

Profile Image

**PROF. MADYA DR.  
MOHD AZMAN BIN  
HASHIM @ ISMAIL**

PENSYARAH UNIVERSITI DS14

## CONTACT

**Phone:** 067986555

**E-mail:**  
m\_azman@usim.edu.my

**Faculty:** Fakulti Sains  
Dan Teknologi

## SUPERVISION

PhD - Completed: 2, Ongoing: 1

Master - Completed: 0,  
Ongoing: 0

## AREAS OF EXPERTISE

Energy Storage

Electrochemical Materials

Membranes

## ACADEMIC QUALIFICATION

PhD in Bahan Termaju (2009)

Bachelor in Fizik Gunaan (2001)

Diploma in Elektrik Kuasa Dan Kawalan (1996)

Sijil in Elektrik Kuasa (1995)

## RESEARCH

### 1. DEVELOPMENT OF ARTIFICIAL INTELLIGENCE BASED INTEGRATED UNMANNED AIRCRAFT COUNTERMEASURES AND MANAGEMENT SYSTEM

2025

GERAN KPT

ON GOING

CO-RESEARCHER

### 2. IDENTIFICATION OF PSYCHOLOGICAL PROFILES OF E- SPORT ADDICTION AND IT'S RELATION TOWARDS VIOLENCE IN MALAYSIA

2019

GERAN PENYELIDIKAN USIM

COMPLETED

CO-RESEARCHER

### 3. DEVELOPMENT OF INTEGRATION OF NAQLI AND AQLI KNOWLEDGE MODEL AS AN EPISTEMOLOGICAL FOUNDATION IN MOULDING UNIVERSITI SAINS ISLAM MALAYSIA'S EDUCATIONAL PRACTICES

2018

GERAN PENYELIDIKAN USIM

COMPLETED

CO-RESEARCHER

### 4. THE ABILITY OF HYBRID SOLID POLYMER ELECTROLYTE (HSPE) FROM DIAPERS FOR HIGH PERFORMANCE ELECTROCHEMICAL DOUBLE LAYER CAPACITOR(EDLC)

2015

GERAN PENYELIDIKAN PENTADBIR

COMPLETED

MAIN

RESEARCHER

5. DENSITY FUNCTIONAL THEORY (DFT) CALCULATION OF  
SUPERCONDUCTIVITY OF CAC6, BAC6, YBC6, C6CAC6 AND  
OTHER GRAPHITE COMPOUNDS

2013 GERAN PENYELIDIKAN USIM COMPLETED CO-RESEARCHER

# RESEARCH

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6. CARBON NANOTUBE AS ELECTRODE MATERIAL FOR HIGH PERFORMANCE ELECTROCHEMICAL DOUBLE LAYER CAPACITORS (EDLC) WITH HYBRID SOLID POLYMER ELECTROLYTE (HSPE).

2011 GERAN KPT COMPLETED MAIN RESEARCHER

7. THE STUDY OF CELLULOSE-BASED HYBRID SOLID POLYMER ELECTROLYTES

2010 GERAN KPT COMPLETED MAIN RESEARCHER

# PUBLICATION

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## 1. THE PHILOSOPHICAL EXAMINATION ON INTEGRATION OF KNOWLEDGE AND WAYS FORWARD

INTERNATIONAL JOURNAL OF HUMANITIES, PHILOSOPHY AND LANGUAGE (IJHPL)

2021 JOURNAL OTHER DATABASE CO-AUTHOR

## 2. OPTIMIZATION OF DYE EXTRACTION FROM PURPLE CABBAGE AND CORDYLINE FRUTICOSA IN DYE-SENSITIZED SOLAR CELL

SOLID STATE PHENOMENA

2020 JOURNAL ERA CO-AUTHOR

## 3. SCAN RATES AND THE DISPARITIES IN THE ELECTROCHEMICAL DOUBLE LAYER CAPACITOR EDLC PERFORMANCE

SOLID STATE PHENOMENA

2020 JOURNAL SCOPUS CO-AUTHOR

## 4. PCM-BASED FOR HEAT STORAGE IN SOLAR-THERMAL CONVERTER

SOLID STATE PHENOMENA

2020 JOURNAL ERA CO-AUTHOR

## 5. RAHSIA DI SEBALIK ILMU FIZIK

2019 BOOK MAIN AUTHOR

## 6. THE STRUCTURAL PROPERTIES OF SN-DOPED ZINC OXIDE SYNTHESIZED BY HOT-TUBE THERMAL EVAPORATION

AIP CONFERENCE PROCEEDINGS 1972

2018 JOURNAL SCOPUS CO-AUTHOR

## 7. HYBRID SOLID POLYMER ELECTROLYTE FROM DIAPERS AS SEPARATOR FOR ELECTROCHEMICAL DOUBLE LAYER CAPACITOR (EDLC)

AIP CONFERENCE PROCEEDINGS 1972,

2018 JOURNAL SCOPUS MAIN AUTHOR

## 8. A REVIEW OF ZT MEASUREMENT FOR BULK THERMOELECTRIC MATERIAL

RECENT ADVANCEMENT ON APPLIED PHYSICS, INDUSTRIAL CHEMISTRY AND CHEMICAL TECHNOLOGY AIP CONF. PROC. 1972, 030002-17030002-8; [HTTPS://DOI.ORG/10.1063/1.5041223](https://doi.org/10.1063/1.5041223) PUBLISHED BY AIP PUBLISHING. 978-0-7354-1679-6/\$30.00

2018 JOURNAL SCOPUS CO-AUTHOR

## 9. SUPERCAPACITOR ELECTRODES FROM ACTIVATION OF BINDERLESS GREEN MONOLITHS OF BIOMASS SELF-ADHESIVE CARBON GRAINS COMPOSED OF VARYING AMOUNT OF GRAPHENE ADDITIVE

IONICS

2017 JOURNAL SCOPUS CO-EDITOR

## 10. ELECTRIC DOUBLE-LAYER CAPACITORS WITH TEA WASTE DERIVED ACTIVATED CARBON ELECTRODES AND PLASTIC CRYSTAL BASED FLEXIBLE GEL POLYMER ELECTROLYTES

JOURNAL OF PHYSICS: CONFERENCE SERIES

2016 JOURNAL SCI CO-AUTHOR

## 11. AN ELECTROCHEMICAL DOUBLE LAYER CAPACITOR BASED ON ACTIVATED CARBON ELECTRODES FROM COCONUT RESIDUE

REGIONAL CONFERENCE ON SCIENCES, TECHNOLOGY AND SOCIAL SCIENCES 2016

2016 PROCEEDING NON-INDEX CO-AUTHOR

## 12. GRAPHENE AND ACTIVATED CARBON BASED SUPERCAPACITOR ELECTRODES

ADVANCED MATERIALS RESEARCH

2015 JOURNAL ERA CO-AUTHOR

## 13. ACTIVATED CARBON ELECTRODE FROM DESICCATED COCONUT RESIDUE FOR HIGH PERFORMANCE OF SUPERCAPACITORS

JOURNAL OF MATERIALS SCIENCE RESEARCH

2015 JOURNAL SCI CO-AUTHOR

# PUBLICATION

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## 14. USING PVA, METHACRYLATE AND LAUROYL CHITOSAN AS SEPARATOR IN SUPERCAPACITORS.

JOURNAL OF MATERIALS SCIENCE RESEARCH

2013 JOURNAL SCI MAIN AUTHOR

## 15. SUPERCAPACITOR AS A RENEWABLE ENERGY AND ITS CONTRIBUTION TO UMMAH

PIONEERING ISLAMIC SCIENCE, SPEARHEADING KNOWLEDGE

2013 CHAPTER IN BOOK MAIN AUTHOR

## 16. SHAPE MEMORY BIOPOLYURETHANE

PIONEERING ISLAMIC SCIENCE, SPEARHEADING KNOWLEDGE

2013 CHAPTER IN BOOK CO-AUTHOR

## 17. ISLAMIC PERSPECTIVE ON THE POTENTIAL OF ELECTRIC POWER TRANSMISSION USING HIGH TEMPERATURE SUPERCONDUCTING WIRES

PIONEERING ISLAMIC SCIENCE, SPEARHEADING KNOWLEDGE

2013 CHAPTER IN BOOK CO-AUTHOR

## 18. A METHOD OF LINES APPROACH IN THE NUMERICAL SOLUTION OF 1-DIMENSIONAL SCHRÖDINGER'S EQUATION

APPLIED PHYSICS RESEARCH

2012 JOURNAL WOS MAIN AUTHOR

## 19. SUPERCAPACITORS BASED ON ACTIVATED CARBON AND POLYMER ELECTROLYTE

INTERNATIONAL JOURNAL OF SUSTAINABLE ENERGY AND ENVIRONMENTAL RESEARCH

2012 JOURNAL WOS MAIN AUTHOR

## 20. SUPERCAPACITORS BASED ON ACTIVATED CARBON AND POLYMER ELECTROLYTE

8TH ASIAN MEETING ON ELECTROCEAMICS (AMEC-8)

2012 PROCEEDING NON-INDEX MAIN AUTHOR

## 21. SUPERCAPACITOR BASED ON ACTIVATED CARBON AND HYBRID SOLID POLYMER ELECTROLYTE

RESEARCH MATERIAL INNOVATION

2011 JOURNAL WOS MAIN AUTHOR

## 22. SUPERCAPACITOR BASED ON ACTIVATED CARBON AND HYBRID SOLID POLYMER ELECTROLYTE

3RD INTERNATIONAL CONFERENCE ON FUNCTIONAL MATERIALS AND DEVICES 2010 (ICFMD 2010)

2010 PROCEEDING NON-INDEX MAIN AUTHOR

## 23. ELECTROCHEMICAL DOUBLE LAYER CAPACITOR BASED ON CELLULOSE-PVA HYBRID ELECTROLYTE

IONICS

2006 JOURNAL WOS MAIN AUTHOR

## 24. SUPERCAPACITORS BASED ON ACTIVATED CARBON WITH CELLULOSE ELECTROLYTES

INTERNATIONAL MEETING ON FRONTIERS OF PHYSICS 2005

2005 PROCEEDING NON-INDEX MAIN AUTHOR

# AWARDS/RECOGNITION

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## 1. ACADEMIC ADVISOR

MQA

2023

NATIONAL

## 2. MODUL TAMARI: INAQ ENVIRONMENTAL SUSTAINABILITY MODULE AT TAMHIDI CENTRE

Pre-University Matriculation Innovation Competition (PIITRAM) 2023

2023

KEBANGSAAN

SILVER

## 3. VISITING RESEARCHER

PERSATUAN SAINS & TEKNOLOGI KEADAAN PEPEJAL MALAYSIA, MASS MALAYSIA

2022

NATIONAL

## 4. ACADEMIC ADVISOR

UNIVERSITY TUNKU ABDUL RAHMAN, UTAR

2022

UNIVERSITY

## 5. PENGANUGERAHAN ANUGERAH BUKU UMUM TERBAIK

2021

UNIVERSITY

## 6. ACADEMIC ADVISOR

FAKULTI SAINS DAN TEKNOLOGI, UTM

2021

UNIVERSITY

## 7. ACADEMIC ADVISOR

UNIVERSITI TEKNOLOGI MALAYSIA

2021

NATIONAL

## 8. NOVEL RESEARCH AND INNOVATION COMPETITION 2017 (NRIC 17)

2017

NATIONAL

## 9. DIAMOND FOR INTERNATIONAL INVENTION OF THE YEAR 2017

2017

INTERNATIONAL

## 10. DOUBLE GOLD FOR INTERNATIONAL INVENTION OF THE YEAR 2017

2017

INTERNATIONAL

## 11. DOUBLE LAYERED ROOF COOLING SYSTEM CONTROLLED BY ARDUINO

NOVEL RESEARCH INNOVATION AND COMPETITION (NRIC 2017)

2017

KEBANGSAAN

GOLD

## 12. ?DOUBLE LAYERED ROOF COOLING SYSTEM CONTROLLED BY ARDUINO?

?THE 17TH BRITISH INVENTION SHOW? (BIS)

2017

ANTARABANGSA

GOLD

## 13. PENYELIDIKAN TERBAIK

2015

UNIVERSITY

## 14. SUPER-CAPASITOR: A FUTURE BATTERY ALTERNATIVE

EKSPO INOVASI ISLAM I-INOVA 2012

2012

KEBANGSAAN

SILVER