

### **TEZPUR UNIVERSITY**

(A CentralUniversity)

Department of Molecular Biology and Biotechnology NAPAAM, TEZPUR-784028, ASSAM, INDIA

Dr. S. Baruah, Ph.D, Head and Coordinator

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## Certificate of the Head of the Department

This is to certify that, Ms. Rupshikha Patowary, a student of the Department of Molecular Biology and Biotechnology, Tezpur University, Assam has successfully completed the project work entitled "Antimicrobial substances produced by bacteria from soil sample" as a part of the partial fulfillment for the award of the Degree of Master of Science in Molecular Biology and Biotechnology (MBBT) under the supervision of Dr. Manabendra Mandal, Associate Professor, Department of Molecular Biology and Biotechnology, Tezpur University.

Date:

Place: Tezpur

(Dr. S. Baruah) -

Associate Professor and Head
Head,

Bept. of MBBT, T.U.



#### **TEZPUR UNIVERSITY**

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Department of Molecular Biology and Biotechnology NAPAAM, TEZPUR-784028, ASSAM, INDIA

**Manabendra Mandal**, M.hil. Ph. D. **Associate Professor**,

**Ph**.03712-267007/8/9Ext.5409 (O) **Fax**:03712-267005/267006(O) **E-mail**: mandal@tezu.ernet.in

#### **CERTIFICATE OF SUPERVISOR**

This is to certify that the work presented in this project entitled "Antimicrobial substances produced by bacteria from soil sample" has been successfully carried out by Ms. Rupshikha Patowary, an M.Sc. student as partial fulfillment of her M.Sc. degree in Molecular Biology and Biotechnology (MBBT), Tezpur University, Napaam, Tezpur-784028 during the period October, 2011 to May, 2012, under my supervision.

I wish her all success in life.

Date: 04.06.2012

Place: Tezpur

(Dr. Manabendra Mandal)

#### Acknowledgements

At the very beginning I would like to express my profound gratitude and thanks to my supervisor Dr. Manabendra Mandal, Associate Professor, Department of Molecular Biology and Biotechnology, Tezpur University, for his immense help and guidance throughout my project tenure.

I would like to express my thanks to the Head of Dept, Dr. S. Baruah, for allowing me to carry out my project and use of the lab and instruments.

My sincere thanks to my teachers- Dr. S. Baruah, Dr S.K, Ray, Dr T. Medhi, Dr. A. Ramteke, Dr. R. Doley, Mr. E. Kalita, Dr.A. Jha and Dr. Nima Namsa.

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I also thank the local people for their immense help in collection of my samples.

I am highly grateful towards DBT for financial assistance and support and fulfillment of the project.

Last but not the least. I express my deep regards and gratefulness to my parents, brother and sisters for their endless support, encouragements and love.

Rupshikha Palowary (Ms Rupshikha Patowary)

#### **DECLARATION BY THE CANDIDATE**

This is to declare that I have carried out the M.Sc. Project entitled "Antimicrobial substances produced by bacteria from soil sample" under the guidance of Dr.Manabendra Mandal, Associate Professor, in the Department of Molecular Biology and Biotechnology, Tezpur University, for the partial fulfillment of the award of the Degree of Master of Science in Molecular Biology and Biotechnology. The thesis embodied accounts for my own findings and has not been submitted previously anywhere for any degree whatsoever by either me or anyone else.

Date: 04.06.2012

Rupshikha Palawary Ms Rupshikha Patowary

Roll No MBM10002

# DEDICATED TO TO BELOVED PARENTS