

Preparation of Ionic Liquid Modified rGO/MoS₂ Hybrid Electrode

A Project Report Submitted to
Mahatma Gandhi University, Kottayam
In Partial Fulfilment of the Requirements for the award of Degree of
MASTER OF SCIENCE IN CHEMISTRY

By,

MARTINA JOHN

Reg. No: - 190011009497

2019-2021

Department of Chemistry, Alphonsa College, Pala



Under the Supervision of

Dr. SONEY C GEORGE

Professor and Dean Research

Center for Nanoscience and Technology

Amal Jyothi College of Engineering,

Koovappally, Kerala - 686518



The Kerala Minerals and Metals Ltd.

(A Govt. Of Kerala Undertaking)

(An ISO 9001, ISO 14001, OHSAS 18001 & SA 8000 Certified Company)

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Fax : + 91-0476-2680101, 2686721

E-mail : contact@kmml.com, URL www.kmml.com



TP/PD/T-14/21
22.04.2021

CERTIFICATE

This is to certify that Ms. Anna Joseph, M.Sc student of Alphonsa College, Palai has done a Project work on "Physico Chemical Analysis Of Titanium Ores From Two Different Sources" in the LAB of the Titanium Dioxide Pigment Unit of the Company, Chavara from 05.04.2021 to 17.04.2021.

She was found to be an industrious and motivated person with good conduct and character during the entire training period.

[Signature]
Manager (Welfare)





BONOFIDE CERTIFICATE

This is to certify that the project report entitled "QUANTITATIVE STRUCTURE ACTIVITY RELATIONSHIP OF EBSULPHUR DERIVATIVES AND THEIR POTENTIALINHIBITORY EFFECT ON SARS COV -2 MAIN PROTEASE" submitted by Ansu Maria Benny, (Reg.No.:190011009488) in partial fulfillment of the requirements for the degree in Master of in Science in Chemistry offered by the Mahatma Gandhi University during the academic year 2019-2021 is original work carried out by the student under my supervision and guidance.

To the best of our knowledge, the matter embodied in the project has not been submitted to any other University/Institute for the award of any degree or diploma.

Project Guide,

Sri. Aby Jimson
Head of the Department
St. Stephen's College, Uzhavoor

Countersigned by,

Ms. Deepamol Varghese
Head of the Department
Alphonsa College, Pala

Place: Pala

Date: 4 June 2021





BONIFIED CERTIFICATE

This is to certify that the project report entitled “Quantitative Structure Activity Relationship Of Ebselen Derivatives And Their Potential Inhibitory Effect On Sars CoV-2 Main Protease” submitted by DEEPA BABY, Reg. No: 190011009491 in partial fulfilment of the requirements for the degree in Master of Science in Chemistry offered by the Mahatma Gandhi University during the academic year 2019-2021 is original work carried out by the student under my supervision and guidance.

To the best of our knowledge, the matter embodied in the project has not been submitted to any other University/Institute for the award of any degree or diploma.

Project Guide

ABY JIMSON

Head of the Department

DEEPAMOL VARGHESE

Place: Palai

Date: 4 June 2021





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CERTIFICATE

This is to certify that Chinju PS student of Alphonsa College, Pala (affiliated to MG University, Kottayam) had carried out project work in the laboratories of our Research and Development Division on the topic "SYNTHESIS AND CHARACTERISATION OF PHENOL-FORMALDEHYDE RESIN AND EMISSION OF FORAMALDEHYDE FROM PF RESIN AND BOARD" three weeks from 16 April 2021 to 3 May 2021.

Technical Manager

Research and Development Division

WIP, Kannur





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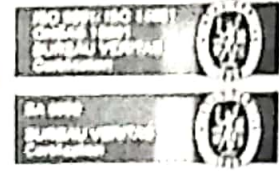
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CIN-U14109KL1972SQC002399


TP/PD/T-14/21

22.04.2021

CERTIFICATE

*This is to certify that **Ms.Dona Grace Thomas**, M.Sc student of Alphonso College, Palai has done a Project work on "**Study of X-Ray Diffraction and Chemical Behaviour Of Natural Rutile and Ilmenite**" in the LAB of the Titanium Dioxide Pigment Unit of the Company, Chavara from **05.04.2021 to 17.04.2021**.*

She was found to be an industrious and motivated person with good conduct and character during the entire training period.


Manager (Welfare)





BONOFIDE CERTIFICATE

This is to certify that the project report entitled "QUANTITATIVE STRUCTURE ACTIVITY RELATIONSHIP OF EBSULFUR DERIVATIVES AND THEIR POTENTIAL INHIBITORY EFFECT ON SARS CoV-2 MAIN PROTEASE" submitted by JERIN JOSEPH (Reg. No:190011009493) in partial fulfilment of the requirements for the degree in Master of in Science in Chemistry offered by the Mahatma Gandhi University during the academic year 2019-2021 is original work carried out by the student under my supervision and guidance.

To the best of our knowledge, the matter embodied in the project has not been submitted to any other University/Institute for the award of any degree or diploma.

Project Guide,

Sri. Aby Jimson

Head of the Department

St. Stephen's College, Uzhavoor

Countersigned by,

Ms. Deepamol Varghese

Head of the Department

Alphonso College, Pala

Place: Pala

Date: 4 June 2021



CERTIFICATE

This is certified that the thesis entitled "CHEMICAL ANALYSIS AND COMPARITIVE STUDY OF WHITE CEMENT AND GREY CEMENT ", by,LIZANDRA THOMAS Reg.no: 190011009495, submitted to Mahatma Gandhi University, Kottayam for the degree of Master of Science in Chemistry, is a record of bonafide research work , carried out by her under the guidance of chemist V. J. Lovely, in Travancore Cements Limited, Nattakom, Kottayam.



Ms. Deepamol Vargheese
Head of the Department of Chemistry [S.F]
Alphonsa College, Pala



V.J. Lovely (Chemist)
Project Guide
Travancore Cements Ltd
Nattakom, Kottayam





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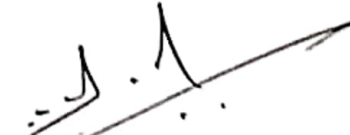
TP/PD/T-14/21

22.04.2021

CERTIFICATE

This is to certify that **Ms.Mariyamol Joseph**, M.Sc student of Alphonso College, Palai has done a Project work on **"X-Ray Diffraction And Chemical Composition Study Of Natural And Synthetic Rutile"** in the LAB of the Titanium Dioxide Pigment Unit of the Company, Chavara from **05.04.2021 to 17.04.2021**.

She was found to be an industrious and motivated person with good conduct and character during the entire training period.


Manager (Welfare)



CERTIFICATE

This is certified that the thesis entitled "CHEMICAL ANALYSIS AND COMPARITIVE STUDY OF WHITE CEMENT AND GREY CEMENT ", by NIGIMOL JOHINSON, Reg.no: 190011009498, submitted to Mahatma Gandhi University, Kottayam for the degree of Master of Science in Chemistry, is a record of bonafide research work , carried out by her under the guidance of chemist V. J. Lovely, in Travancore Cements Limited, Nattakom, Kottayam.



Ms. DEEPAMOL VARGHEESE

Head of the Department of Chemistry [S. F]

Alphonsa College, Pala



V.J. LOVELY (Chemist)

Project Guide

Travancore Cements Ltd,

Nattakom, Kottayam



**SYNTHESIS AND CHARACTERISATION
OF UREA-FORMALDEHYDE RESIN
AND EMISSION OF FORMALDEHYDE
FROM UF RESIN AND BOARD**

Submitted to Mahatma Gandhi University in Partial Fulfillment for the
award of degree of

MASTER OF SCIENCE IN CHEMISTRY

By

RIYA SURESH

(190011009499)



DEPARTMENT OF CHEMISTRY

ALPHONSA COLLEGE, PALA

(Affiliated to Mahatma Gandhi University, Kottayam)

MAY 2021

CERTIFICATE

This is to certify that the project work entitled; "PREPARATION OF RUBBER PAPER WEIGHT " has been carried out by SRUTHI S. (Permanent Reg. No. 190011009501), final semester MSc Chemistry student, PG Department of Chemistry Alphonsa College, Pala, under the guidance of Dr. Vinayakan R., Assistant Professor, Post Graduate & Research Department of Chemistry, NSS Hindu College Changanacherry, for the partial fulfillment of the requirements for the degree of Master of Science in Chemistry and the same has not been submitted elsewhere for any degree.



Project Supervisor



Head, Dept. of Chemistry [S-F]

CERTIFICATE

This is to certify that the project report entitled "THE COMPARITIVE STUDY OF GREY AND WHITE CEMENT" is a record of work carried out by Ms.SARANYAMOL VR under mysupervision and guidance in partial fulfillment of the requirement for the award of the Master degree of science in Pure chemistry.This work has not been presented before for the award of any other degree.



Prof. DEEPAMOL VARGHESE

HOD

Department of Chemistry [S.F.]

Alphonsa college, Pala

Alphonsa college, Pala



V. J. LOVELY MOL

Chemist

Travancore

Nattakam



CERTIFICATE

This is to certify that the project work entitled; "**PREPARATION OF RUBBER DOOR MAT**" has been carried out by **TREESA THOMAS** (Permanent Reg. No. 190011009502), final semester MSc Chemistry student, PG Department of Chemistry Alphonsa College, Pala, under the guidance of Dr. Vinayakan R., Assistant Professor, Post Graduate & Research Department of Chemistry, NSS Hindu College Changanacherry, for the partial fulfillment of the requirements for the degree of Master of Science in Chemistry and the same has not been submitted elsewhere for any degree.



Project Supervisor



Head, Dept. of Chemistry [S.F.]

Post Graduate Department of Chemistry
ALPHONSA COLLEGE, PALA
Affiliated to Mahatma Gandhi University, Kottayam



BONAFIDE CERTIFICATE

This is to certify that the dissertation entitled "Tribological Study of Polymer Nanocomposites" is an authentic report of the work submitted by Ms. Vidhya Muraleedharan in partial fulfilment of the award of Degree of Master of Science in Chemistry of Mahatma Gandhi University is a record of bonafide work carried out by her at Amal Jyothi College of Engineering, Koovappally under the supervision of Dr. Soney C George.

Pala

Date: 30-03-2021




Mrs. Deepamol Varghese
Head of the Department [S.F.]

**THE COMPARATIVE STUDY OF DIFFERENT BRANDS OF
WHITE CEMENT**

Project Report submitted to

Mahatma Gandhi University, Kottayam

**In partial fulfillment of the requirements for the award for the Degree of
MASTER OF SCIENCE IN CHEMISTRY**



Submitted by

Aparna S

Reg.No.190011009489

Department of chemistry, Alphonsa college, Pala

Under the guidance of

V J Lovely

Chemist

TRAVANCORE CEMENTS LIMITED

NATTAKOM, KOTTAYAM

ACKNOWLEDGMENT

It's my pleasure to present my project report entitled *THE COMPARATIVE STUDY OF DIFERENT BRANDS OF WHITE CEMENT*, however it would not been possible without the kind help and support of many individuals and organizations. I would like to extend my sincere thanks to all of them.

I highly indebted to my supervisor V.J Lovely, for her guidance and constant supervision as well as providing necessary information regarding the project.

I would like to thank Ms. Deepamol Varghese Head of the department chemisty Alphonsa college Pala, Kottayam to provide me an opportunity to do my project in Travancore Cements Limited Nattakom, Kottayam

Last but not least am thanking the almighty for showering his blessings on me.

I pay my overwhelming love and regards to my parents, teachers, and my friends for their blessing, motivation, and moral support.