILL NO.	DATE	AMOUNT Rs.
Rajeev Rohan. B Bangalore				Advance		1500.00

For BANGALORE TEST HOUSE

AS
Authorised Signatory

Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057

SNEHA PRINTS
CASH BILL
No. 18892170591

Opp. Sapthagiri Engineering College, Hanumanthe Gowda Main Road
Chikkasandra, Bangalore - 560 057

Date: 20/6/16

M/S: Shobha. G

No.	SI	Description	Qty	Amount
6		Report	3	2000
				400
				2040

For SNEHA PRINTS

3

ಜಮಾ ಬಾಟ / जमापत्री / PAY-IN-SLIP / नकद / अंतरण
CASH / TRANSFER
ಭಾರತೀಯ ಸ್ಟೇಟ್ ಬ್ಯಾಂಕ್ / भारतीय स्टेट बैंक / State Bank of India

ಹೆಸರು / नाम / Name: Shobha. G
ಶಾಖೆ / शाखा / Branch: Chikkasandra

APPLICATION FOR DRAFT / BANKER'S CHEQUE

ಇದರಲ್ಲಿ / इसमें / Amount in words: Five hundred and seventy only

ರೂ. / Rs.	ಪೈ. / P.
570	00
570	00

FOR OFFICE USE
Cash Officer / Passing Officer

Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057

Payment Voucher

No. 965

Dated 23-Jun-2016

Through : SBI-30263521464

Particulars	Amount
Account : KSCST (Project Work)	13,000.00

On Account of :

being amount received from Shoba.G towards
KSCST Project work

Bank Transaction Details:

Shobha.G
Cheque 651734 23-Jun-2016 13,000.00

Amount (in words) :

INR Thirteen Thousand Only

₹ 13,000.00

Receiver's Signature

Authorised Signatory

Checked by



Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057

SAPTHAGIRI COLLEGE OF ENGINEERING
DEPARTMENT OF BIOTECHNOLOGY

(Affiliated to Visvesvaraya Technological University, Belgaum, Approved by AICTE, New Delhi)
 14/5, Chikkasandra, Hesaraghatta Main Road, Bengaluru-560057



A PROJECT REPORT ON

**“Simarouba Oil cake: The solid low value substrate to produce lipase
 with potential application in Biodiesel extraction and to assay the
 toxicity of phytochemical in inhibition of lipase activity”**

Report of 39S_BE_050 submitted to Karnataka State Council for Science and
 Technology – Biofuel Project Programme – 39series

This project has been supported by Karnataka State Council for Science and
 Technology, Indian Institute of Science, & Karnataka State Bio energy
 Development Board, Government of Karnataka.

Submitted by

Usha Rani S D (1SG12BT028)
Vinitha N (1SG12BT030)

Under the Supervision of

Mrs Shobha G
 Assistant Professor
 Department of Biotechnology
 Sapthagiri college of Engineering

Submitted To



ಕರ್ನಾಟಕ ರಾಜ್ಯ ವಿಜ್ಞಾನ ಮತ್ತು ತಂತ್ರವಿದ್ಯಾ ಮಂಡಳಿ
Karnataka State Council for Science and Technology
 Indian Institute of Science Campus, Bengaluru 560 012

2015- 2016

SAPTHAGIRI COLLEGE OF ENGINEERING

(Affiliated to VTU, Belagavi, Approved by AICTE, New Delhi)


14/5, Hesaraghatta Main Road BENGALURU-560057

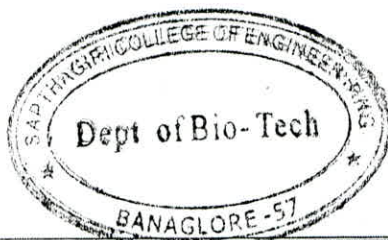


DEPARTMENT OF BIOTECHNOLOGY


CERTIFICATE

This is to certified that the Project Report entitled "Simarouba Oil cake: The solid low value substrate to produce lipase with potential application in Biodiesel extraction and to assay the toxicity of phytochemical in inhibition of lipase activity" has been carried out by Usha Rani S D (1SG12BT028) and Vinitha N (1SG12BT030) under the scheme of The Karnataka State Council For Science And Technology during the academic year 2015-2016 are bonafide students of Eight Semester, Sapthagiri College of Engineering. The research is a record of original work carried out by them, in Department of Biotechnology, Sapthagiri College of Engineering, Bangalore, Karnataka, under our guidance and supervision and it has not formed the basis for the award of any Degree.


Mrs. Shobha G
(Guide)




Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560-057


Dr. Aswatha Kumar
(Principal)
Dr. Aswatha Kumar. M
Principal
Sapthagiri College of Engineering
No. 14/5, Chikkasandra,
Hesaraghatta Main Road,
Bangalore-560 057

DECLARATION

This is to certify that Project report entitled "Simarouba Oil cake: The solid low value substrate to produce lipase with potential application in Biodiesel extraction and to assay the toxicity of phytochemical in inhibition of lipase activity" which is submitted by us to The Karnataka State Council For Science And Technology is a record of original research work carried out by me during academic year 2015-2016 under the supervision and guidance of Mrs Shobha G, Department of Biotechnology, Sapthagiri College of Engineering, Bangalore, Karnataka.



Name: Usha Rani S D

USN: 1SG12BT028



Name: Vinitha N

USN: 1SG12BT030

Date: 7/7/16

Place: Bangalore



Principal
Sapthagiri College of Engineering
Chikkasandra, Hesaraghatta Road,
Bangalore-560 057

ACKNOWLEDGEMENT

We are grateful to The Karnataka State Council for Science and Technology, Bangalore, Karnataka for considering and accepting our project proposal and giving us a chance to begin our research journey, thereby for all financial assistances. Without this, it would have been impossible to carry out the project.

*We take this opportunity to thank our Project Guide **Mrs. Shobha G** for her immense support and guidance.*

*We express our most sincere salutation to **Sapthagiri College of Engineering, Department of Biotechnology**, which gave us opportunity to have a sound base of engineering knowledge hereby helping us to fulfill our cherished desire of becoming Biotechnology Engineers.*

*We wish to express our sincere thanks to our Principal **Dr. Aswatha Kumar M**, and Director **Dr.N.Srinivasan**, Chairman **Sri Dayanand G** and Executive director **Sri Manoj G.D**, Sapthagiri College of engineering, Bangalore for providing us with excellent facilities in the college.*

*We are thankful to **Dr. Ananda S**, Head of the Department of Biotechnology. We would like to extend our deepest gratitude to all of the **Department faculty members** for their insightful comments and encouragement, non-teaching staff, one and all, who directly or indirectly, have let their hand in this venture.*

Usha Rani S D

Vinitha N


Principal
Sapthagiri College of Engineering
Chikkasandra, Hesarghatta Road,
Bangalore-560 057