



PROF. MADYA DR. FARAH WAHIDA BINTI HARUN

PENSYARAH UNIVERSITI DS14

CONTACT

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Address: Fakulti Sains Dan
Teknologi

SUPERVISION

PhD - Completed: 5, Ongoing: 0

Master - Completed: 4, Ongoing: 1

AREAS OF EXPERTISE

Catalysis, Kinetics And Mechanisms Of Reactions

Biomass Fuel And Energy

BIOGRAPHY

A lecturer from Fakulti Sains Dan Teknologi. Holds a Phd in Chemistry.

ACADEMIC QUALIFICATION

Phd in Chemistry (2010)

Master in Science Chemistry (2005)

Bachelor in Science (2003)

RESEARCH

1. ELUCIDATING THE STRUCTURE?ACTIVITY RELATIONSHIP OF IRON-IMPREGNATED COFFEE GROUND ASH IN BIFUNCTIONAL CATALYSIS OF WASTE FRYING OIL

2026

ON GOING

MAIN RESEARCHER

2. MODIFIED WASTE CHICKEN BONES DERIVED BI-FUNCTIONAL CATALYST FOR BIODIESEL PRODUCTION FROM HIGH FREE FATTY ACIDS WASTE COOKING OIL

2021

ON GOING

MAIN RESEARCHER

3. MONTMORILLONITE CLAY MODIFIED WITH METAL CATIONS AS ACID CATALYSTS FOR BIODIESEL PRODUCTION FROM WASTE COOKING OIL.

2017

COMPLETED

MAIN RESEARCHER

4. METAL CATION -EXCHANGED MONTMORILLONITE K10 AS A GREEN CATALYST FOR PRODUCTION OF OLEIC ACID ALKYL ESTERS

2016

COMPLETED

MAIN RESEARCHER

5. IMMOBILIZED METAL COMPLEXES ON MONTMORILLONITE AS HETEROGENEOUS CATALYST FOR EPOXIDATION OF PALM OIL.

2012

COMPLETED

MAIN RESEARCHER

6. DEVELOPMENT OF AN ALTERNATIVE MATERIAL FOR HYDROGEN STORAGE DERIVED FROM MONTMORILLONITE NANOCCLAY

2012 COMPLETED MAIN RESEARCHER

7. PRELIMINARY STUDY OF BIO-BASED SHAPE MEMORY POLYURETHANE NANOCOMPOSITES FOR BIOMEDICAL APPLICATION

2011 COMPLETED MAIN RESEARCHER

PUBLICATION

1. PRELIMINARY STUDY ON THE USE OF MAGNETIZE Fe_3O_4 - ZrO_2 CATALYST FOR BIODIESEL PRODUCTION

2023 PROCEEDING

2. PHYSICOCHEMICAL PROPERTIES OF REFINED PALM COOKING OIL AND USED PALM COOKING OIL

2019 JOURNAL

3. FOURIER TRANSFORM INFRARED SPECTROSCOPY AS A TECHNIQUE FOR MULTIVARIATE ANALYSIS OF LARD ADULTERATION IN FOOD PRODUCTS: A REVIEW

2019 JOURNAL

4. MODIFICATION OF MONTMORILLONITE K10 WITH Al^{3+} AND ITS POTENTIAL IN BIODIESEL PRODUCTION

2019 JOURNAL

5. MONTMORILLONITE K10 MODIFIED WITH Fe^{3+} FOR BIODIESEL PRODUCTION FROM WASTE COOKING OIL

2019 PROCEEDING

6. ESTERIFICATION OF OLEIC ACID WITH ALCOHOLS OVER Cu -MMT K10 AND Fe -MMT K10 AS ACID CATALYSTS

2018 JOURNAL

7. Cu^{2+} MONTMORILLONITE K10 CLAY CATALYST AS A GREEN CATALYST FOR PRODUCTION OF STEARIC ACID METHYL ESTER: OPTIMIZATION USING RESPONSE SURFACE METHODOLOGY (RSM)

2018 JOURNAL

8. PREPARATION AND CHARACTERIZATION OF IMMOBILIZED MOLYBDENUM COMPLEX ON PILLARED MONTMORILLONITE K-10

2018 JOURNAL

9. FOURIER TRANSFORMS INFRA-RED SPECTROSCOPY: PRINCIPLE AND ITS APPLICATION IN HALAL INDUSTRY

2018 CHAPTER IN BOOK

10. M-MMT K10 (M: Cu , Al AND Fe) AS CATALYSTS FOR THE ESTERIFICATION OF ACETIC ACID AND STEARIC ACID WITH METHANOL

2017 PROCEEDING

11. STEARIC ACID ESTERS SYNTHESIZED USING IRON EXCHANGED MONTMORILLONITE K10 CLAY CATALYSTS

2016 JOURNAL

12. METAL CATION EXCHANGED MONTMORILLONITE K10(MMTK10): SURFACE PROPERTIES AND CATALYTIC ACTIVITY

2016 JOURNAL

13. THE PHOTOCHEMISTRY OF $\text{Cr}(\text{CO})_6$ IN HIGH PRESSURE LOW TEMPERATURE POLYMER MATRIX MONITORED BY FOURIER TRANSFORM INFRARED AND UV-VIS SPECTROSCOPY

2016 JOURNAL

14. ANALYTICAL METHODS TO ANALYZE LARD IN FOOD PRODUCTS

2016 CHAPTER IN BOOK

15. THE PHOTOCHEMISTRY OF $\text{Cr}(\text{CO})_6$ IN HIGH PRESSURE LOW TEMPERATURE POLYMER MATRIX MONITORED BY FOURIER TRANSFORM INFRARED AND UV-VIS SPECTROSCOPY

2015 PROCEEDING

16. ALUMINUM MODIFIED MONTMORILLONITE K10 (AL-MMT K10) AS AN ENVIRONMENTAL FRIENDLY CATALYST IN PRODUCTION OF STEARIC ACID ESTERS

2015 PROCEEDING

17. PREPARATION AND CHARACTERIZATION OF IMMOBILIZED MOLYBDENUM COMPLEX ON PILLARED MONTMORILLONITE K-10

2014 PROCEEDING

18. QUANTIFICATION OF AMORPHOUS CIMETIDINE USING FT-RAMAN SPECTROSCOPY

2014 CHAPTER IN BOOK

19. THE PHOTOCHEMISTRY OF CR(CO)₆ USING MATRIX ISOLATION TECHNIQUE

2013 PROCEEDING

20. BASICS OF FOURIER TRANSFORM INFRA RED SPECTROSCOPY AND ITS SAMPLE PREPARATION

2013 CHAPTER IN BOOK

21. THE PHOTOCHEMISTRY OF METAL CARBONYL USING MATRIX ISOLATION TECHNIQUE

2012 PROCEEDING

22. ISLAM PEMANGKIN SAINS DAN TEKNOLOGI.

2006 CHAPTER IN BOOK

23. PENCIRIAN BAHAN MESOPOROS MCM-41 YANG DIMODIFIKASIKAN DENGAN TITANIUM.

2005 JOURNAL

CONSULTATION/ADULATION

1. SISTEM KEDATANGAN PELAJAR UNIVERSITI SAINS ISLAM MALAYSIA (USIM)

2023 UNIVERSITY NONE

2. PENSIJILAN - ADVANCE QA/QC PROCEDURES FOR LABORATORIES

2022 UNIVERSITY KEMENTERIAN PENGAJIAN TINGGI

3. PROFESSTONAL HALAL TRAINING PROGRAM (PHTP) SIRI 1/2017

2017 NATIONAL INSTITUTE OF HALAL RESEARCH AND MANAGEMENT (IHRAM)

AWARDS/RECOGNITION

1. ANUGERAH PENTADBIR CEMERLANG

2025 OTHERS

2. ANUGERAH PENERBITAN JURNAL BERINDEKS WOS/SCOPUS/MYCITE

2025 OTHERS

3. ANUGERAH REKABENTUK INOVASI PENGAJARAN DAN PEMBELAJARAN

2025 UNIVERSITY

4. VISITING PROFESOR

2025 INTERNATIONAL

5. FROM HUSK TO HOPE ?COCONUT HUSK-BASED MAGNETIC CATALYST FOR SUSTAINABLE TEXTILE WASTEWATER TREATMENT

2025

Antarabangsa

Silver