



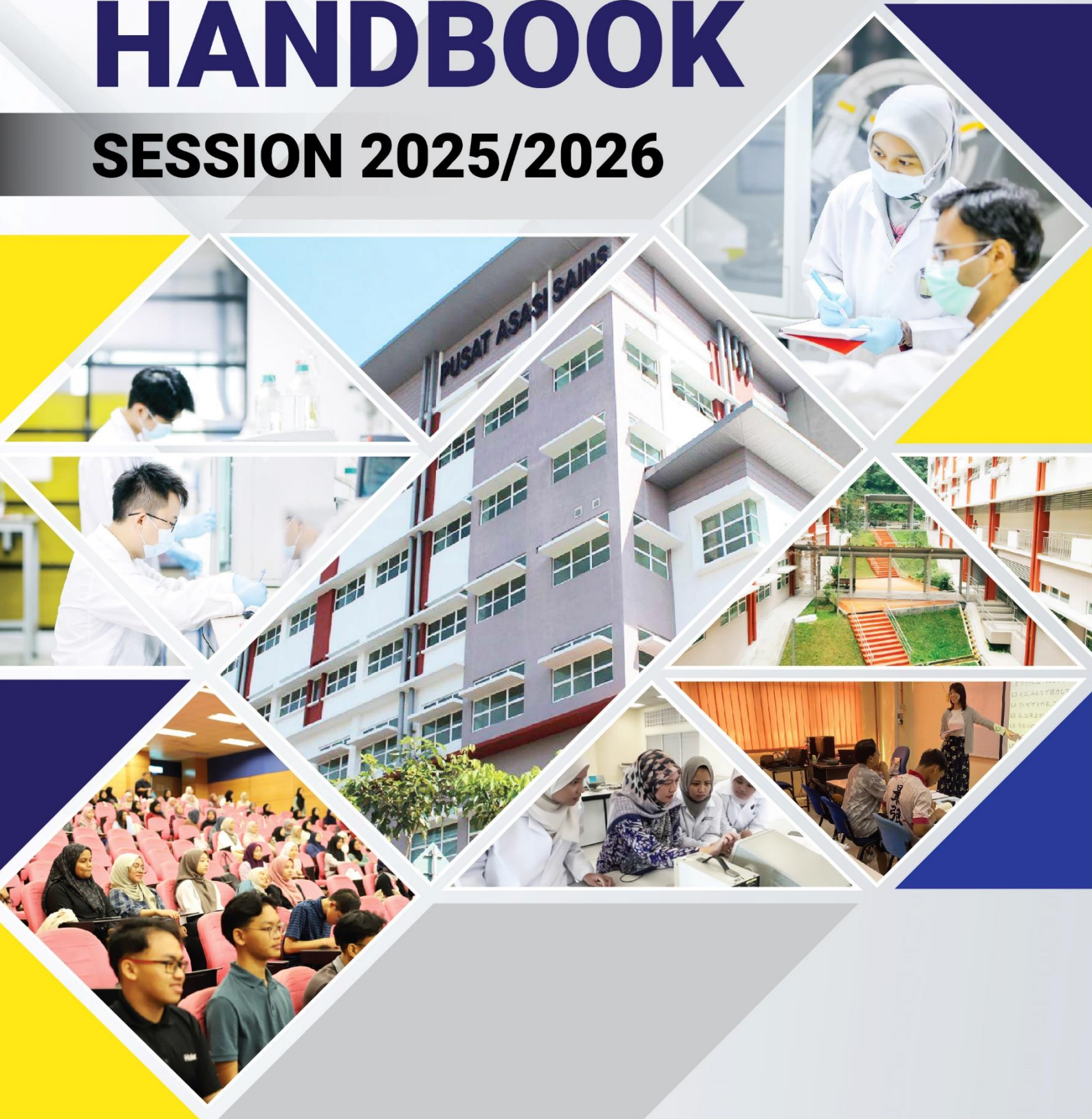
UNIVERSITI
MALAYA

PUSAT ASASI SAINS

Centre for Foundation Studies in Science

PASUM HANDBOOK

SESSION 2025/2026



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VISION

A global university impacting the world.

MISSION

Pushing the boundaries of knowledge and nurturing aspiring leaders.

CORE VALUES

P : PASSION (Embrace, Inspire, Resourceful)
 O : ONENESS (Accord, Partnership, Mutual Respect)
 I : INTEGRITY (Disciplined, Trustworthy)
 S : SINCERITY (Honest, Willing, Transparent)
 E : EMPATHY (Concern, Tolerant, Receptive)

QUALITY POLICY

Universiti Malaya is committed to conduct teaching and learning, carry out research and provide quality services on a global level, generate and enhance knowledge through continuous improvement efforts for the benefit of all stakeholders, especially Universiti Malaya's students.

TAGLINE

Home of the Bright, Land of the Brave
Di Sini Bermulanya Pintar, Tanah Tumpahnya Berani

WELCOME NOTE FROM THE EXECUTIVE DIRECTOR OF PASUM

Assalamualaikum and warm greetings,

On behalf of the entire community at the Centre for Foundation Studies in Science, Universiti Malaya (PASUM), it is with great pride and joy that I extend my heartfelt congratulations to all students selected to join the Foundation Programme for the 2025/2026 session. Your admission into the PASUM family marks the beginning of an academic journey filled with both challenges and opportunities.



Established in 1977, PASUM has grown steadily over the past 49 years into a distinguished and reputable foundation centre. Founded through the inspiration and aspirations of prominent national figures, PASUM plays a vital role in balancing the representation of Bumiputera students in the sciences, while providing access to academically excellent students from middle-income and underprivileged backgrounds to pursue their studies at Universiti Malaya. To date, PASUM has successfully produced over 35,000 graduates who have become respected leaders, scholars, and prominent figures within the Bumiputera community.

Throughout its history, PASUM has introduced a range of relevant and progressive academic programmes. Starting with the Foundation in Life Sciences and Physical Sciences, followed by the Japanese Special Preparatory Programme in the early 1980s, the Foundation in Islamic Studies and Science in 2012, and most recently, the Foundation in Social Sciences in the 2023/2024 session. Furthermore, PASUM has expanded its educational reach by implementing offshore foundation programmes at Xi'an International University in China in 2024/2025 and opening enrolment to international students from the 2025/2026 session onwards.

In addition, the PASUM community has demonstrated outstanding achievements through numerous prestigious competitions such as the Inter-Foundation Debates, Malaysia Foundation Sports Competition, Inter-Foundation Innovation Competitions, Pantun Festivals, and many more, at both national and international levels. These successes not only reflect the high commitment of our students and staff but also reinforce PASUM's reputation as a competitive and outstanding foundation centre in the higher education landscape.

As a visionary institution, PASUM steadfastly upholds our vision: "A Prominent Foundation Centre Impacting the World" and our mission: "To Develop Citizen Leaders Dedicated to Creating a Positive Impact Through an Innovative Education." We are committed to providing a conducive learning environment supported by experienced educators, comprehensive facilities, and a holistic students support system.

In line with this, a student handbook is prepared as reference guide to assist students in understanding the academic matters the rules, facilities, and various opportunities available throughout their studies at PASUM. We hope it will facilitate your adaptation and encourage your full commitment to the learning process.

I am confident that the positive values and noble qualities you will cultivate here will shape your maturity, identity, and excellent both academically that and personally. The entire PASUM community is dedicated to support your development into outstanding individuals who will make meaningful contributions to religion, nation, and society.

In closing, I encourage all of you to strive diligently, seize every opportunity, and make your experience at PASUM a strong foundation for future success.

Wishing you all the very best and a warm welcome to the Centre for Foundation Studies in Science, Universiti Malaya (PASUM)!

Thank you.

Professor Ir. Dr. Farazila Yusof
2025

LEGACY OF EXCELLENCE: THE HISTORY OF PASUM

The **Centre for Foundation Studies in Science, Universiti Malaya (PASUM)**, stands as a premier pre-university institution in Malaysia. Established in 1976 under Section 18 of the Universiti Malaya Constitution, PASUM has remained steadfast in its mission to empower Bumiputera students by providing a robust and rigorous foundation in science and mathematics, preparing them for undergraduate excellence at Universiti Malaya and other distinguished public universities.

The inaugural academic session of 1977/78 marked the beginning of this noble journey, producing trailblazing graduates who went on to pursue degrees in Medicine, Engineering, and Science. These pioneers proudly received their Bachelor's degrees at the Universiti Malaya Convocation in 1983. A year later, in 1984, the **first cohort of Foundation in Science** students made history by graduating in the medical field—marking a monumental achievement for the programme.

In line with its holistic philosophy, PASUM students are housed in the university's residential colleges, providing them with early immersion into the dynamic and vibrant culture of campus life. In 1982, PASUM expanded its academic horizons by introducing the **Special Preparatory Programme (Japan) (RPKJ)**, followed by two strategic additions in the 1988/89 session: the **Pre-Accounting Programme**, designed for future economists and administrators, and the **Pre-English as a Second Language Programme**, tailored for aspiring educators. By the 1997/98 session, the institution had further diversified with the launch of the **Pre-Law** and **Pre-Built Environment** programmes.

The 2004/05 academic session marked a bold transformation with the complete adoption of English as the medium of instruction for the Foundation in Science Programme, reflecting PASUM's commitment to global standards and academic competitiveness. Since then, enhanced English language training has become a cornerstone of the programme, ensuring students are equipped with the linguistic proficiency essential for higher learning and professional success.

Today, PASUM offers a dynamic range of programmes, including the **Foundation in Life Sciences**, **Physical Sciences**, **Social Sciences**, and the prestigious **Special Preparatory Programme (Japan) (RPKJ)**. Its distinguished faculty, comprising doctorate-level educators with expertise across diverse scientific disciplines, is supported by state-of-the-art facilities and cutting-edge educational technologies that foster a world-class learning experience.

Reflecting PASUM's commitment to academic excellence and quality assurance, both the Foundation in Life Sciences and Foundation in Physical Sciences programmes were awarded the **Certificate of Accreditation** by the **Malaysian Qualifications Agency (MQA)** on **22 May 2018**, affirming their alignment with national academic standards. More recently, the Foundation in Social Sciences programme achieved a significant milestone by receiving the **Certificate of Accreditation from the MQA** on **23 May 2024**, further strengthening PASUM's reputation as a centre of academic distinction.

In line with Universiti Malaya's international initiative aimed at expanding access to higher education and strengthening its global presence, the Centre for Foundation Studies in Science (PASUM) continued its growth trajectory in the 2024/2025 academic session by introducing two key strategic initiatives. These include the opening of the PASUM Cyberjaya Campus to accommodate the SATU Channel intake, and the launch of PASUM's first offshore programme at Xi'an International University, China—both reflecting the Centre's commitment to internationalisation and widening educational access. Looking ahead, beginning with the 2025/2026 academic session, PASUM will become the official programme owner for the **Foundation in Islamic Studies and Science**. Additionally, PASUM will take another bold step by opening a Non-Citizen Channel (*Saluran Bukan Warganegara*) for all its foundation programmes—Life Sciences, Physical Sciences, and Social Sciences—further reinforcing its dedication to inclusivity and global outreach.

With over **48 years of unwavering excellence**, PASUM has proudly nurtured more than **45,000 scholars**, each equipped with a solid scientific with mathematical and social sciences grounding. These alumni have gone on to make impactful contributions across a wide spectrum of professional fields—including medicine, engineering, science and technology, information systems, social sciences and beyond—both in Malaysia and on the global stage.

PASUM ADMINISTRATION

PASUM is led by an Executive Director and assisted by two Executive Deputy Directors. Ten program/division/course coordinators have been established to strengthen the academic administration at PASUM. Additionally, there is a manager, three Assistant Registrars, and an Assistant Administrative Officer, as well as support staff who assist the administration and student affairs of PASUM.

STAFF

PASUM has 116 academic staff, including a Professor (Executive Director), 27 Lecturers, 42 Education Service Officers, 12 English Teachers, 14 Language and 20 Subject Teachers for the Special Preparation Program (Japan)/RPKJ. The majority of them hold Master's and Doctoral degrees in their respective fields.

Additionally, PASUM has 56 non-academic staff who help manage, provide support and services. Further details about the staff of PASUM for the 2025/2026 session are as follows:

ADMINISTRATION OFFICE EXECUTIVE DIRECTOR

EXECUTIVE DIRECTOR

Professor Ir. Dr. Farazila binti Yusof - BEng (Hons) CAD/M (UM), MEngSc (UM), PhD (Japan), PEng, CEng MIMechE

EXECUTIVE DEPUTY DIRECTOR (ACADEMIC AND STUDENT AFFAIRS)

Dr. Norsiah binti Hashim - BSc (UTM), MSc (UTM), PhD (UM)

EXECUTIVE DEPUTY DIRECTOR (DEVELOPMENT, RESEARCH & INNOVATION)

Dr. Norli Anida binti Abdullah - BSc (UM), MSc (UM), PhD (UM)

MANAGER

Mrs. Nohzah binti Zulkarnain - Bachelor in Human Sc. (Political Science) (Hons) (UIAM)

SENIOR ASSISTANT REGISTRAR

Mrs. Nur Fatehah Raudhah binti Ariffin - BSc (UM)

ASSISTANT REGISTRAR

Mr. Amirul Eqhwan bin Rahim - BSc (UM)

Mr. Mohd Sharil bin Mat Nayan - BBA.Fin (UiTM) M.Fin (UPM)

ASSISTANT ADMINISTRATIVE OFFICER

Ms. Intan Shafura binti Abdullah - Dip Public Admin (UiTM), B Corp Admin (UiTM)

OFFICE ASSISTANT SECRETARY

Mr. Shahrul Al Rashid bin Md Sharif
Mrs. Amirah Nadia binti Saringat
Ms. Puteri Nur Nasuha Idayu binti Mohd Nazri

ASSISTANT SCIENCE OFFICER

Mr. Mohamad Hairul Azmir bin Harun
Mrs. Norsyuhadah binti Yahya
Mrs. Noor Fhadzilah binti Mansur

ASSISTANT ENGINEER

Mr. Muhammad Zubir bin Abd Manaf
Mr. Muhammad Syamiel bin Zulkifli
Mr. Mohammad Hafizi bin Mohd Ghazali

ASSISTANT INFORMATION TECHNOLOGY OFFICER

Mr. Mohd Hasri bin Che Ros

COMPUTER TECHNICIAN

Mr. Seemandass a/l Ryepun

ADMINISTRATIVE ASSISTANT

Mrs. Nor Aziah binti Abas
Mrs. Norhaniyah binti Mohamed Yunos
Mrs. Nurulasyikin binti Abd Majid
Mrs. Nurul Syahirah binti Abdul Hamid
Mrs. Raja Kamariah binti Raja Bakar
Mrs. Nur Ezzati binti Esham
Mrs. Amirah Fadhilah binti Anuar
Mr. Muhammad Faisal bin Zaharudin
Mr. Mohd Shahrulnizam bin Mohamed Sufian (Finance)
Mrs. Johamira binti Johan (Finance)

DESIGNER

Mr. Azwan Azali bin Abd Rahman

GENERAL SERVICES ASSISTANT

Mr. Muhamad Illzam bin Ishak
Mr. Mohd Farhan bin Shamsudin
Mr. Mohd Jauzi bin Mohd Shahidin
Mrs. Nor Haslinda binti Hassan
Mrs. Rozilah binti Mohamad Tahi
Mrs. Vilasini a/p Sukumaran

DRIVER

Mr. Mohd Safwan bin Jasmi

PHYSIC DIVISION

COORDINATOR

Dr. Mohd Fahmi bin Azman - BEng (UM), MEngSc (UM), PhD (UM)

SENIOR LECTURERS/LECTURERS

Dr. Zainal Abidin bin Ali- BSc (UM), MSc (UM), PhD (UM)

Dr. Aisyah Hartini binti Jahidin -BEng (UM), MEngSc (UM), PhD (UiTM)

Dr. Salmiah binti Ibrahim - BSc (UM), MPhil (UM), PhD (UM)

Dr. Norhiwani binti Mohd Hapipi -BSc (UPM), MPhil (UTM), PhD (UTM)

Dr. Siti Nabila binti Aidit - BSc (UTM), PhD (UM)

Dr. Hashlina binti Rusdi - BSc (UM), MSc (UM), PhD (UM)

EDUCATION SERVICE OFFICERS

Mr. Naharudin bin Mustafa -BSc (UKM), MSc (UM), PGDE (UM)

Mr. Hafizul bin Mat -BSc (UiTM), PGDE (UM)

Mr. Mohd Yahya bin Ahmad -BSc (UiTM), MSc (UiTM), PGDE (UM)

Mr. Amirul Hakimi bin Baderus-BSc (UKM), PGDE (UM)

Mrs. Norhafiza binti Muda -BSc (UiTM), MSc (UM), PGDE (UM)

Ms. Nur Shamimi Akmal binti Azany - BSc Ed (UPM)

Ms. Nurul Izzati binti Azman - BSc (UKM), MSc (UKM), PGDE (UM)

Ms. Nor Jannah binti Muhd Satar - BSc (UiTM), MSc (UiTM)

Ms. Laili Marlina binti Khaidir - BSc (USM), MSc (USM)

LAB ASSISTANTS

Mr. Muhammad Izzat bin Ramli

Mr. Aminuddin bin Basrom

Mr. Muhammad Syafiq bin Muhamad Wahid

Mrs. Noor Ilham Aliya binti Zulkifli

Ms. Shamsiah binti Abd Rahman

Ms. Siti Intan Nor Ain binti Rahim

BIOLOGY DIVISION

COORDINATOR

Mrs. Maslenda binti Markom - BSc (UM), MSc (UM), PGDE (UM)

SENIOR LECTURERS

Dr. Mahassan bin Mamat - BSc (UM), MSc (UM), PhD (UM)

Dr. Nor Azlina binti Abd Aziz - BSc (UM), MPhil (UM), PhD (UM)

Dr. Mahanom binti Jalil - BSc (UM), MSc (UM), PhD (UM)

Dr. Hazwani binti Mat Saad - BSc (UM), MSc (UM), PhD (UM)

Dr. Ahmad Husaini bin Suhaimi - BSc (UM), PhD (UM)

Dr. Nurul Nadiyah binti Abd Razak - BSc (UM), MSc (UM), PhD (Sunway University)

LAB ASSISTANTS

Mr. Mohd Hafiszan bin Mohd Yusuf

Mr. Shahnizam bin Sakiman

Mr. Muhammad Azrul bin Razali

Mr. Muhammad Shafiq bin Rohaidi

Mrs. Hajartul Niza binti Abd Ghani

MATHEMATICS DIVISION**COORDINATOR**

Mr. Hisham Safuan bin Mohamad Sukri - BSc Ed (UM)

SENIOR LECTURERS/LECTURERS

Dr. Ahmad Syafadhli bin Abu Bakar - BSc (UiTM), MSc (UiTM), PhD (UK)

Dr. Siti Fatimah binti Hassan - BSc (Ed) (UM), MPhil (UM), PhD (UM)

Dr. Norsiah binti Hashim - BSc (UTM), MSc (UTM), PhD (UM)

Dr. Norli Anida binti Abdullah - BSc (UM), MSc (UM), PhD (UM)

Dr. Fatin Nabila binti Abd Latiff - BSc (UM), MSc (UM), PhD (UM)

EDUCATION SERVICE OFFICERS

Dr. Ahmad Zaki bin Mohamad Amin - Dip.Sc (UITM), BSc (UiTM), MSc (UTM), PhD (UTM)

Mr. Jedzry Fadzlin bin Jalaluddin - BSc (UM), MSc (UiTM), PGDE (UM)

Mr. Amirul Mohamad Khairi bin Mannan - BSc (UM), MSc (UiTM), PGDE (UM)

Mr. Fakhrulrozi bin Hussain - BEng (UM), MPhil (UM), PGDE (UM)

Mr. Muhammad Syukri bin Mazlin - BSc (UiTM), MSc (UiTM)

Mr. Wan Muhammad Aqif bin Wan Ahmad Sukri - BSc (IIUM), PGDE (UKM)

Mrs. Raiha Shazween binti Redzuan - BSc (UM), PGDE (UM)

Ms. Raihan binti Zainudin - BEng (USyd), PGDE (UM)

Ms. Danitah a/p Selainerthi - BEdu (UNITAR), MEd (UM)

Dr. Mardiah Hafizah binti Muhammad Hafizi - BSc (IIUM), MSc (IIUM), PhD (UPM)

CHEMISTRY DIVISION**COORDINATOR**

Mr. Mohd Hilmi bin Jaafar - BSc (UM), MSc (UM)

SENIOR LECTURERS/LECTURERS

Dr. Fauzani binti Md Salleh - BSc (UKM), MSc (UKM), PhD (UM)

Dr. Liew Sook Yee - BSc (UMT), PhD (UM)

Dr. Ahmad Danial bin Azzahari - BSc (UM), MSc (UM), PhD (UM)

Dr. Siti Nor Farhana binti Yusuf - BSc (UM), MSc (UM), PhD (UM)

Dr. Syazreen Nadia binti Sulaiman - BSc (UKM), MSc (UM), PhD (UM)

Dr. Siti Mastura binti Mohamad Zakaria - BMedSc (IIUM), MSc (UM), PhD (UM)

Dr. Nurshafiza binti Shahabudin - BSc (UM), MSc (UM), PhD (UM)

EDUCATION SERVICE OFFICERS

Mr. Che Mohd Farhan bin Che Mat Dusuki - BSc (UM), MSc (UKM), PGDE (UM)

Mr. Muhammad Hafiz bin Husna Hasnan - B.Ed (UPSI), MSc (UPSI)

Mrs. Zuraini binti Kadir - BSc (UM), MSc (UM), PGDE (UM)

Mrs. Mahfuzah binti Yusoff - BSc (UM), MSc (UM), PGDE (UM)

Mrs. Wan Nurhidayah binti A.Karim - BSc (UM), MSc (UM), PGDE (UM)

Mrs. Nurul Shulehaf binti Mansor - BSc (UMT) MSc (UiTM)

Mrs. Azlina binti Puang - BSc (UM), MSc (UM), PGDE (UM)

Ms. Nor Syadza binti Zamani - BSc ED (UM)

Ms. Norhafiza binti Roslan - BSc (UiTM), MSc (UTM)

LAB ASSISTANTS

Mr. Mohd Saiful Nizam bin Nordin

Mr. Mohd Fazly bin Ab. Rahim

Mr. Sadek bin Sanusi

Mrs. Nurul Ashikim binti Mohd

Mrs. Nor Amirah binti Che Ibrahim

Mrs. Nurzarith Sofea binti Azmi

Mrs. Siti Nurhusna binti Jamalluddin

OPERATION ASSISTANTS

Mrs. Rosliza binti Yosof
 Mr. Wan Mohd Arif bin Wan Mahmood
 Mr. Wan Ahmad Idlan bin Nasron

ENGLISH DIVISION**COORDINATOR**

Mrs. Shazlin Niza binti Ab Razak - Bedu (UiTM), M. Ling (UM)

ENGLISH TEACHERS

Mr. Andy Helmy bin Zainal Abidin - B.English in TESOL (Unirazak)
 Mrs. Nik Fatin binti Nik Hashim - B.HSc in ELL (UIA)
 Mrs. Rabiatal Adawiyyah binti Abdullah - B. Ed. (Hons.) in TESL (UiTM), M. Ling. (UM)
 Mrs. Sakila a/p Govindaraju - B.L.L(Hons)(UM), MESL (UM),
 Mrs. Suhaila Hani binti Zaidin - BArt Eng (University of Wisconsin, Madison)
 Mrs. Nurul Nazifah bin Dato' Haji Mat Noh - B.HSc in ELL (UIA), MA (USM)
 Mrs. Zarinah binti S.A Mohd Abu Bakar Ali - B.A English (UM), M.Ed TESL (UM)
 Ms. Nur Azzat Izzaty binti Abdul Rahim - B. HSc in ELL (UIA), MA in Literature (USM),
 Ms. Nur Aina Athirah binti Zulkifli - B.Edu in TESL (UM)
 Ms. Matthuri a/p Palanee - Bac Edu (UNISEL), MEDU TESL (UPSI)
 Mr. Muhammad Amirul Ikmal bin Mohd Nor - Bachelor of Education (Hons) TESL (UiTM)

SELF DEVELOPMENT**COORDINATOR**

Mrs. Zuraini Kadir - PGDE (UM), BSc (UM), MSc (UM)

FOUNDATION IN ISLAMIC STUDIES & SCIENCES**COORDINATOR**

Dr. Hashlina binti Rusdi - BSc (UM), MSc (UM), PhD (UM)

FOUNDATION IN SOCIAL SCIENCES**COORDINATOR**

Mrs. Suhaila Hani binti Zaidin - BArt Eng (University of Wisconsin, Madison)

SENIOR LECTURERS/LECTURERS

Dr. Nur Syazwani binti Ahmad - BBA (UPM), MBA (UPM), PhD (UM)
 Dr. Nurul Aishah binti Khairuddin - BEcon (UUM), MEcon (UKM), PhD (UKM)

EDUCATION SERVICE OFFICERS

Mr. Muhammad Aiman Asyraf bin Hanafi - BAcc (MMU), MPhil (MMU)
 Mr. Muhamad Haziq bin Mohd Asad - BSc (UIAM)
 Mr. Chow Kah Yong - BAcc (UM), MAcc (UM)
 Mr. Yong Shang Hua - LLB (UWE), MCJ (UM)
 Datin Farinda binti Abdul Ghani - BSc. Mdx,UK, MA (Mdx,UK)
 Ms. Nur Faizira binti Abdul Rahman - LLB (UUM), LLM (UM)
 Ms. Nursyafiqah binti Zakaria - Bacc (UUM)
 Ms. Nursyamira binti Shaid - BA (UM), MA (UM)
 Ms. Anis Asmidar binti Zamani - BAcc (UiTM), MBA (UiTM)

OFFSHORE FOUNDATION PROGRAM IN CHINA**COORDINATOR**

Mr. Muhammad Aiman Asyraf bin Hanafi - BAcc (MMU), MPhil (MMU)

SPECIAL PREPARATORY PROGRAM (JAPAN) / RPKJ**COORDINATOR**

Mrs. Fazrina binti Said - BInf (Shizuoka), MSc (UiTM)

HEAD OF JAPANESE TEACHERS

Mr. Kurioka Seishi - MSc (Ed) (Kobe)

HEAD OF JAPANESE SUBJECT TEACHERS

Mr. Takahara Satoshi - BSc (Kyushu)

HEAD OF JAPANESE LANGUAGE TEACHERS

Mr. Fujisaki Yasunori - BA (Musashi), MA (Ohio State)

COORDINATOR OF JAPANESE LANGUAGE YEAR 1

Ms. Khairul Bariah binti Abd Latif Azmi - BE (Akita), MA (UM)

TEACHERS OF JAPANESE LANGUAGES YEAR 1

Ms. Khairul Bariah binti Abd Latif Azmi - BE (Akita), MA (UM)

Mrs. Fazrina binti Said - BInf (Shizuoka), MSc (UiTM)

Mr. Mohd Norhaswira bin Hasan - BE (Nagoya)

Ms. Siti Fatimah Abdul Alim - BEAS (UM), MMS (UM)

Mr. Sakashita Taichi - BA Oriental History (Kokushikan), MA (Japanese Lang) (Obirin)

Mr. Kuchikata Shuichi - BA, MEd (Tokyo Gakugei)

Ms. Kubo Aki - BA (Osaka), MA (Osaka)

COORDINATOR OF JAPANESE LANGUAGE YEAR 2

Mrs. Maisarah binti Kamal - BE (Fukui), MA (Kanazawa)

TEACHERS OF JAPANESE LANGUAGES YEAR 2

Mrs. Maisarah binti Kamal - BE (Fukui), MA (Kanazawa)

Mr. Muhammad Nazrul Nana Khurizan - BE (Miyazaki), MA (Tokyo Foreign Studies)

Ms. Ayaka Maki - BEd (Yokohama National), MA, PhD (Tohoku)

Ms. Fujitani Sachiko - BA (Notre Dame Seishin), MEd (Himeji Dokkyo)

TEACHERS OF JAPANESE SUBJECTS (CHEMISTRY)

Ms. Chiba Maho - BAgric (Tohoku)

Mr. Unten Osamu - BAgric (Kobe), MSc (Kyoto)

Mr. Shinomiya Teruo - BSc, MSc (Soka)

Mr. Tamura Moriyuki - BSc.Eng (Aoyama Gakuin)

Mr. Urakawa Junichi - BSc (Ibaraki)

TEACHERS OF JAPANESE SUBJECTS (PHYSICS)

Mr. Kimura Michiro - BSc (Chiba), MSc (Okayama)

Mr. Isobe Kinichi - BAstr, MAstr (Tohoku)

Mr. Domoto Fumiya - BEd (Hiroshima)

Mr. Haraguchi Yukio - BSc.Eng (Saga)

Mr. Kuboyama Fuminori - BSc (Kyushu)

TEACHERS OF JAPANESE SUBJECTS (MATHEMATICS)

Mr. Abe Tsuneyuki - BSc (Tohoku)

Mr. Hasama Naoki - BE (Yamagata), MEd (Joetsu)

Mr. Takahara Satoshi - BSc (Kyushu)

Mr. Nakajima Junichi - BSc.CSE, MSc.CSE (Aizu)

Mr. Saito Tomoki - BEd (Hiroshima)

Mr. Kusa Yosuke - BE (Tohoku)

Mr. Iwasaki Atsushi - BSc (Tokyo University of Science)

Ms. Kanzaki Fuka - BEd (Hyogo University of Teacher)

ACADEMIC CALENDAR 2025/2026

ACADEMIC CALENDAR 2025/2026 ACADEMIC SESSION (LIFE SCIENCE, PHYSICAL SCIENCE, SOCIAL SCIENCE AND ISLAMIC & SCIENCE FOUNDATION LEVEL)				
SEMESTER I				
Orientation Week	1 week	14.07.2025	-	20.07.2025
Lectures	9 weeks *	21.07.2025	-	21.09.2025
Mid Semester I Break	1 week	22.09.2025	-	28.09.2025
Mid Semester I Test	1 week	29.09.2025	-	05.10.2025
Lectures	8 weeks *	06.10.2025	-	30.11.2025
Revision Week	1 week	01.12.2025	-	07.12.2025
Semester I Final Examination	2 weeks	08.12.2025	-	21.12.2025
Semester I Break	2 weeks *	22.12.2025	-	28.12.2025
	25 weeks			
SEMESTER II				
Lectures	7 weeks *	29.12.2025	-	15.02.2026
Mid Semester II Break	1 week *	16.02.2026	-	22.02.2026
Mid Semester II Test	1 week	23.02.2026	-	01.03.2026
Lectures	10 weeks *	02.03.2026	-	10.05.2026
Revision Week	1 week	11.05.2026	-	17.05.2026
Semester II Final Examination	2 weeks *	18.05.2026	-	31.05.2026
	22 weeks			

(*) The Academic Calendar has taken into account public and festive holidays and is subject to change:

- National Day (31 August 2025)
- Maulidur Rasul (05 September 2025)
- Malaysia Day (16 September 2025)
- Deepavali (20 October 2025)
- Christmas Day (25 December 2025)
- New Year (1 January 2026)
- Federal Territory Day (1 February 2026)
- Thaipusam (1 February 2026)
- Chinese New Year (17-18 February 2026)
- Nuzul Al-Quran (7 March 2026)
- Eidul Fitri (20-21 March 2026)
- Labour Day (1 May 2026)
- Eidul Adha (27 May 2026)

*MUET Speaking : 29, 30 OCTOBER, 3, 4, 5, 6 NOVEMBER 2025

*MUET Writing : 22 NOVEMBER 2025

PROGRAM FEES SESSION 2025/2026

Course fees Perdana Channel (UPU)

FEES	FOUNDATION IN LIFE SCIENCES	FOUNDATION IN PHYSICAL SCIENCES	FOUNDATION IN SOCIAL SCIENCES
Admission	RM370.00	RM370.00	RM370.00
1 ST SEMESTER	RM690.00	RM655.00	RM640.00
2 ND SEMESTER	RM690.00	RM665.00	RM640.00
Total	RM1,800.00	RM1,700.00	RM1,700.00

Course fess Open Channel (SATU)

FEES	FOUNDATION IN LIFE SCIENCES	FOUNDATION IN PHYSICAL SCIENCES	FOUNDATION IN SOCIAL SCIENCES
Admission	RM500.00	RM500.00	RM500.00
1 ST SEMESTER	RM9,549.00	RM9,549.00	RM7,287.40
2 ND SEMESTER	RM9,549.00	RM9,549.00	RM7,287.40
Total	RM19,600.00	RM19,600.00	RM15,100.00

Course fees International

FEES	FOUNDATION IN LIFE SCIENCES	FOUNDATION IN PHYSICAL SCIENCES	FOUNDATION IN SOCIAL SCIENCES
Admission	RM800.00	RM800.00	RM800.00
1 ST SEMESTER	RM17,900.00	RM17,900.00	RM17,900.00
2 ND SEMESTER	RM17,100.00	RM17,100.00	RM17,100.00
Total	RM35,000.00	RM35,000.00	RM35,000.00

Notes

- Total fee has been rounded up to nearest hundred.
- Admission Fees are included in the total fees for Semester 1 & semester 2.
- The fees listed above do not include the accommodation fee.
- Fee rates stated above are subjected to change.

ADMINISTRATIVE INFORMATION

1. WITHDRAWAL PROCEDURE FROM FOUNDATION PROGRAMME

Students are required to apply for withdrawal immediately through the MAYA system. (Refer Appendix A)

2. ABSENT DURING THE COURSE

a. Exemption from Lecture/Tutorial/Practical

A student who is unable to attend a lecture/tutorial/practice during the study week must apply for permission from the Director of PASUM by filling up the online Application Form for Leave/Exemption from Lecture/Tutorial/Practice (please click on the link provided) and attach the relevant supporting letter/document.

Students will be only exempted from attending Lectures/Tutorials/Practice on the requested day and date after obtaining approval from the Director.

b. Medical Leave / Sick Leave

If the student is unable to attend the Lecture/Tutorial/Practice due to health reasons, the student is required to fill up an online medical leave/sick leave application form and attach the medical certificate within 7 days. (Please click the link provided)

<https://asasi.um.edu.my/e-data-pelajar>

3. ABSENT DURING EXAMINATION / TEST

The student must submit a medical leave certificate or a doctor's report on the type of illness and health condition of the student which is issued by a Registered Medical Practitioner, Universiti Malaya Clinic/Government Hospital/Universiti Malaya Medical Centre or Private Hospital.

4. RULES AND REGULATIONS OF THE UNIVERSITI MALAYA (Centre for Foundation Studies in Science) 2024

All students are subject to the Rules and Regulations of Universiti Malaya (Centre for Foundation Studies in Science) 2024.

<https://umcms.um.edu.my/sites/centre-for-foundation-studies-in-science/buku-panduan>

PROGRAMME INFORMATION

FOUNDATION PROGRAMME IN LIFE SCIENCES/PHYSICAL SCIENCES

Programme Educational Objectives (PEO)

- PE01** Use basic knowledge at foundation level of studies to pursue tertiary education in various fields of Mathematics, Science and Engineering.
- PE02** Demonstrate technical skills in their field of study and the processes of critical thinking, creative thinking and problem solving.
- PE03** Possess positive attitudes for lifelong learning.

PROGRAMME OBJECTIVES

This program aims to provide students with knowledge and skills in the fields of Science, Technology, Engineering and Mathematics (STEM) holistically to ensure that they successfully further their studies at the Bachelor's Degree level in any relevant faculties at Universiti Malaya, or at any other higher education institutions.

PROGRAMME LEARNING OUTCOMES

At the end of this foundation program, students can:

1. Apply facts, concepts, principles and basic processes of science in making decisions.
2. Apply the basic principles of science to identify and solve problems.
3. Engage in continuous learning and practical activities in related basic science fields.
4. Apply the basic concepts of science effectively, accurately and coherently in both orally and in written form.
5. Apply digital technology in finding and processing data and basic science related information.
6. Find, interpret and use relevant basic science information for self-skills for lifelong learning.

FOUNDATION IN SOCIAL SCIENCES

Programme Educational Objectives (PEO)

This Social Science Foundation Program aims to produce:

- PE01** Graduates are theoretically and practically knowledgeable in the field of social sciences.
- PE02** Graduates can communicate in a team and show good leadership and ethical characteristics in a group.
- PE03** Graduates can use numeracy and digital skills in problem solving.

PROGRAMME LEARNING OUTCOMES

At the end of this programme, students are able to:

1. Explain concepts, principles and processes in the field of social science studies.
2. Apply the theory and basic principles learned for problem solving.
3. Carry out academic activities such as collecting, analysing, organizing and processing data.
4. Demonstrate effective communication and social skills when working as a team.
5. Use numeracy and digital applications to process data in the field of social science.
6. Apply basic leadership skills in group activities.
7. Apply individual self-skills and characteristics of entrepreneurs when carrying out activities.
8. Demonstrate effective teamwork while maintaining high ethics and professionalism

FOUNDATION IN SCIENCES PROGRAMME

FOUNDATION IN LIFE SCIENCES

Component	SEMESTER 1		SEMESTER 2		Total Credit hours
	Subjects	Credit	Subjects	Credit	
UNIVERSITY COURSES	FAX1001 - Self Development	1	FAX1001 - Self Development	1	55
	FAX1002 - Information Technology	1	FAX1006 - Basic Communication Skills	2	
	FAX1005 - English for Foundation Studies	4			
CORE COURSES PROGRAM	FAD1001 - Biology 1	3	FAD1003 - Biology 3	3	
	FAD1002 - Biology 2	3	FAD1004 - Biology 4	3	
	FAD1016 - Basic Chemistry 1	4	FAD1018 - Basic Chemistry 2	4	
	FAD1017 - Practical Chemistry 1	2	FAD1019 - Practical Chemistry 2	2	
	FAD1020 - Basic Physics 1	4	FAD1022 - Basic Physics 2	3	
	FAD2021 - Practical Physics 1	2	FAD1023 - Practical Physics 2	2	
	FAD1013 - Mathematics I	4	FAD1014 - Mathematics II	3	
			FAD1015 - Mathematics III	3	
	Total credit hours	28		27	

FOUNDATION IN PHYSICAL SCIENCE

Component	SEMESTER 1		SEMESTER 2		Total Credit hours
	Subjects	Credit	Subjects	Credit	
UNIVERSITY COURSES	FAX1001 - Self Development	1	FAX1001 - Self Development	1	55
	FAX1002 - Information Technology	1	FAX1006 - Basic Communication Skills	2	
	FAX1005 - English for Foundation Studies	4			
CORE COURSES PROGRAM	FAC1001 - Advanced Mathematics I	3	FAC1003 - Programming II	3	
	FAC1002 - Programming 1	3	FAC1004 - Advanced Mathematics II	3	
	FAD1016 - Basic Chemistry 1	3	FAD1018 - Basic Chemistry 2	3	
	FAD1017 - Practical Chemistry 1	2	FAD1019 - Practical Chemistry 2	2	
	FAD1020 - Basic Physics 1	3	FAD1022 - Basic Physics 2	3	
	FAD2021 - Practical Physics 1	2	FAD1023 - Practical Physics 2	2	
	FAD1013 - Mathematics 1	4	FAD1014 - Mathematics II	3	
			FAD1015 - Mathematics III	3	
	Total credit hours	28		27	

FOUNDATION IN SOCIAL SCIENCES

Component	SEMESTER 1		SEMESTER 2		Total Credit hours
	Subjects	Credit	Subjects	Credit	
UNIVERSITI COURSES	FAG1001 - Thinking skills	3	FAG1005 - English II	3	50
	FAG1002 - English I	3	FAG1006 - Co-Curriculum	2	
	FAG1003 - Basics Information Technology & Communication	3			
	FAG1004 - Mathematics	4			
CORE COURSES PROGRAM	FAG1007 - Fundamentals of Management	4			
	FAG1008 - Principles of Economics	4			
	FAG1009 - Introduction to Law	4			
CORE COURSES PROGRAM			<u>ACCOUNTING</u>		
			FAG1010 - Financial Accounting		
			FAG1011 - Principles of Marketing		
			FAG1012 - Management Accounting		
			<u>Humanity</u>		
			FAG1013 - Fundamentals of Psychology	4	
			FAG1014 - Sociology	4	
			FAG1015 - Writing and Research Skills	4	
			<u>Arts</u>		
			FAG1017 - Introduction to Visual Arts		
ELECTIVE COURSES			FAG1020 - Basic Contemporary Dance		50
			FAG1021 - Introduction to Malaysian Arts Performance		
			FAG1016 - Introduction to Finance		
			FAG1018 - Mass Media and Communication		
			FAG1019 - Legal Skills	4	
			FAG1022 - Basic Music Practice	4	
			FAG1023 - Basic Malay Dance (Choose only two elective courses)		
	Total credit hours	25		25	

FOUNDATION IN ISLAMIC STUDIES & SCIENCES

LIFE SCIENCES

Component	SEMESTER 1		SEMESTER 2		Total Credit hours
	Subjects	Credit	Subjects	Credit	
UNIVERSITY COURSES	FAX1001 - Self Development FAX1005 - English for Foundation Studies	1 4	FAX1001 - Self Development	1	57
CORE COURSES PROGRAM	FAD1001 - Biology 1 FAD1002 - Biology 2 FAD1016 - Basic Chemistry 1 FAD1017 - Practical Chemistry 1 FAD1013 - Mathematics I	3 3 4 2 4	FAD1003 - Biology 3 FAD1004 - Biology 4 FAD1018 - Basic Chemistry 2 FAD1019 - Practical Chemistry 2 FAD1014 - Mathematics II FAD1015 - Mathematics III	3 3 4 2 3 3	
ISLAMIC STUDIES CORE SOURCE	IAC1001 - Qawa'id Arabiyyah 1 IAC1005 - Al-Madkhal Ila al-Aqidah Al-Islamiyyah IAC1009 - Fiqh Al-Sirah IAC1013 - Al -Kitabah	2 2 2 2	IAC1002 - Qawa'id Arabiyyah 2 IAC1008 - Usul al-Syariah IAC1015 - Al- Madkhal Ila Ulum Al-Quran Wa Al-Sunnah IAC1017 - AL-Qiraah	2 2 2 3 2	
	Total credit hours	29	Total credit hours	28	

PHYSICAL SCIENCE

Component	SEMESTER 1		SEMESTER 2		Total Credit hours
	Subjects	Credit	Subjects	Credit	
UNIVERSITY COURSES	FAX1001 - Self Development FAX1005 - English for Foundation Studies	1 4	FAX1001 - Self Development	1	57
SCIENCE CORE STUDY COURSES	FAD1020 - Basic Physics 1 FAD1021 - Practical Physics 1 FAC1001 - Advanced Mathematics I FAD1013 - Mathematics 1 FAC1002 - Programming 1	4 2 3 4 3	FAD1022 - Basic Physics 2 FAD1023 - Practical Physics 2 FAD1014 - Mathematics II FAD1015 - Mathematics III FAC1003 - Programming II FAC1004 - Advanced Mathematics II	4 2 3 3 3 3	
ISLAMIC STUDIES CORE SOURCE	IAC1001 - Qawa'id Arabiyyah 1 IAC1005 - Introduction To Islamic Creed IAC1009 - Wisdom of History IAC1013 - Al -Kitabah	2 2 2 2	IAC1002 - Qawa'id Arabiyyah 2 IAC1008 - Usul al-Syariah IAC1015 - Al -Madkhal Ila Al-Aqidah Al-Sunnah IAC1017 - AL-Qiraah	2 2 3 2	
	Total credit hours	29	Total credit hours	28	

COURSE SYNOPSIS

FOUNDATION STUDIES IN LIFE SCIENCES & FOUNDATION STUDIES IN PHYSICAL SCIENCES

FAX1001 - SELF DEVELOPMENT STUDIES (2 credit hours)

1. Empowering study skills will focus on the following aspects:
 - I. Critical & Creative thinking skills
 - II. Study groups & teamwork
 - III. Time management & Self- management
2. Motivational aspects that concern
 - I. Positive personal attributes
 - II. Attitude to help others
 - III. Attitude willing to change
 - IV. How to judge self- weakness and strength in oneself
 - V. How to create a positive self-image
 - VI. How to face the challenges of identity in cyberspace or the ICT era
3. Coping with stress and stress management with reference to adolescent and student life. Causes of stress, symptoms of stress, and tips on managing stress successfully.
4. Reveal the characteristics of effective communication to students.
5. Enhancing knowledge of Malaysian statehood, as well as rights, roles, and responsibilities as citizens of Malaysia.

At the end of the course, the students are able to:

1. Explain the sense of their identity (Jati diri).
2. Demonstrate a positive attitude, behavior, and leadership value.
3. Communicate ideas clearly and effectively to the parties concerned.

Main Reference Book:

1. Zainol Abidin Kasim (Third Edition, 2020), Jati diri: Pembinaan dan Pemantapan, Penerbit Universiti Malaya, Kuala Lumpur

Assessment Methods: Assignment 1- 35%, Video Presentation - 15%;
Practical Assessment - 35%, Online Quiz - 15%

Medium of Instruction: Malay/English

FAX1002 - INFORMATION TECHNOLOGY (1 credit hour)

This course introduces the Microsoft 365 tools where students will use this throughout their learning in PASUM. In addition, basic of ICT and programming are involved in this course. The basic ICT topics covered are Information Technology Literacy, Information System, Social Informatics, Network Computing, IoT, Machine Learning and Virtual/Augmented Reality. Meanwhile, the basic programming topics are Theoretical Programming, Propositional Logic, Microsoft Excel and Numerical Programming.

At the end of the course, students are able to:

1. Apply suitable ICT tools to solve ICT related problems.
2. Giving presentation clearly and compact.

Main Reference Books

1. Oxford Information Technology for CSEC: Third edition Paperback (2019) by Glenda Gay & Ronald Blades.
2. Office 365 All-in-One for Dummies (For Dummies (Computer/Tech)) 1st Edition (2019)

3. Computer Programming for Absolute Beginners: Learn essential computer science concepts and coding techniques to kick-start your programming career Paperback - July 31, 2020, by Joakim Wassberg.
4. Related Website

Assessment Methods: Assignment 1 - 35%, Presentation 1 - 15%;
Assignment 2 - 35%, Presentation 2 - 15%

Medium of Instruction: English

FAX1005 - ENGLISH FOR FOUNDATION STUDIES (4 credit hours)

This course serves as an introductory platform aimed at enhancing students' English language proficiency for academic purposes, with a particular focus on preparation for the Malaysian University English Test (MUET) at the university level. Throughout the course, students will be systematically exposed to various aspects of the English language, aligned with the standards set by the Common European Framework of Reference for Languages (CEFR).

The syllabus is designed to strengthen students' competencies in the four core language skills: listening, speaking, reading, and writing. Listening skills will be developed through exposure to a variety of audio texts, while speaking abilities will be enhanced through diverse communicative practice activities. In addition, students will engage with a range of reading materials and receive guided instruction to improve their writing skills in academic contexts.

At the end of the course, students will be able to:

1. Derive relevant information through effective listening skills.
2. Communicate ideas clearly and effectively through both speaking and writing.
3. Analyse information from academic texts using appropriate reading strategies.
4. Apply effective writing techniques in essay composition and in translating information from various sources.

Main Reference Book

1. Choo Wan Yat, Yeoh Wei Tzee, Yee Sook Fen.

ACE MUET - A Coursebook for the Malaysian University English Test: Based on the Latest CEFR-Aligned Test Specification. Penerbit Ehsan, 2022.

Assessment Methods: Continuous Assessment - 50%, Final Examination - 50%

Medium of Instruction: English

FAX1006 - BASIC COMMUNICATION SKILLS (2 credit hours)

This course is designed to sharpen students' knowledge in basic communication skills which focuses on initial interview techniques and academic presentation. Students will participate in continuous reading through study activities in preparation for the speech outline. This extensive reading will promote basic literacy skills as a preparation for their presentation. Students will be exposed to various basic interview techniques to aid them to articulate their abilities and knowledge in different interview situations. It will assist them to be more selective in applying appropriate techniques of interview skills. Extensive reading will be carried out in academic studies as a preparation for presentation.

At the end of the course, the students are able to:

1. Present using the presentation skills they have learned
2. Gather sources of information from reliable and trustworthy materials guidelines for an intended purpose.
3. Equip students with the appropriate communication and interview skills

Main Reference Books

1. Latisha Asmaak Shafie, Nor Alifah Rosaidi, English for Oral Presentations. Oxford University Press. 2017
2. Steven Gershon, Present Yourself 2. Cambridge. 2015
3. Stephen, E. Lucas. The Art of Public Speaking

Assessment Methods: Continuous Assessment: 50%, Final Examination: 50%
Medium of Instruction: English

FAD1001 - BIOLOGY 1 (3 credit hours)

This course consists of the following topics:

Chemistry of Life:

Inorganic compounds: water, acids, bases and mineral salts. Organic compounds: carbohydrates, lipids, phospholipids, protein, nucleic acids and vitamins.

Cell Structure and Function:

Prokaryotes and eukaryotes, microscopy, technique for the study of cell, structure, function and distribution of organelles in animal and plant cell, application of cell structure and function, cell membrane (Davson-Danielli and Fluid Mosaic Model by Singer), transport across membrane and application of transport across membrane.

Enzymes, Cellular Respiration and Photosynthesis:

Mechanism of enzyme action, activation energy, factors affecting enzyme activity. Enzyme cofactors, inhibitors. Enzyme classification and application of enzyme concept. Aerobic and anaerobic respiration. Photosynthesis - organelle and chemical processes.

Cell Cycle and Cell Division:

Cell cycle, mitosis and meiosis, comparison between mitosis and meiosis, nondisjunction of chromosome (aneuploidy and euploidy).

At the end of the course, the students are able to:

1. Understand the basic concepts and principles of biology.
2. Apply the concepts and principles in biology to solve biological problems.
3. Conduct biological experiments in biology related topics using appropriate scientific methods.
4. Ability to understand the guidelines and ethics in handling samples and biology equipment.

Main Reference Books:

1. Campbell Biology, 12th Edition (2020). Lisa A. Urry, Michael L. Cain, Steven A. Wasserman, Peter V. Minorsky, Rebecca Orr. Pearson.
2. Biology 11th Edition (2019). Eldra P. Solomon, Charles E. Martin, Diana W. Martin, Linda R. Berg. CENGAGE.
3. Pre-University Biology (2025) Nor Azlina A. A., Noor Hashida H., Mahanom J., Maslenda M., Haliza H. & Nazira Z. SAP Publication.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%
Medium of Instruction: English

FAD1002 - BIOLOGY 2 (3 credit hours)

This course consists of the following topics:

Genetic inheritance:

Mendelian genetics - monohybrid and dihybrid inheritance. Mendel's Laws. Deviation from Mendelian genetics. Gene, alleles and chromosomes. Gene linkage.

DNA and Protein Synthesis:

DNA as genetic material, structure and function of DNA and RNA. Replication, transcription and protein synthesis (translation).

Mutation and Human Genetics:

Types of mutation, mutation agent. Autosomal recessive, dominant and sex-linked inheritance. Syndrome due to mutation. Pedigree analysis. Genetic counselling and screening.

Genetic Engineering:

DNA recombinant technology, endonuclease enzyme, DNA ligase, cloning vector. Genome and gene library. Application in medicine and agriculture.

At the end of the course, the students are able to:

1. Explain the basic concepts and principles of biology.
2. Apply the basic concepts and principles in biology to solve biological problems.
3. Demonstrate skill to relate scientific information gathered in solving problems related to biological concepts and principles.
4. Ability to practice positive attitude and integrity towards research.

Main Reference Books:

1. Campbell Biology, 12th Edition (2020). Lisa A. Urry, Michael L. Cain, Steven A. Wasserman, Peter V. Minorsky, Rebecca Orr. Pearson.
2. Biology 11th Edition (2019). Eldra P. Solomon, Charles E. Martin, Diana W. Martin, Linda R. Berg. CENGAGE.
3. Pre-University Biology (2025) Nor Azlina A. A., Noor Hashida H., Mahanom J., Maslenda M., Haliza H. & Nazira Z. SAP Publication.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAD1003 - BIOLOGY 3 (3 credit hours)

This course consists of the following topics:

Population genetics:

Population genetics - gene pool, Hardy-Weinberg Laws and equation.

Plant diversity:

Taxonomy, virus and bacteria, fungi, algae, bryophyte, pteridophyte, gymnosperm and angiosperm. Plant reproduction and growth.

Animal Diversity:

Classification, characteristics of protozoa, porifera, cnidaria, nematoda, annelida, platyhelminthes, arthropoda, mollusca, echinodermata and chordata.

Histology:

Cell specialisation, classification, structure and function of plant and animal tissues.

Autotrophic and Heterotrophic Nutrition:

Autotrophic and heterotrophic nutrition, autotrophic and chemosynthetic bacteria, human digestive system.

At the end of the course, the students are able to:

1. Explain the basic concepts and principles of biology.
2. Apply the basic concepts and principles in biology to solve biological problems.
3. Demonstrate skill to relate scientific information gathered in solving problems related to biological concepts and principles.
4. Ability to practice positive attitude and integrity towards research

Main Reference Books:

1. Campbell Biology, 12th Edition (2020). Lisa A. Urry, Michael L. Cain, Steven A. Wasserman, Peter V. Minorsky, Rebecca Orr. Pearson.
2. Biology 11th Edition (2019). Eldra P. Solomon, Charles E. Martin, Diana W. Martin, Linda R. Berg. CENGAGE
3. Pre-University Biology (2025) Nor Azlina A. A., Noor Hashida H., Mahanom J., Maslenda M., Haliza H. & Nazira Z. SAP Publication.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAD1004 - BIOLOGY 4 (3 credit hours)

This course consists of the following topics:

Animal Respiration and Circulation System:

Respiration surface, adaptation and organ. Human respiration mechanism. Human circulation system. Lymphatic system.

Homeostasis and Resistance to Diseases:

Control of body sugar level and temperature. Excretion and osmoregulation. Resistance mechanism, human blood group, antibody and antigen.

Response and Communication:

Nervous system organisation. Effector (skeletal muscle). Stimulation receptors. Endocrine system - hormones.

Animal Reproduction and Development:

Structure and function of human reproductive system, hormone regulation, gametogenesis, fertilisation, embryonic development, pregnancy, delivery and lactation.

Ecology:

Basic principles of ecology, energy flow, food web, interaction between organisms, biogeochemical cycles, succession and pollution.

At the end of the course, the students are able to:

1. Understand the basic concepts and principles of biology.
2. Apply the concepts and principles in biology to solve biological problems.
3. Conduct biological experiments in biology related topics using appropriate scientific methods.
4. Ability to understand the guidelines and ethics in handling samples and biology equipment

Main Reference Books:

1. Campbell Biology, 12th Edition (2020). Lisa A. Urry, Michael L. Cain, Steven A. Wasserman, Peter V. Minorsky, Rebecca Orr. Pearson.
2. Biology 11th Edition (2019). Eldra P. Solomon, Charles E. Martin, Diana W. Martin, Linda R. Berg. CENGAGE
3. Pre-University Biology (2025) Nor Azlina A. A., Noor Hashida H., Mahanom J., Maslenda M., Haliza H. & Nazira Z. SAP Publication.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAD1016 - BASIC CHEMISTRY 1(4 credit hours)

This course consists of the following topics:

General Chemistry:

Matter, phases of matter, behavior and phase change processes, proton, electron and neutron, isotope and isotopic abundance, mass spectrometer, mass spectrum, average atomic mass, IUPAC nomenclature of ions and salts, mole, Avogadro constant, molar volume, concentration of a solution, mole fraction, oxidation number, chemical equation including redox equations, empirical and molecular formulae, stoichiometry

Atomic Structure:

Bohr's atomic model, line spectrum of hydrogen atom, Rydberg equation, de Broglie's postulate, Heisenberg's uncertainty principle, four quantum numbers, shapes of s, p and d orbitals, electron configuration of an atom, Aufbau Principle, Pauli exclusion principle, Hund's rule & diagonal rule, orbital box diagram, anomalous electron configuration of chromium & copper.

State of Matters:

Boyle's law, Charles's law & ideal gas equation, Dalton's law of Partial Pressure, kinetic molecular theory of gases, Maxwell-Boltzman distribution, ideal and non-ideal behaviours of gases, van der

Waals equation, effusion and diffusion of gases, Graham's Law, rate of effusion, vapour pressure and boiling point.

Periodic Table:

Arrangement of elements, electronic configuration, locations of representative/main-group elements, transition and inner-transition elements, group and period of elements, chemical groups, metallic and non-metallic behaviour of an element, atomic and ionic radius, ionization energy, electron affinity, electronegativity, melting point & boiling point in terms of structure and bonding, melting and boiling points across period 2 and 3, group 1 and 17, oxides of Period 3 elements.

Chemical Bonding:

Types of stability for the atoms and ions, Lewis symbols, octet rule, Lewis diagrams, formal charges, ionic bonding, covalent bonding, exceptions from Octet Rule, co-ordinate (dative covalent) bonding, resonance structures, VSEPR theory, orbital overlap, hybridization, bond polarity and dipole moments, intermolecular forces, hydrogen bonding.

Introduction to organic compound:

Saturated and unsaturated organic compounds, molecular formula, structural formula, functional group, homologous series, classification, naming (IUPAC rule), structural/constitutional isomerism, stereoisomerism, chiral centre, homolytic and heterolytic cleavage of covalent bonds, primary, secondary and tertiary free radical, carbocation, carbanion and inductive effect, electrophile, nucleophile, organic reactions.

Introduction to hydrocarbon:

Alkanes - general formula, naming (IUPAC rules), physical properties, natural sources, combustion in excess and limited oxygen, unreactivity, halogenation reaction, free radical substitution. Alkenes - general formula, functional group, naming, physical properties, preparation, mechanisms of dehydration of alcohols and dehydrohalogenation of haloalkanes, Saytzeff's rule, addition reaction, Markonikov's rule, anti-Markonikov's rule, unsaturation tests, oxidation reaction.

Introduction to Aromatic Compounds:

Kekule structure and resonance structure, structures and nomenclature of benzene and its derivatives, electrophilic aromatic substitution reaction of benzene, ortho-para and meta directing substituents, reactions of benzene derivatives, usage of aromatic compounds including the carcinogenic effects.

At the end of the course, students are able to:

1. Describe the basic concepts of chemistry in the subject of atomic structure, general chemistry, state of matters, periodic table, chemical bonding, introduction of organic compound, hydrocarbon and aromatic compound.
2. Apply the basic principles of chemistry in the subject of atomic structure, general chemistry, state of matters, periodic table, chemical bonding, introduction of organic compound, hydrocarbon and aromatic compound.
3. Demonstrate the basic principles of chemistry in the subject of atomic structure, general chemistry, state of matters, periodic table, chemical bonding, introduction of organic compound, hydrocarbon and aromatic compound.

Main Reference Books:

1. Pre-University Chemistry, Norbani et.al, SAP Education (2021)
2. ISE Chemistry 13th Edition, Raymond Chang, 8th Edition, Mc Graw Hill (2018)
3. Chemistry A Molecular Approach, 5th Edition, Nivaldo J. Tro, Pearson (2020)
4. Organic Chemistry, Wade, 9th Edition, Pearson (2017)
5. Organic Chemistry 9th Edition McMurry Solution Manual, (2017)
6. Chemistry (3): Introducing inorganic, organic and physical chemistry, Andrew Burrows et.al.Oxford University Press (2021)

Assessment Methods: Continuous Assessment 50 %, Final Examination 50%

Medium of Instruction: English

FAD1017 PRACTICAL CHEMISTRY 1(2 credit hours)

The topics of laboratory experiments are: Introduction to experimental laboratory and usage of laboratory equipment, general chemistry, state of matters, periodic table, chemical bonding and hydrocarbon.

At the end of the course, students must be able to:

1. Perform practical work according to the correct method.
2. Analyse basic chemistry principles of general chemistry, periodic table, state of matters, chemical bonding and hydrocarbon.
3. Demonstrate practical work individually or in groups.

Main Reference Books:

1. Chemistry Laboratory Manual, Semester 2, 2022/2023
2. Pre-University Chemistry, Norbani et.al, SAP Education (2021)
3. ISE Chemistry 13th Edition, Raymond Chang, 8th Edition, Mc Graw Hill (2018)
4. Chemistry A Molecular Approach, 5th Edition, Nivaldo J. Tro, Pearson (2020)
5. Organic Chemistry, Wade, 9th Edition, Pearson (2017)
6. Organic Chemistry 9th Edition McMurry Solution Manual, (2017)
7. Chemistry (3): Introducing inorganic, organic and physical chemistry, Andrew Burrows et.al., Oxford University Press (2021)

Assessment Methods: Continuous Assessment: 100 %

Medium of Instruction: English

FAD1018 - BASIC CHEMISTRY 2 (4 credit hours)

This course consists of the following topics:

Chemical Equilibrium:

Reversible reaction, dynamic equilibrium/chemical equilibrium, concepts/characteristics of dynamic equilibrium/chemical equilibrium, equilibrium law, equilibrium constant (K_c & K_p), homogeneous and heterogeneous reactions, degree of dissociation, relationship between K_c and K_p , reaction quotient expression, Le Chatelier's principle, factors affecting position and equilibrium constant, addition of inert gas and catalyst on chemical equilibrium, importance of chemical equilibrium in the chemical industry.

Ionic Equilibrium:

Arrhenius, Lewis and Bronsted-Lowry, conjugate acid and base, strong acid and base, weak acid and base, pH and pOH, ionic product of water, dissociation constant, degree of dissociation, salt hydrolysis, classification of salts, buffer solution, Henderson-Hasselbach equation, titration, end-point, equivalence point, indicators.

Solubility Product:

Saturated solution, soluble and insoluble compounds, solubility equilibrium equation, solubility and molar solubility, solubility product, solubility product expression (K_{sp}), solubility product constant, solubility quotient expression, separation of ions by fractional precipitation, common ion effect, Le Chatelier's principle

Phase Equilibrium:

Phase and component, colligative properties, triple point and critical point, phase diagrams of H_2O and CO_2 , ideal and non-ideal solutions for two components system, Raoult's law, azeotrope, ideal and deviations from Raoult's law, fractional distillation

Thermochemistry:

Endothermic and exothermic reactions, standard conditions and standard enthalpy of reaction, enthalpy of formation, combustion, atomisation, sublimation, neutralisation, hydration, and solution, Hess' law, enthalpy changes, lattice energy, hydration process of ionic solids, Born-Haber cycle.

Electrochemistry:

Oxidation and reduction reaction, Galvanic Cell, half-cell and overall reaction equation, cell notation, standard electrode and standard cell potential, standard hydrogen electrode, oxidising

agents, reducing agents, spontaneity of a redox reaction, Nernst equation, electrolytic cell, electrolysis, Faraday's first law of electrolysis.

Kinetic Chemistry:

Reaction rate, differential rate equation, rate law, order of reaction and half-life, integrated rate equation, order of reaction, differential & integrated rate equations, effective collision, activation energy, characteristics of an activated complex, factors affecting reaction rate, Arrhenius equation.

Stereochemistry:

3D image and Fischer projection, optically-active compound, levorotatory or dextrorotatory, racemic mixture, stereoisomers with more than one stereogenic centre.

Alcohols & Phenols:

Alcohol- Structural and optical isomerism, physical properties, classification, preparation, chemical properties and uses of alcohols. Relative acidity of water, phenol and alcohol. Phenol - preparation, chemical properties and use of phenol.

Carbonyl Compounds (Aldehyde & Ketone):

General formula, IUPAC nomenclature, preparation and chemical properties, natural compounds with -C=O group, characteristics of glucose as a reducing sugar, D and L stereoisomers of sugars

Carboxylic Acid & its Derivatives:

Physical properties, preparation, chemical properties of carboxylic acid & its derivatives

Amine & Amino Acids:

Amine- Classification, IUPAC nomenclatures, physical properties, preparation (Hoffmann's degradation) and chemical properties of amines. Amino acids- general structure, 20 standard amino acids, naming (IUPAC rule), zwitterion, isoelectric point, reactions of amino acids, peptide, structure of protein and importance of amino acids and protein.

Polymer:

Terminologies, condensation, addition polymerization, classification and usage of polymer.

At the end of the course, students are able to:

1. Describe the basic concepts of chemistry in the subject of chemical equilibrium, ionic equilibrium, solubility product, phase equilibrium, thermochemistry, electrochemistry, kinetic chemistry, stereochemistry, alcohol & phenol, ketone & aldehyde, carboxylic acid and its derivatives, amine & amino acid and polymer.
2. Apply the basic principles of chemistry in the subject of chemical equilibrium, ionic equilibrium, solubility product, phase equilibrium, thermochemistry, electrochemistry, kinetic chemistry, stereochemistry, alcohol & phenol, ketone & aldehyde, carboxylic acid and its derivatives, amine & amino acid and polymer in solving chemistry problem.
3. Demonstrate the basic principles of chemistry in the subject of chemical equilibrium, ionic equilibrium, solubility product, phase equilibrium, thermochemistry, electrochemistry, kinetic chemistry, stereochemistry, alcohol & phenol, ketone & aldehyde, carboxylic acid and its derivatives, amine & amino acid and polymer in solving chemistry problem.

Main Reference Book:

Pre-University Chemistry, Norbani et.al, SAP Education (2021)

1. ISE Chemistry 13th Edition, Raymond Chang, 8th Edition, Mc Graw Hill (2018)
2. Chemistry A Molecular Approach, 5th Edition, Nivaldo J. Tro, Pearson (2020)
3. Organic Chemistry, Wade, 9th Edition, Pearson (2017)
4. Organic Chemistry 9th Edition McMurry Solution Manual, (2017)
5. Chemistry (3): Introducing inorganic, organic and physical chemistry, Andrew Burrows et.al., Oxford University Press (2021)

Assessment Methods: Continuous Assessment: 50 %, Final Examination 50%

Medium of Instruction: English

FAD1019 - PRACTICAL CHEMISTRY 2 (2 credit hours)

The topics of laboratory experiments are: chemical equilibrium, ionic equilibrium, thermochemistry, kinetic chemistry, stereoisomerism, alcohol & phenol, aldehyde & ketone.

At the end of the course, students must be able to:

1. Perform practical work according to the correct method.
2. Analyse basic chemistry principles of chemical equilibrium, ionic equilibrium, thermochemistry, kinetic chemistry, stereoisomerism and organic compounds.
3. Demonstrate practical work individually or in groups.

Main Reference Books:

1. Chemistry Laboratory Manual, Semester 2, 2022/2023
2. Pre-University Chemistry, Norbani et.al, SAP Education (2021)
3. ISE Chemistry 13th Edition, Raymond Chang, 8th Edition, Mc Graw Hill (2018)
4. Chemistry A Molecular Approach, 5th Edition, Nivaldo J. Tro, Pearson (2020)
5. Organic Chemistry, Wade, 9th Edition, Pearson (2017)
6. Organic Chemistry 9th Edition McMurry Solution Manual, (2017)
7. Chemistry (3): Introducing inorganic, organic and physical chemistry, Andrew Burrows et.al., Oxford University Press (2021)

Assessment Methods: Continuous Assessment: 100%

Medium of Instruction: English

FAD1020 - BASIC PHYSICS 1(4 credit hours)**Kinematics**

Projectile motion; Newton's Law of Motion; Frictions; Work and energy.

Circular Motion

Centripetal acceleration and force; Center of mass and gravity; Torque; Equilibrium of rigid bodies; Moment of inertia; Rotational kinetic energy; Angular momentum and conservation of angular momentum.

Basic Materials Science

Intermolecular forces; Stress and strain; Young's modulus; Shear modulus and Bulk modulus; Materials structure; Materials classification; Properties of materials

Fluids

Archimedes' principle; Continuity equation; Bernoulli's principle; Viscosity

Simple harmonic motion

Kinematics of SHM and energy in SHM; Damped and forced oscillations; Resonance

Waves

Characteristics and types of waves; Resultant and superposition of waves; Huygens principle; Interference; Stationary wave

Physical Optics

Diffraction; Interference; Young's double slit experiment; Newton's ring; Thin film; Polarization

Sound wave

Intensity and sound level; Interference; Beat; Resonance; Doppler's Effect

Heat

Conduction, convection, and radiation; Linear, surface and volume expansions

Thermodynamics

Boyle's, Charles's, and Gay-Lussac laws; Kinetic theory of gases; Energy and work; Zeroth law and First law of thermodynamics; Isobaric, isovolumetric, isothermal, and adiabatic processes; Second law of thermodynamic; Entropy; Carnot engine

At the end of the course, the students must be able to:

1. Understand the basic concept of physics in the topic of mechanics, basic materials science, fluids, simple harmonic motion, waves, physical optics, heat, and thermodynamics.
2. Apply basic principles of physics to solve problems in the topic of mechanics, basic materials science, fluids, simple harmonic motion, waves, physical optics, heat, and thermodynamics

3. Analyze the principle of physics to solve problems in the topic of mechanics, basic material science, fluids, simple harmonic motion, waves, physical optics, heat and thermodynamics.
4. Actively responds directly or indirectly towards learning.

Main reference physics:

1. Pre University Physics (2021), Izlina Supa'at et. al, SAP Malaysia
2. College Physics Global Edition (11th), Serway Vuille, Brooks/Cole (GB)

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAD1021 - PRACTICAL PHYSICS 1 (2 credit hours)

Laboratory experiments and experimental simulations under the topic of linear and rotational motion, materials science, fluids, simple harmonic motion, waves, physical optics, heat and thermodynamics

At the end of the course, the students must be able to:

1. Apply the basic principles of physics in experiments and experimental simulations done under the topic of linear and rotational motion, materials science, fluids, simple harmonic motion, waves, physical optics, heat, and thermodynamics
2. Analyze data using the basic principle of physics in experiments done under the topic of linear and rotational motion, materials science, fluids, simple harmonic motion, waves, physical optics, heat, and thermodynamics.
3. Execute the features and functions of physics simulations to achieve experimental objectives

Main Reference Books:

1. Pre University Physics (2021), Izlina Supa'at et. al, SAP Malaysia
2. College Physics Global Edition (11th), Serway Vuille, Brooks/Cole (GB)

Assessment Methods: Continuous Assessment 100%

Medium of Instruction: English

FAD1022 - BASIC PHYSICS 2 (4 credit hours)

Electrostatic

Charge and Coulomb's law; Electric field and electric flux; Gauss's law; Electric potential energy and electric potential; Capacitor and dielectric; Combination of capacitors; Charging and discharging of capacitors

Direct current

Kirchoff's Rules and Electrical measurement.

Alternating current

Current and voltage; Phasor diagram, phase difference; resistance, reactance, and impedance; RL, RC and RLC circuits; Power and energy; Resonance

Magnetism

Magnetic field and magnetic force; Ampere's law; Force between two current carrying conductors; Torque; Charge in magnetic field and electric field

Electromagnetism

Magnetic flux; Faraday's law; Lenz law; Induced emf in a conductor; Self-inductance; Energy stored in an inductor; Mutual inductance

Electronics

Semiconductor, Diode, Capacitor, Transistor and Operational Amplifiers.

Quantum Physics

Atomic Physics, Nuclear Physics, Radioactivity, and wave-particle duality.

At the end of the course, the students must be able to:

1. Understand the basic concept of physics in the topic of electrostatic, electricity, magnetism, electromagnetism, electronics, and quantum physics
2. Apply basic principles of physics to solve problems in the topic of electrostatic, electricity, magnetism, electromagnetism, electronics, and quantum physics.
3. Analyze the principle of physics to solve problems in the topic of electrostatic, electricity, magnetism, electromagnetism, electronics, and quantum physics
4. Actively responds directly or indirectly towards learning.

Main Reference Books:

1. Pre University Physics (2021), Izlina Supa'at et. al, SAP Malaysia
2. College Physics Global Edition (11th), Serway Vuille, Brooks/Cole (GB)

Assessment Methods: Continuous Assessment: 50%, Final Examination: 50%

Medium of Instruction: English

FAD1023 - PRACTICAL PHYSICS 2(2 credit hours)

Laboratory experiments and experimental simulations under the topic of electrostatics, electricity, magnetism, electromagnetism, electronics, and quantum physics.

At the end of the course, the students must be able to:

1. Apply the basic principles of physics to solve problems in the topic of electrostatics, electricity, magnetism, electromagnetism, electronics, and quantum physics.
2. Analyze data using the basic principle of physics in the topic of electrostatics, electricity, magnetism, electromagnetism, electronics, and quantum physics.
3. Execute the features and functions of physics simulations to achieve experimental objectives.

Main Reference Books:

1. Pre University Physics (2021), Izlina Supa'at et. al, SAP Malaysia
2. College Physics Global Edition (11th), Serway Vuille, Brooks/Cole (GB)

Assessment Methods: Continuous Assessment 100%

Medium of Instruction: English

FAD1013 MATHEMATICS I (4 credit hours)

Algebra

Real numbers: The real number system, introduction to notations of sets of real numbers. The real number line. Algebraic operations on real numbers. Properties of real numbers.

Complex numbers: Algebraic operations on complex numbers. Conjugate. Argand diagram. Euler and De Moivre's theorems. Roots of a complex number.

Exponents, radicals and logarithms: Exponential notations, laws of exponents. Simplifying expressions. Rational exponents. Laws of radicals. Simplifying radical expressions. Solutions to exponential, radical and logarithmic equations.

Systems of equations in two variables: Revision of quadratic equations. Systems of linear equations. Systems involving linear and quadratic equations.

Inequalities: Basic concepts on inequalities. Inequalities in one variable; linear and quadratic. Rational inequalities, inequalities involving modulus. Solving by graphical method.

Polynomials; long division, synthetic division. Remainder theorem and factor theorem. Express polynomials in linear factors.

Partial fractions.

Vector algebra.

Trigonometry

Angles, Trigonometric Functions and Graphs. Trigonometric Values for Special Angles. Application of Trigonometric Problems. Trigonometric Identities and Proof. Trigonometric Equation & the addition and subtraction formulas. Multiple angles formula. Product to sum formula and sum-to-product formula.

Calculus

Basic Functions, Domains and Graphs: Linear, Quadratic, Cubic, Rational Logarithm, Exponential, Radical, Piecewise and Modulus Functions. Limit of a function intuitively. Limit theorems. Limit computational techniques. One-sided limits. Continuous at a point. Limit to infinity. Asymptote lines. Definition and geometric interpretation of differentiation. Differentiation from first principles. Differentiation of standard functions. Differentiation of trigonometric functions. Differentiation of logarithmic and exponential functions. Rules of differentiation. Chain rule and Power Rule. Differentiation of implicit functions and parametric equations. Logarithmic differentiations. Application of differentiations: gradient of any curve, equation of tangent and normal to any curve (curve including circle, parabola, hyperbola and ellipse).

Higher order differentiation. Increasing and decreasing functions. Critical/Stationary points. Local extremum. Absolute extremum. Concavity and Inflection point. Graph sketching. Optimization problems.

At the end of the course, students are able to:

1. Describe relevant concepts, terminology, and notation in algebra, vector, function, differentiation, inequalities and complex numbers.
2. Use appropriate combinations of techniques to solve problems in algebra, vector, function, differentiation, inequalities and complex numbers.
3. Present written and verbal work/solution with avid interest and able to give opinion on the topic at hand.

Main Reference Books:

1. Shariff, F. A. Manaf & I. Mohamed. (2020). College Mathematics, IPTA Publisher.
2. A.H. Yaakub et. al. (2019). Mathematics for matriculation: Semester 2, Fifth Edition Updated. Oxford Fajar.
3. Ong Beng Sim et al. (2018). Mathematics for Matriculation Semester 1, Fifth Edition, Oxford Fajar.
4. Ong Beng Sim et al. (2018). Mathematics for Matriculation Semester 2, Fifth Edition, Oxford Fajar.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAD1014 MATHEMATICS II (3 credit hours)**Calculus**

Anti-derivative and standard results, definite integrals.

Techniques of integrations: integration using partial fractions, integration by substitution, integration by parts.

Integration of trigonometric functions.

Integration involving quadratic functions by using the trigonometric substitution.

Application of integrations: area between two curves and volume of revolution.

First order differential equations.

Algebra

Sequences: convergent and divergent sequence, the summation ($\sum$) notation.

Arithmetic series: arithmetic sequence, summation of finite arithmetic series.

Geometric series: geometric sequence, summation of a finite geometric series, summation of the infinite geometric series. Summation of a finite series: summation of $\sum i^k, k=1,2,3$, method of difference.

The binomial expansion: factorial, the binomial theorem for a positive integral index, the binomial theorem for any rational index.

Power series: Maclaurin and Taylor series for various functions, application of Maclaurin and Taylor series.

Geometry:

Revisions on distance, gradients, straight lines. Angle between two lines. Perpendicular distance from a point to a line. Curves: parabolas, circles, ellipses and hyperbolas. Their definitions, equations, sketching their respective graphs.

At the end of the course, the students are able to:

1. Describe relevant concepts, terminology, and notation related to integration, differential equations, series and geometry.
2. Use appropriate combinations of techniques to solve problems related to integration, differential equations, series and geometry.
3. Present work/solution digitally, showing avid interest and able to give opinion on the topic assigned.

Main Reference Books:

1. Shariff, A. A., Manaf F. A., Mohamed, I. & Kasmani, R. (2022). Pre-University Mathematics Latest Syllabus, SAP Publication.
2. Yaakub, A. H., Sim, O. B., Zubairi, Y. Z., Eng, T. C., et.al. (2019). Mathematics for Matriculation Semester 2 Fifth Edition Updated, Oxford Fajar.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAD1015 MATHEMATICS III (3 credit hours)

Permutation and combination. Definition and rules of probability, conditional probability, independent events. Random variables, probability distributions of discrete and continuous random variables, expected values, variance and standard deviation. The uniform, binomial, Poisson and normal distributions. Poisson and normal approximation to the binomial distribution.

Confidence Interval.

Hypothesis testing.

One Sample Test.

Matrices: algebra operations on matrices, using matrices to solve systems of linear equations, elementary row operations.

Introduction to R, Exploring Mathematical Concepts Using R.

At the end of the course, the students are able to:

1. Describe relevant concepts, terminology, and notation related to matrices and statistics.
2. Use appropriate combinations of techniques to solve problems in matrices and statistics.
3. Use statistical software for data processing and evaluate results from the activity.

Main Reference Books:

1. Shariff A. A., Manaf F. A. & Mohamed I. (2020). College Mathematics, IPTA Publisher.
2. Levine, D. M. (2017). Statistics for managers using Microsoft Excel. Pearson.

- Braun, W. J., & Murdoch, D. J. (2021). A first course in statistical programming with R. Cambridge University Press.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAC1001 ADVANCED MATHEMATICS I (3 credit hours)

Vector Geometry:

Vector quantity. Properties of vectors. Representation of vectors. Position vector. Resultant vector. Relative Position and Velocity.

Example: Directed line segment for scalar multiplication, addition & subtraction of vectors. Negative vector, parallel vector, free vector. Triangle law, parallelogram & polygon. Vectors in geometry (proving the geometrical properties and ratio theorem). Vectors in velocity problems (resultant & relative velocity).

Algebraic & Cartesian Vector (Vector in 3-dimensional):

Magnitude and the distance between two points. Vector components. Unit vector. Direction ratio and direction cosines.

Algebraic operations of vectors: The laws of vector algebra. Operation of addition, subtraction and scalar multiplication. Scalar & vector product.

Applications of scalar & vector product: Angle between two vectors. Scalar and vector projections. Area of triangle and parallelogram. Volume of parallelepiped.

Lines and planes: Equations in vector, cartesian & parametric representations. Intersections of lines, planes and line-plane. Angles between lines, planes and line-plane. Distances between lines, planes and line-plane.

Vector calculus

Vector-valued functions: Two-dimensional and three-dimensional of parametric expressions in vector form, $\mathbf{r}(t) = f(t)\mathbf{i} + g(t)\mathbf{j} + h(t)\mathbf{k}$ (straight line, parabola, circle, ellipse & helix).

Vector functions: Limits, derivatives and integrals. Properties of vector derivatives. Velocity & acceleration.

The motion of an object in a plane (circular & projectile motion).

At the end of the course, students are able to:

- Describe fundamental vector concepts and principles in Vector Algebra, Cartesian & Geometry Vector and Vector Calculus.
- Apply appropriate vector methods to solve problems involving Vector Algebra, Cartesian & Geometry Vector and Vector Calculus.
- Present written and verbal solution through active involvement in group work.

Main Reference Books:

- Shariff, A. A., Manaf F. A., Mohamed, I. & Kasmani, R. (2022). Pre-University Mathematics Latest Syllabus, SAP Publication.
- Polanco, C., (2019). Advanced Calculus - Fundamentals of Mathematics, Bentham Science Publishers Pte. Ltd. Singapore.
- Nayak, P. K., (2017). Vector Algebra and Analysis with Applications, Universities Press (india) Pvt Ltd.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAC1002 PROGRAMMING I (3 credit hours)

This module introduces students to the fundamentals of computer programming, incorporating foundational knowledge from information systems, computer engineering, discrete mathematics, and basic algorithmic thinking.

At the end of the course, students are able to:

1. Describe concepts, terms, and notations related to programming as well as technical aspects such as computer hardware, computer software, computer code, truth tables and logic circuits.
2. Solve problems in computer programming with theoretical frameworks (problem analysis and input-output charts), algorithms, pseudocode and simple coding.

Main Reference Books:

1. Mohammad, W. A. W., & Mydin, A. M. (2019). Introduction to C++ Programming (2nd ed.). Oxford Fajar : Oxford University Press.
2. Deitel, P. J., & Deitel, H. (2017). C++ How to Program (ISBN 9780134448237). Pearson.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAC1003 PROGRAMMING II (3 credit hours)

This module builds upon the foundational concepts introduced in Programming I, focusing on structured programming and C++ syntax to develop problem-solving applications.

At the end of the course, the students are able to:

1. Describe relevant concepts, terminology, and notation related to programming.
2. Develop computer programs using a structured and modular approach in solving problems and syntax encoding with C++.

Main Reference Books:

1. Mohammad, W. A. W., & Mydin, A. M. (2019). Introduction to C++ Programming (2nd ed.). Oxford Fajar : Oxford University Press.
2. Deitel, P. J., & Deitel, H. (2017). C++ How to Program (10th edition). Pearson.
3. Gaddis, T., Walters, J., & Muganda, G. (2021). Starting out with C++. Early objects. Pearson Education.

Assessment Methods: Continuous Assessment 60%, Final Examination 40%

Medium of Instruction: English

FAC1004 ADVANCED MATHEMATICS II (3 credit hours)

Complex numbers: Functions of complex numbers, loci, applications of complex numbers.

Inverse trigonometric and hyperbolic functions: graphs, identities, derivatives and integrations.

First Order Differential equation: Nonhomogeneous of linear coefficients differential equations of linearly dependent and linearly independent case, exact differential equations, Bernoulli differential equations and applications of differential equations.

At the end of the course, students are able to:

1. Explain concepts involving complex numbers, hyperbolic and inverse trigonometric functions, and differential equations.
2. Apply appropriate techniques to solve problems involving complex numbers, hyperbolic and inverse trigonometric functions, and differential equations.
3. Present written and verbal through active participation in group work.

Main Reference Books:

1. K.A. Stroud & D.J. Booth Bolton. (2020). Engineering Mathematics, Palgrave Mcmillan. (Seventh Edition).
2. K. Singh, Engineering Mathematics through applications. (2019). Palgrave Mcmillan. (Second Edition).

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FOUNDATION STUDIES IN SOCIAL SCIENCES

FAG1001 - THINKING SKILLS (3 credit hours)

Critical thinking is the process of developing and supporting our beliefs and evaluating the strength of arguments made by others in real-life situations. It involves actively and skilfully conceiving, applying, analysing, and evaluating information gathered from observation, experience, reflection, reasoning or communication as a guide to belief and action. This course encourages students to reflect on the processes of thinking, as well as developing and practicing thinking skills.

At the end of the course, students are able to:

1. Explain the concept of critical and creative thinking in the field of social science.
2. Solve problems by using relevant critical thinking skills for real life situations.
3. Show communication skills in a team for better problem solving.

Main Reference Books:

1. Cottrell, S. (2017). Critical thinking skills: Developing effective analysis and argument (3rd. Ed.). MacMillan Education, UK.
2. Moore, B. N. (2017). Critical thinking (12th ed.). McGraw Hill Education.
3. Kallet, M. (2014). Think smarter: Critical thinking to improve problem-solving and decision making skills. New Jersey: John Wiley & Sons, Inc.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1002 - ENGLISH I (3 credit hours)

This course aims to equip students with listening and speaking skills in English. Students will be able to understand and explain a variety of different information through a variety of discussions and listening assignments. They will also be able to convey information and views effectively.

At the end of the course, students are able to:

1. Explain various information from a range of listening tasks.
2. Interpret information from extended discussion.
3. Deliver information and viewpoints effectively.

Main Reference Books:

1. Betsis, A. & Haughton, S. (2015). Succeed in Trinity ISE I: Listening & Speaking Student's Book. London: Global ELT.
2. Betsis, A. & Mamas, L. (2016). Succeed in IELTS Life Skills: Speaking & Listening. London: Global ELT.
3. Ostrowska, S. (2016). Unlock: Listening & Speaking Skills 3. Cambridge: Cambridge University Press.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1003 - BASIC INFORMATION AND COMMUNICATION TECHNOLOGY (ICT) (3 credit hours)

This course aims to prepare students with sufficient up-to-date information and communication technology knowledge and skills that are consistent with current ICT trends. It covers IT literacy, information systems, social informatics and network computing.

At the end of the course, students are able to:

1. Describe basic concepts and roles of ICT in the organization.
2. Apply ICT tools to solve problems faced by the organization.

3. Demonstrate skills in using appropriate ICT tools for organizational effectiveness.

Main Reference Books:

1. Brown G., Sergent B., and Watson D. (2021). Cambridge IGCSE, Information and Communication Technology (3rd. Ed.). Hodder Education
2. Farah W. J. et al (2017), Information System An Introduction (2nd Ed.), Oxford University Press
3. Robert, T.G. (2017) Exploring Getting Started with Computing Concepts (3rd Ed.). Pearson

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1004 - MATHEMATICS (4 credit hours)

This course is designed to develop students' confidence with mathematical concepts and relationships. Students will be able to use mathematics and statistical skills and techniques in a range of contexts, specifically problem solving and abstract thinking. Topics covered are numbers, functions and polynomials, sequence and series, matrices, derivatives, integrals, basic statistics and probability.

At the end of the course, students are able to:

1. Identify the fundamental concepts and principles of various mathematical methods.
2. Apply a variety of quantitative approaches in problem solving.
3. Show a range of mathematical skills as a logical and coherent subject.

Main Reference Books:

1. Barnett, R., Ziegler, M., Byleen, K. and Stocker, C., 2019. College Mathematics for Business, Economics, Life Sciences, and Social Sciences. 14th ed. Pearson.
2. Ahmad Shariff, A., Abd. Manaf, F. and Mohamed, I., 2021. Comprehensive College Mathematics. SAP Publications.
3. Ong, B., Nuruddin, M., Lee, K., Noor, C. and Zubairi, Y., 2018. Mathematics for Matriculation Semester 1. 5th ed. Oxford Fajar.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1005 - ENGLISH II (3 credit hours)

This course aims to equip students with reading and writing skills in English. Students will be able to explain a variety of different information through reading assignments and demonstrate ability to compose a wide variety of essays using appropriate writing conventions. They can also write thesis statements, topic sentences, supporting details, and key ideas in reading and writing assignments.

At the end of the course, students are able to:

1. Explain various information from a range of reading tasks.
2. Show ability to compose different types of essays using appropriate writing conventions.
3. Write thesis statement, topic sentence, supporting details, and main ideas in reading and writing tasks.

Main Reference Books:

1. Betsis, A. & Lethem, L. (2018). Practicing for Trinity ISE I: Reading & Writing. London: Global ELT.
2. Blanchard, K. & Root, C. B. (2016). Ready to Write 2 (B1) Student Book with Essential Online Resources. London: Pearson ELT.
3. Westbrook, C. (2014). Unlock: Reading & Writing Skills 3. Cambridge: Cambridge University Press

Assessment Methods: Continuous Assessment 50%, Final Examination 50%
Medium of Instruction: English

FAG1006 - CO-CURRICULUM (2 credit hours)

This course aims to produce students who are able to apply soft skills, mainly basic leadership and life-long learning skills, to promote a positive attitude and moral values.

At the end of the course, students are able to:

1. Demonstrate characteristics as an entrepreneur in event management.
2. Demonstrate leadership skills in co-curricular activities conducted.

Main Reference Books:

1. Ahmad Esa, Mohd. Khir Mohd Nor, Nawawi Jusoh, Norashidah Abd Rahman & Zalinah Salehon (2015). *Citra kokurikulum*. Penerbit UTHM.
2. Wankel, L. A., & Wankel, C. (Eds.) (2016). *Integrating curricular and co-curricular endeavors to enhance student outcomes*. Emerald Group Publishing Limited.
3. *Asas Pengurusan Aktiviti Kokurikulum di Institusi Pendidikan* - Dr Zainun Ishak (2019), ZIT Publishing.

Assessment Methods: Continuous Assessment 100%
Medium of Instruction: English

FAG1007 - FUNDAMENTALS OF MANAGEMENT (4 credit hours)

This course will prepare students with a basic understanding of the functions of management in business organizations. It relates to the principles and theories of management, practices of Planning, Organizing, Leading, and Controlling (POLC), organizational design and communication within business entities.

At the end of the course, students are able to:

1. Explain the concepts, practices and roles of management in the organization.
2. Apply the effective management process in managing the organization.
3. Demonstrate appropriate communication skills for organizational effectiveness.

Main Reference Books:

1. Norlida Kamaluddin et al. (2018), *Principles of Management*, 3rd Edition, Oxford
2. Robbins, S. P., & Coulter, M.A. (2021). *Management* (15th ed.). Pearson
3. Certo, S.C., & Certo, S.T., (2016). *Modern management: Concepts and skills* (14th ed.), Pearson

Assessment Methods: Continuous Assessment 50%, Final Examination 50%
Medium of Instruction: English

FAG1008 - PRINCIPLES OF ECONOMICS (4 credit hours)

This course aims to provide students with an overview of economics. The course facilitates students with an understanding of basic economic concepts and disciplines. Students will be exposed to the core areas of microeconomics and macroeconomics. The course introduces students to market fluctuations which involve the behaviours of consumers and producers. It also introduces the basic macro study such as national growth and its issues, as well as analysing policies in influencing economic conditions.

At the end of the course, students are able to:

1. Explain the basic concepts and theories in economics.

2. Demonstrate the role of government in achieving market equilibrium.
3. Identify the behaviour of economic units in making decisions about consumption and production.

Main Reference Books:

1. Sarimah Aman Shah, Abd. Rashid Mohd Ali & Norsela A. Manof (2017), Principle of Economics, 3rd Ed., Oxford Fajar
2. Hubbard, R.G., & O'Brien, A.P. (2019). Essentials of economics (6th ed.). United Kingdom: Pearson
3. Mankiw, N. G. (2018). Essentials of economics (8th ed.). Connecticut: Cengage.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1009 - INTRODUCTION TO LAW (4 credit hours)

This course provides students with an understanding of legal concepts, meanings, functions, classifications and some basic principles of legal liability. It outlines a brief history, legal sources and organization of the courts in the legal system in Malaysia. It also exposes students to the legal profession in Malaysia.

At the end of the course, students are able to:

1. Explain and describe the meaning, functions and classification of law.
2. Identify the various sources of law.
3. Explain the operations of law and institutions related to it.

Main Reference Books:

1. Wan Arfah - A First Look at Malaysian Legal System Oxford University Press; 1st edition (July 25, 2012)
2. Williams, G. (2016). Learning the law (16th ed.). London: Sweet & Maxwell.
3. Partington, M. (2018). Introduction to the English legal system (13th ed.). Oxford University Press.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1010 - FINANCIAL ACCOUNTING (4 credit hours)

This course provides students with basic knowledge and skills in accounting concepts, bookkeeping concepts and financial reporting procedures, which are applicable to business entities. Students will learn about the accounting equation, double entry system, journal and ledger, and preparing financial statements for financial reporting purposes.

At the end of the course, students are able to:

1. Identify the needs of accounting for individuals and business.
2. Apply the principles of basic financial accounting in business entities.
3. Prepare statement of profit and loss and statement of financial position in business.
4. Demonstrate skills in recording and preparing accounting statements in business.

Main Reference Books:

1. Mohd Nizal Hanif et al. (2018), Fundamentals of Financial Accounting. 2nd Edition, Oxford.
2. Sangster, A., & Wood, F. (2019). Business accounting volume 2 (14th ed.). Pearson.
3. Weagant, J.J., Kimmel, P.D., & Keiso, D.E. (2018). Accounting principles (12th ed.). Wiley
4. James A. Hall (2018). Accounting Information Systems. 10th Edition. Cengage Learning.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%
Medium of Instruction: English

FAG1011 - PRINCIPLES OF MARKETING (4 credit hours)

This course provides students with an understanding of marketing concepts, functions and roles in business organizations. It exposes students to product, pricing, distribution, promotion, marketing communication, and basic internet marketing.

At the end of the course, students are able to:

1. Describe the basic concepts of marketing principles in business organizations.
2. Use concept of marketing environment in formulating marketing strategy for a business organization.
3. Choose appropriate marketing tools in the formation of marketing strategies.

Main Reference Books:

1. Kotler, P., and Armstrong, G (2023), Marketing: An Introduction, 15th Edition, Pearson.
2. Yusniza Kamarulzaman & Norkhalidah Abu (2017), Principles of Marketing, 3rd Edition, Oxford Press.
3. Kotler, P., and Keller, G. & Chernev, A (2022), Marketing Management, 16th Edition, Pearson.
4. Kotler, P., and Armstrong, G (2021), Principles of Marketing 18th Edition, Pearson.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%
Medium of Instruction: English

FAG1012 - MANAGEMENT ACCOUNTING (4 credit hours)

This course provides students with basic knowledge and skills in managerial accounting concepts, budgeting and costing procedures applicable to business entities. Students will learn about the cost, overhead, cost behaviour, budgets and variance analysis in performing a cost analysis of business organizations.

At the end of the course, students are able to:

1. Explain the concept and basic principles of cost in business.
2. Apply the concepts of cost in accounting for materials, labour and overhead.
3. Use appropriate techniques and analysis based on accounting information in business operations.
4. Show basic management accounting methods for planning, performance evaluation, record and decision making purposes.

Main Reference Books:

1. Rozainun Abdul Aziz et al. (2018), Management Accounting. 3rd Edition. Oxford
2. Garrison, R., Brewer, P. Noreen, E. (2018). Managerial Accounting. 16th Edition. McGraw Hill
3. Drury, Colin. (2018). Cost and Management Accounting. 10th Edition. Cengage.
4. Bhimani, A., Datar, S.M., Horngren, C.T., & Rajan, M.V. (2019). Management and cost accounting (7th ed.). Pearson.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%
Medium of Instruction: English

FAG1013 - FUNDAMENTALS OF PSYCHOLOGY (4 credit hours)

This course develops students with an understanding of the concepts, principles, history, and approaches in psychology.

At the end of the course, students are able to:

1. Describe the concepts and principles used in psychology, their applications, and their connections.
2. Explain how concepts and methods of psychology can be applied to everyday life situations and in the study of human behaviours.
3. Discuss how the history and study of psychology has developed in terms of approaches and treatments for psychological disorders.

Main Reference Books:

1. Carole Wade, Carol Tavis, Samuel R Sommers, Lisa M. Shin (2020). Psychology, (13th edition) Pearson
2. Kalat, J. W. (2021). Introduction to psychology (12th edition) Cengage Learning.
3. Myers, D.G. and DeWall, C.N. (2015). Psychology (11th ed.). Worth Publishers. ISBN-13: 978-1464140815
4. Myers, D.G. (2013). Psychology (10th ed.). Worth Publishers. ISBN-13: 978-1429261784
Johnson, J.G. (2011). Introduction to psychology (2nd ed.). Harper Collins Publisher. ISBN-13: 978-0060881528

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1014 - SOCIOLOGY (4 credit hours)

This course prepares students with the basic understanding of the principles of sociology. The coverage of the topics relates to the origins and historical development of sociology until now. Students will learn about culture, society, socialisation and social institutions within a contemporary social structure. This course is expected to upgrade the understanding level of students to build expertise and the ability to critically analyse issues in the sociology field.

At the end of the course, students are able to:

1. Explain basic sociological concepts.
2. Apply three major perspectives in sociology.
3. Identify sociological issues within the contemporary environment.

Main Reference Books:

1. Macionis, J. J. (2018). Sociology (17th ed.). New Jersey: Prentice Hall Inc.
2. Schaefer, R.T. (2016) Sociology: A brief Introduction (12th ed.). New York: McGraw-Hill.
3. Mohan, B. (2022). Introduction to Sociology: Concepts and Theories. Taylor & Francis.
4. Karim Murji, Sarah Neal & John Solomos (2021). An Introduction to Sociology. United Kingdom Sage Publication

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1015 - WRITING AND RESEARCH SKILLS (4 credit hours)

This course prepares students for social sciences research, skills of academic writing, and research methods. Students will have skills on developing research design, collection, analysis and reporting of research data. This course also exposes students to ethical issues in academic writing and research.

At the end of the course, students are able to:

1. Explain the basic methods of research in social science.
2. Demonstrate basic descriptive statistical calculation skills from raw data.
3. Demonstrate skills in preparing research proposal papers based on problems for the purpose of academic papers.
4. Identify the role and impact of ethics in research for the purpose of academic writing.

Main Reference Books:

1. Sekaran, U., and Bougie, R. (2016), Research Methods for Business, A Skill-Building Approach, 7th Edition, John Wiley & Sons Ltd.
2. Christensen, L. B., Jonson, R. B. and Turner, L. A. (2022), Research Methods, Design, and Analysis, 13th Edition, Pearson.
3. McMilan J. H. (2022) Educational Research: Fundamental Principles and Methods, 8th Edition, Pearson.
4. Malhotra, N.K. (2010), Marketing Research: An Applied Orientation, 6th Edition, Pearson.
5. Tompkins, G. E., Roger, E., and Roger, A., (2022), Literacy for the 21st Century: Balancing Reading and Writing Instruction, 8th Edition Pearson.
6. Internet sources

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1016 - INTRODUCTION TO FINANCE (4 credit hours)

This course prepares students with the concepts, roles, and principles of financial management in business organisations. Students will review the roles of financial markets, institutions and environment as well as performing basic analysis in regards to the time value of money, financial statements and capital budgeting for business decisions.

At the end of the course, students are able to:

1. Identify the role of markets and financial institutions in financial management.
2. Apply the concepts of future and present values as well as the components involved in calculations.
3. Use financial statements for the purpose of ratio analysis in determining the performance of a company.
4. Demonstrate capital and cash budget evaluation methods in decision making.

Main Reference Books:

1. Ng Kean Kok et al. (2018). Financial Management. 3rd Edition. Oxford.
2. Brigham, E.F., & Houston, J.F. (2020). Fundamentals of financial management (10th ed.). Cengage.
3. Brooks, R. (2019). Financial management: Core concepts (4th ed.). Pearson.
4. Gitman, L.J., & Zutter, C. J. (2015). Principles of managerial finance (7th ed.). Pearson.
5. Titman, S. & Keown, A.J. (2018). Financial management: Principles and applications (13th.ed.). Pearson.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1017 - INTRODUCTION TO VISUAL ARTS (4 credit hours)

This course introduces key concepts and principal methods in the study of art and visual culture. Drawing on examples from across the world, students are introduced to topics such as the changing definition of art, works of art as material objects, works of art in social, cultural, and political contexts, and display practices of museums and galleries. The course will not only enhance your

enjoyment and understanding of art and visual culture for pleasure, but also develop foundation skills in writing, discussing and researching art.

At the end of the course, students are able to:

1. Understand the diversity of art and visual culture in local and global contexts through a variety of themes and issues.
2. Develop the skill to interpret images and objects.
3. Describe the fundamental concepts and methods of studying visual art and culture to a creative research project.

Main Reference Books:

1. Gray, George T., An introduction to the history of architecture, art & design (Bandar Sunway, Selangor: Sunway University Press, 2022)
2. Roger Nelson, Modern Art of Southeast Asia A-Z (Singapore: National Gallery of Singapore, 2019)
3. Narratives in Malaysian Art Vol. 1-4. (Kuala Lumpur: Rogue Art, 2012-2019) <http://narrativesinmalaysianart.blogspot.com/p/narratives-in-malaysian-art-volumes-14.html>
4. Sabapathy, T.K. 2018. Writing the modern: selected texts on art & art history in Singapore, Malaysia & Southeast Asia, 1973-2015, edited by Ahmad Mashadi, Susie Lingham, Peter Schoppert and Joyce Toh (Singapore: Singapore Art Museum, 2018)
5. World art studies: exploring concepts and approaches, edited by Kitty Zijlmans, Wilfried van Damme (Amsterdam: Valiz, 2008)

Assessment Methods: Continuous Assessment: 100%

Medium of Instruction: English Continuous Assessment: 100

FAG1018 - MASS MEDIA AND COMMUNICATION (4 credit hours)

This course provides students with an overview of the effect and impact of mass media communication on contemporary life and society. All topics cover the historical evolution of media as well as the contemporary development of new media and issues. Students will learn about various mass media channels, advertising, public relations and their social effects.

At the end of the course, students are able to:

1. Explain mass Media and communication concepts, models, channels and techniques.
2. Apply appropriate use of media channels and techniques.
3. Adapting mass media tools and resources in conveying information effectively and ethically.

Main Reference Books:

1. Baran, S., (2017). Introduction to mass communication: Media literacy and culture (8th ed.). McGraw Hill.
2. Dominick, J.R., (2012). The dynamic of mass communication: Media in transition (12th ed.). McGraw Hill.
3. Doug Specht. (2020). The Media and Communications Study Skills Student Guide. University of Westminster Press.
4. Paddy Scannell. (2020). Media and Communication. SAGE Publications.,
5. Simone Murray. (2020). Introduction to Contemporary Print Culture: Books as Media. Routledge
6. Stephanie A. Smith. (2018). Careers in Media and Communication. SAGE Publications

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1019 - LEGAL SKILLS (4 credit hours)

This course provides students with basic skills in research, reading, analysing and application of legal sources.

At the end of the course, students are able to:

1. Explain common legal terminologies.
2. Use relevant methods in conducting basic information search.
3. Identify appropriate legal authorities in problem solving.

Main Reference Books:

1. Wan Arfah - A First Look at Malaysian Legal System Oxford University Press; 1st edition (July 25, 2012)
2. Fatinski, E. F. and S. (2017). Legal skills (6th ed.). Oxford: Oxford University Press.
3. Hanson, S. (2016). Learning legal skills and reasoning (4th ed.). Taylor and Francis LTD

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1020 - BASIC CONTEMPORARY DANCE (4 credit hours)

Students are exposed to warm up exercises, breathing techniques, contemporary dance movement techniques through floor work, centre work and cross-floor exercises. Introduction to contemporary dance movement elements and practicing contemporary dance segments are also part of the learning activities.

At the end of the course, students are able to:

1. Describe the movement elements of a contemporary dance performance.
2. Show the basic steps and movements in contemporary dance.
3. Perform contemporary dance segments with

Main Reference Books:

1. Melanie, C. (2020). The Essential Guide to Contemporary Dance Techniques. Marlborough: The Crowood Press.
2. Butterworth, J., Sanders, L. (Ed). (2021). Fifty Contemporary Choreographers (3rd Edition). Oxon: Routledge
3. Miriam Giguere, M. (2013). Beginning Modern Dance. Human Kinetics.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1021 - INTRODUCTION TO MALAYSIAN ARTS PERFORMANCE (4 credit hours)

This course introduces students to the forms, styles and genres of performing arts (drama, dance and music) in Malaysia. Students are also exposed to modern and traditional performing arts in Malaysia. In addition, students will also be exposed to information about career opportunities in the field of performing arts.

At the end of the course, students are able to:

1. Identify the characteristics of theatre, music and dance in Malaysia
2. Write a report on theatre, music and dance in Malaysia that has been watched.
3. Describe modern and traditional performing arts in Malaysia

Main Reference Books:

1. Seni Persembahan Tradisional Malaysia (2019). Penulis cawangan dokumentasi dan penerbitan JKKN.
2. Zimmerman, Suzi (2020). Introduction to Theatre Arts 1: Volume One. Meriwether Publishing
3. Kassing, Gayle (2017). History of Dance. Human Kinetics
4. Hoffer, Charles (2017). Introduction to Music Education, Fourth Edition. Waveland Press, Inc

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1022 - BASIC MUSIC PRACTICE (4 credit hours)

This course introduces students to the fundamental skills of playing musical instruments. Students will learn to identify the basic elements of music practice, which are melody, rhythm, harmony and improvisation. At the end of the course, students will show their acquired basic skills in playing a musical instrument. Students are required to record a video of their playing and stage a performance of popular music (including jazz, rock and folk) songs selected by the students themselves.

At the end of the course, students are able to:

1. Identify the basic elements of music practice: melody, rhythm and harmony (C1)
2. Show basic skills in playing a musical instrument (P1)
3. Execute a music performance that demonstrates basic skills in music practice (P2)

Main Reference Books:

1. Adil, J. 2022. 'Transnational motilities, intercultural rhythms: the journey of a drummer in Malaysian popular music, 1980s and 1990s'. JATI-Journal of Southeast Asian Studies, 27(1), 127-151.
2. Allingham, E. & Wöllner, C. 2022. 'Slow practice and tempo management strategies in instrumental music learning: Investigating prevalence and cognitive functions'. Psychology of Music, 50(6), 1925-1941.
3. Choong, H., 2022. 'The learning experiences and musical proficiencies of formal and informal popular musicians in Malaysia'. International Journal of Music Education, 1-13
4. De Bruin, L.R. and Southcott, J. eds., 2022. Musical Ecologies: Instrumental Music Ensembles Around the World. New York: Routledge.
5. Hill, S.C., 2022. 'An investigation of musical "boundary crossers"'. Research Studies in Music Education, 44(1), 219-233.
6. Jerome, C., Su-Hie, T. and Perry, E.J., 2022. 'Rethinking visions of "unity" and "belonging": insights into audience responses towards popular music of Malaysia's indigenous ethnic communities - a case of Iban pop song'. Kajian Malaysia: Journal of Malaysian Studies, 40(1), 109-131.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FAG1023 - BASIC MALAY DANCE (4 credit hours)

This course will introduce Malay Folk Dance genres that are commonly choreographed and performed for stage performances. This introductory course will introduce the basic movements of Inang, Zapin and Malay Joget.

At the end of the course, students are able to:

1. Explain the background and terminology of Malay dance especially the Inang, Zapin and Joget dances.
2. Show movements and steps of Malay dance especially Inang, Zapin and Joget dances.

3. Perform Malay dance: Inang, Zapin and Joget dances.

Main Reference Books:

1. Mohd Anis Md Nor. "Eclecticism and Syncretic Traditions: The Making of Malay Folk Dance," In Mohd Anis Md Nor and Burridge, Stephanie (ed.) *Sharing Identities: Celebrating Dance in Malaysia*. New Delhi: Routledge, pp. 37-55. 2011.
2. Tengku Mira Sinar, Mahyudin Al Mudra, SH, MM (ed). *Teknik Pembelajaran Dasar Tari Melayu (Tari Melayu Tradisional)*. Medan: Adicita Karya Nusa. 2011.
3. Mohd Anis Md Nor (2018) "Ronggeng Re-Invented: The Emergence of New repertoires from Singapore to Peninsular Malaysia," *Proceedings of the 5th Symposium of the ICTM Study Group on Performing Arts of Southeast Asia*. Edited by Patricia Matusky, Wayland Quintero et al. Kota Kinabalu: Department of Sabah Museum, pp. 54-59.

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: English

FOUNDATION OF ISLAMIC STUDIES AND SCIENCE

IAC1001 - QAWAID ARABIYYAH I (2 credit hours)

Students are exposed to concepts and simple structures for words and sentences. Besides, they are taught to analyze and construct simple structure for words and sentences in reading and writing in Arabic

At the end of this course, students are able to:

1. Identify concept and simple structure for words and sentences.
2. Analyze simple structure for words and sentences in text readings.

Main Reference Books:

1. Abbas Hasan. 2014. al-Nahw al-Wafi. Dar al-Ma`arif, Kaherah
2. Ibn Hisyam. 2013. Audah al-Masalik. Beirut: Dar Ihya' al-Turath al-'Arabiyy
3. al-Ghalayiniy, Mustafa. 2011. Jami` al-Durus al-'Arabiyyah. Beirut: al-Maktabah al-'Asriyyah
4. Ahmad al-Hamalawiy. 2013. Shadha al-'Arf Fi Fann al-Sarf. Beirut: al-Maktabah al-Thaqafiyyah
5. Muhammad 'Abd al-Ghaniy. 2012. 'Ilm al-Sarf. Amman: Maktabah al-Risalah al-Hadithah

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: Arabic

IAC1002 - QAWAID ARABIYYAH II (2 credit hours)

Students are exposed to concepts and complex structures for words and sentences. Besides, they are taught to analyze and construct complex structure for words and sentences in reading and writing in Arabic.

At the end of this course, students are able to:

1. Identify concept and complex structure for words and sentences.
2. Analyze complex structure for words and sentences in text readings.

Main Reference Books:

3. Abbas Hasan. 2014. al-Nahw al-Wafi. Dar al-Ma`arif, Kaherah
4. Ibn Hisyam. 2013. Audah al-Masalik. Beirut: Dar Ihya' al-Turath al-'Arabiyy
5. al-Ghalayiniy, Mustafa. 2011. Jami` al-Durus al-'Arabiyyah. Beirut: al-Maktabah al-'Asriyyah
6. Ahmad al-Hamalawiy. 2013. Shadha al-'Arf Fi Fann al-Sarf. Beirut: al-Maktabah al-Thaqafiyyah
7. Muhammad 'Abd al-Ghaniy. 2012. 'Ilm al-Sarf. Amman: Maktabah al-Risalah al-Hadithah

Assessment Methods: Continuous Assessment 60%, Final Examination 40%

Medium of Instruction: Arabic

IAC1008 USUL AL-SYARIAH II (2 credit hours)

This course discloses the history of Islamic development, the role of al-Quran, al-Sunnah and Ijtihad as a source of jurisprudence and the role of Sharia in solving current issue.

At the end of this course, students are able to:

1. Explain the history of development of Sharia.
2. Elaborate the roles of al-Quran, al-Sunnah and Ijtihad as the sources of Islamic jurisprudence.
3. Explain the importance of Sharia in resolving current issues.

Main Reference Books:

1. Shukeri Mohamad, Usul al-Syariah, (2015) APIUM N.PURI Nota Kuliah
2. Dr. 'Abd al-Karim Zaydan, Al-Madkhal li al-Dirasat al-Shari'ah al-Islamiyyah, (2001). Beirut: Muassasat al-Risalah.
3. Ali Hasaballah, Usul al-Tasyri' al-Islami, (1985), Kaherah: Dar al-Ma'arif
4. Yusuf Hamid al-Alim, al-Maqasid al-Ammah li al-Syariah al-Islamiyyah, USA: al-Maahad al-Alamiy li al-Fikr al-Islamiy, (1991)
5. Dr. Yusuf Al-Qaradhawi, Al-Siyasah al-Syar'iyyah fi Dhaw'i al-Nusus al-Syari'ah wa Maqasidiha, (2001/1422), Beirut, Muassasah al-Risalah
6. L. Ali Khan, Hisham M. Ramadan, (2012) Contemporary Ijtihad: Limits and Controversies, Edinburgh:Edinburgh University Press

Assessment Methods: Continuous Assessment 60%, Final Examination 40%

Medium of Instruction: Arabic

IAC1009 - FIQH AL-SIRAH (2 credit hours)

This course identifies the field of fiqh al-sirah and its importance. It also describes primary events in the life of the Prophet PBUH, which then serve as basis in the foundation of Islamic communities. Moreover, it explains lessons from the Prophet PBUH history as guidance in local and temporal da'wah.

At the end of this course, students are able to:

1. Identify the knowledge of fiqh al-sirah and the importance.
2. Explain the main events in Rasulullah SAW's life.
3. Elaborate the values from sirah of Rasulullah SAW for the sake of da'wah.

Main Reference Books:

1. Muhammad Sa'id Ramadan al-Buti (2015), Fiqh al-Sirah al-Nabawiyyah, Kaherah: Dar al-Salam.
2. Muhammad Sa'id Ramadan al-Buti (2012), Fiqh al-Sirah, (terj.) Mohd Darus Sanawi, Shah Alam, Dewan Pustaka Fajar.
3. Syawqi Abu Khalil (2013), Atlas al-Sirah al-Nabawiyyah, Damsyik: Dar al-Fikr.
4. Safi al-Rahman al-Mubarakfuri (2012), al-Rahiq al-Makhtum, al-Riyadh: Dar al-Muayyad.

Assessment Methods: Continuous Assessment 40%, Final Examination 60%

Medium of Instruction: Malay & Arabic

IAC1013 - AL-KITABAH (2 credit hours)

This course introduces the concepts of Iman, Islam and Ihsan and the pillars of Iman in detail. It also discusses the concept and importance of the knowledge of creed containing the 10 criteria of this knowledge, and the relationship of the principle of Iman and akhlaq foundation through the concept of Ihsan and the discipline of Sufism. Moreover, this course explains Islamic principle with regards to several scientific theories such as the theory of evolution and the concept of cause and effect, including some critical and controversial issues in the discourse of Islamic thought.

At the end of this course, students are able to:

1. Identify commandment and the concept of Iman, Islam and Ihsan.
2. Explain the concept and importance of the knowledge of creed and its relationship with the knowledge in akhlak and tassawuf.
3. Explain creed principles in relation with evolutionary theory and causality concept.

Main Reference Books:

1. Al-Hindawiy, Khalil. 2012. Taysir al-Insha'. Beirut : Maktabah Dar al-Shuruq
2. Khatib, Khalil. 2011. Funun al-Kitabah al-Adabiyyah. `Amman: al-Shuruq
3. `Abd al-Wahid, Mahmud `Abbas. 2001. Maharat fi fann al-Ta`bir wa al-Insha'. Kaheerah : Dar al-Fikr al-`Arabiyy
4. Al-Baraziyy, Majd. al-Ta`bir al-Wazifiyy. `Amman: Maktabah al-Risalah al-Hadithah
5. Rida, `Aliy. (t.t) al-Insha' al-Wadih. Beirut : Maktabah Dar al-Sharq

Assessment Methods: Continuous Assessment 60%, Final Examination 40%

Medium of Instruction: Arabic

IAC1014 - AL-MADKHAL ILA AL-AQIDAH AL-ISLAMIYYAH (3 credit hours)

This course introduces the concepts of Iman, Islam and Ihsan and the pillars of Iman in detail. It also discusses the concept and importance of the knowledge of creed containing the 10 criteria of this knowledge, and the relationship of the principle of Iman and akhlaq foundation through the concept of Ihsan and the discipline of Sufism. Moreover, this course explains Islamic principle with regards to several scientific theories such as the theory of evolution and the concept of cause and effect, including some critical and controversial issues in the discourse of Islamic thought.

At the end of this course, students are able to:

1. Identify commandment and the concept of Iman, Islam and Ihsan.
2. Explain the concept and importance of the knowledge of creed and its relationship with the knowledge in akhlaq and tassawuf.
3. Explain creed principles in relation with evolutionary theory and causality concept.

Main Reference Books:

1. Muhammad Sa`id Ramadan al-Buti (2012), Kubra Yaqiniyyat Kawniyyah, Bairut: Dar al-Fikr.
2. Muhammad Sa`id Ramadan al-Buti (1996), Keyakinan Hakiki, (terj.) Muhammad Sulaiman Yassin, Petaling Jaya: Angkatan Belia Islam Malaysia.
3. Abd al-Rahman Hasan Habannakah al-Midani (2012), al-`Aqidah al-Islamiyyah wa Ususuha, Damsyik: Dar al-Qalam.
4. Nuh `Ali Salman (2015), al-Mukhtasar al-Mufid fi Sharh Jawharah al-Tawhid, Kuala Lumpur, Mu`assasah al-Bayan.

Assessment Methods: Continuous Assessment 40%, Final Examination 60%

Medium of Instruction: Arabic

IAC1015 - AL-MADKHAL ILA ULUM AL-QURAN WA AL-SUNNAH (3 credit hours)

This course introduces the concepts of Iman, Islam and Ihsan and the pillars of Iman in detail. It also discusses the concept and importance of the knowledge of creed containing the 10 criteria of this knowledge, and the relationship of the principle of Iman and akhlaq foundation through the concept of Ihsan and the discipline of Sufism. Moreover, this course explains Islamic principle with regards to several scientific theories such as the theory of evolution and the concept of cause and effect, including some critical and controversial issues in the discourse of Islamic thought.

At the end of this course, students are able to:

1. Identify commandment and the concept of Iman, Islam and Ihsan.
2. Explain the concept and importance of the knowledge of creed and its relationship with the knowledge in akhlaq and tassawuf.
3. Explain creed principles in relation with evolutionary theory and causality concept.

Main Reference Books:

Assessment Methods: Continuous Assessment 40%, Final Examination 60%

Medium of Instruction: Arabic

IAC1016 - FANN AL-TAJWID WA AL-TILAWAH (2 credit hours)

This course discusses the introduction of ilm Tajwid, errors in reciting the Quran, principles of tajwid that consist of principles, makhraj, sifat al-huruf, tafkhim and tarqiq, types of idgham, akhkam nun, and mim sakinah.

At the end of this course, students are able to:

1. Explain the tajwid learned.
2. Memorise the chapters in the Quran as assigned.
3. Recite the Quran with tajwid

Main Reference Books:

1. Mohd Alwee Yusoff (2014), Al-Tajwid al-Muyassar, Kota Bharu: Pustaka Kualiti.
2. Lajnah al-Tilawah Jam'iyah al-Muhafazah ala al-Quran (2010), al-Munir fi Ahkam al-Tajwid, Amman: al-Matabi' al-Markaziyyah.
3. 'Atiyah Qabil Nasr (1997), Ghayat al-Murid fi Ilm al-Tajwid, cet.6, Kaherah:(t.p).
4. Surur Shihabudin (2004), Ilmu Tajwid Menurut Riwayat Haf's Asim Melalui Tariq al-Shatibiyyah, Kuala Lumpur : Pustaka Salam

Assessment Methods: Continuous Assessment 50%, Final Examination 50%

Medium of Instruction: Arabic

IAC1017 - AL-QIRA'AH (2 credit hours)

This course introduces the concepts of Iman, Islam and Ihsan and the pillars of Iman in detail. It also discusses the concept and importance of the knowledge of creed containing the 10 criteria of this knowledge, and the relationship of the principle of Iman and akhlaq foundation through the concept of Ihsan and the discipline of Sufism. Moreover, this course explains Islamic principle with regards to several scientific theories such as the theory of evolution and the concept of cause and effect, including some critical and controversial issues in the discourse of Islamic thought.

At the end of this course, students are able to:

1. Identify commandment and the concept of Iman, Islam and Ihsan.
2. Explain the concept and importance of the knowledge of creed and its relationship with the knowledge in akhlak and tassawuf.
3. Explain creed principles in relation with evolutionary theory and causality concept.

Main Reference Books:

1. 'Azzat Faris et al. 2012. al-Lughah al-'Arabiyyah: Maharatuha Wa Fununuha Wa Tatbiqatuha. `Amman: Dar Yafa al-'Ilmiyyah
2. Kashash, Muhammad. 2010. `Ilal al-Lisan wa Amrad al-Lughah. Beirut : al-Maktabah al-'Asriyyah
3. Rifa'i, Anas. 2003. Tasri' al-Qira'ah wa Tanmiyah al-Isti'ab Damsyik : Dar al-Fikr
4. Abu Khalil, Zuhdi. 1997. Nahwa Lughah Salimah Taswib Akhta' Lughawiyah. `Amman: Dar Usamah
5. Abu Khudayri, `Arif. 1994. Ta`lim al-Lughah al-'Arabiyyah Li Ghayr al-'Arab. Kaherah : Dar al-Thaqafah
6. Abdul Aziz Atiq. 2012. `Ilm al-Ma`ani - al-Bayan - al-Badi`. Beirut: Dar al-Nahdah al-'Arabiyyah
7. Fadl Hasan `Abbas. 2011. al-Balaghah (`Ilm al-Ma`ani). Amman: Dar al-Furqan

Assessment Methods: Continuous Assessment 60%, Final Examination 40%

Medium of Instruction: Arabic

FACILITIES ON CAMPUS

Accommodation

There are fourteen residential colleges provided by the university. All Foundation Science students are REQUIRED to stay in the Residential Colleges as directed by the Accommodation Unit, Student Affairs Division.

Student Health Clinic

The university has also provided health services at the Student Health Clinic located in the Siswarama Building, Faculty of Arts & Social Sciences, Universiti Malaya. The Student Health Clinic operates every weekday during office hours. The service hours of the Student Health Clinic are as follows:

<u>Monday - Thursday</u>	<u>Friday</u>	<u>Hari Sabtu & Ahad</u>
8.30 am - 12.30 pm	8.00 am - 11.45 am	8.00 am - 1.00 pm
2.00 pm - 4.30 pm	2.45 pm - 4.30 pm	

PASUM Treatment Room

PASUM takes student health issues very seriously and has taken the initiative to assist students with health problems by providing a Treatment Room that can be used as a resting space for a short time before continuing lectures/practical/tutorials located on the Ground Floor of the PASUM Building.

Sports and Recreation

The university and residential colleges provide many facilities such as football fields, hockey fields, badminton courts, gymnasiums, swimming pools, and each session many competitions are organized at the residential college, university, or national level.

Culture and Arts

As part of the campus community, PASUM students can participate in cultural and arts activities organized by the Cultural Department of the Faculty of Creative Arts, Universiti Malaya. Among the arts taught are traditional dance, visual arts, musical instruments, and painting. Besides this department, the residential colleges also organize many cultural activities in which PASUM students can participate during their free time.

Library

The university also provides library facilities with various types of collections, both as reference materials or for loan. Each faculty/department also has a reading room facility.

Academic Advisor

PASUM will appoint an academic advisor for each student. Students can consult and get advice from their respective academic advisors. In addition, PASUM staff are always ready to help students who seek assistance.

Counseling and Career

Staff of the Centre of Counselling and Disability Empowerment (CDE), are always ready to provide Counselling & Intervention, Psychology Management, Prevention, Development & Awareness Program, Disability & Inclusion, Staff's Social Welfare, Consultation & Collaboration advice on career planning, including training and job opportunities. They also assist students who have problems in their studies, stress, personal and family issues confidentially and privately. Students may consult the counselor by making an appointment through email (kaunseling@um.edu.my).

STUDENT DRESS CODE AND PERSONAL APPEARANCE ETIQUETTE

PASUM has set that all registered students at the Centre are only allowed to wear the following attire:

A. DURING IDENTIFICATION UM-WOW (UM-Week of Welcome)

Male Students

1. Short or long-sleeved shirts.
2. Long slack pants only (jeans are not allowed).
3. Short, neat, and tidy hair.
4. Hair coloring is not allowed.

Female Students

1. Modest and loose clothing such as *baju kurung* or similar attire.
2. Wearing pants is not allowed.
3. Long hair must be tied neatly.
4. Hair and nails coloring is not allowed except for henna.
5. Muslim students are encouraged to cover and maintain their modesty.

B. DURING STUDY AT THE FOUNDATION SCIENCE CENTRE (INCLUDING WHEN DEALING WITH OFFICE MATTERS)

Male Students

1. Short or long-sleeved shirts or collared T-shirts.
2. Long slack pants only (jeans are not allowed).
3. Short, neat, and tidy hair.
4. Hair colouring is not allowed.

Female Students

1. Modest and loose clothing such as *baju kurung* or similar attire.
2. Long blouses that cover past the hips with sleeves past the elbows.
3. Skirts that are at least ankle length.
4. Loose and modest long pants (jeans are not allowed).
5. Long hair must be tied neatly.
6. Hair colouring is not allowed.
7. Muslim students are encouraged to cover and maintain their modesty.
8. Wearing jewellery (earrings) other than on the ears is not allowed.

C. IN THE LABORATORY

Students are required to wear lab coats and closed shoes.

ATTENTION

All students are **NOT** allowed to wear the following:

1. T-shirts without collars.
2. Jeans.
3. Shorts.
4. Slippers - including all types of slippers, flip-flops, and sandals.
5. Clothing that is inappropriate (tight, see-through, short) and unsuitable for the setting.
6. Any clothing that covers all or part of the face except face masks.
7. Wearing lab coats outside the laboratory.

REMINDER

The Foundation Science Centre reserves the right to prevent students from attending classes if they are found not complying with the dress code stated above. Disciplinary action may be taken at any time if students violate the established regulations. (Refer to University of Malaya Rules and Regulations (Student Discipline) 1999, Article 26)



TATASUSILA PAKAIAN PELAJAR PASUM

Pusat Asasi telah menetapkan bahawa semua pelajar berdaftar di bawah Pusat Asasi Sains hanya dibenarkan memakai pakaian seperti berikut :

PERATURAN

- (1) Setiap pelajar **DIWAJIBKAN MEMAKAI KAD MATRIKS** ketika berada di seluruh kawasan PASUM termasuk dewan kuliah, dewan peperiksaan, bilik seminar, perpustakaan atau majlis rasmi.
- (2) Setiap pelajar dikehendaki mematuhi peraturan atau syarat pakaian yang telah ditetapkan.
- (3) Berpakaian **KEMAS, MENUTUP AURAT** bagi pelajar muslim dan **SOPAN** bagi bukan muslim.
- (4) **KASUT** yang bersesuaian.

PELAJAR LELAKI

1. Kemeja berleher pendek/panjang atau kemeja-T berkolar.
2. Seluar panjang jenis slack sahaja (seluar jeans tidak dibenarkan).
3. Berambut pendek kemas dan rapi.
4. Tidak dibenarkan mewarnakan rambut dan kuku kecuali inai (henna).

PELAJAR PEREMPUAN

1. Pakaian yang sopan dan longgar seperti baju kurung dan seumpamanya.
2. Blaus labuh melepasi paras punggung dengan lengan melepasi paras siku dan **TIDAK** dimasukkan ke dalam seluar/skirt (tuck-in).
3. Skirt labuh sekurang-kurangnya pada paras buku lali.
4. Seluar panjang yang longgar dan sopan (jeans tidak dibenarkan).
5. Pelajar yang berambut panjang perlu diikat rapi.
6. Tidak dibenarkan mewarnakan rambut dan kuku kecuali inai (henna).
7. Pelajar beragama Islam digalakkan menutup aurat dan menjaga aurat.

PEMAKAIAN PELAJAR LELAKI



PEMAKAIAN PELAJAR PEREMPUAN



YANG DILARANG PROHIBITED



PERINGATAN :

Pusat Asasi Sains berhak menghalang pelajar daripada mengikuti kelas pengajaran jika didapati pelajar tidak mematuhi tatasusila pakaian yang tersebut di atas. **TINDAKAN TATATERTIB AKAN DIAMBIL PADA BILA-BILA MASA JUGA JIKA DIDAPATI PELAJAR INKAR DENGAN PERATURAN YANG TELAH DITETAPKAN.** (Rujuk Kaedah-Kaedah Universiti Malaya (Tatatertib Pelajar-Pelajar) 1999, Perkara 26).

ENFORCEMENT OF VEHICLE RESTRICTION POLICY FOR STUDENTS ON CAMPUS

No. Category Enforcement

1. Foundation Students and First Year Student **NOT ALLOWED** to bring cars or motorcycles.
2. Second Year Students **ALLOWED** to bring motorcycles only.
3. Third Year, Final Year and Postgraduate Student **ALLOWED** to brings car or motorcycles.

Source : Universiti Malaya Security Office (*Pejabat Keselamatan Universiti Malaya*)

WITHDRAWAL PROCEDURE

Students who intend to withdraw from the PASUM foundation programme are required to first discuss their decision with their parents or guardians.

Once a withdrawal application has been approved, it is final and any appeal to resume studies at PASUM will **not** be considered.

As stated in student Attachment of Offer Letter:

IMPORTANT

- NO REFUND** of the admission fee will be made under any circumstances, including failure to report for registration.
- NO REFUND** of tuition fees and other payments will be made under any circumstances, including withdrawal from the university after one (1) month from the date of registration.

The withdrawal procedure must be carried out **immediately** as follows:

- i. Log in to the MAYA portal (maya.um.edu.my) using your Siswamail username and password.
- ii. Click on the **Enrolment** tab > **Enrolment Amendments**.
- iii. Select **Programme Withdrawal** (not Semester Withdrawal) > + **Apply for Programme Withdrawal**.
- iv. State the *Reason for Withdrawal* (maximum 100 characters. Please refer to the examples *below*).
- v. Upload supporting documents (e.g., scholarship offer letter / acceptance from another institution) to support the withdrawal application.
- vi. Click **Submit**.

***Examples of Reasons for Withdrawal:**

- a) Accept another offer to Universiti ABC.
- b) Further study in STPM at SMK DEF.
- c) Accept GHI scholarship at Universiti JKL.
- d) Changing from UPU to SATU at PASUM due to the acceptance of MNO scholarship.

This withdrawal process can **only** be carried out by students who have completed the Accept Offer Letter process. The PASUM administration will evaluate the withdrawal application based on the justification and supporting documents provided and will then seek endorsement from the Universiti Malaya Admissions and Registration Centre.

Once the withdrawal application has been approved, the **official university withdrawal confirmation letter** can be downloaded via the MAYA portal.

Students who fail to apply for withdrawal promptly and follow the correct procedure may encounter financial implication in the future.

PROCEDURE FOR USING E-PAY@UM

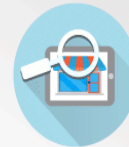
E-PAY @UM : One Stop Payment ONLINE

Pusat Pembayaran Sehenti

1

FIND Payment

CARI Pilihan Pembayaran



FIND

CARI

2

FILL Informations

ISIKAN Maklumat Pembayaran



FILL

ISIKAN

3

PAY Online

BAYAR Dalam Talian



PAY

BAYAR

4

GET Receipt

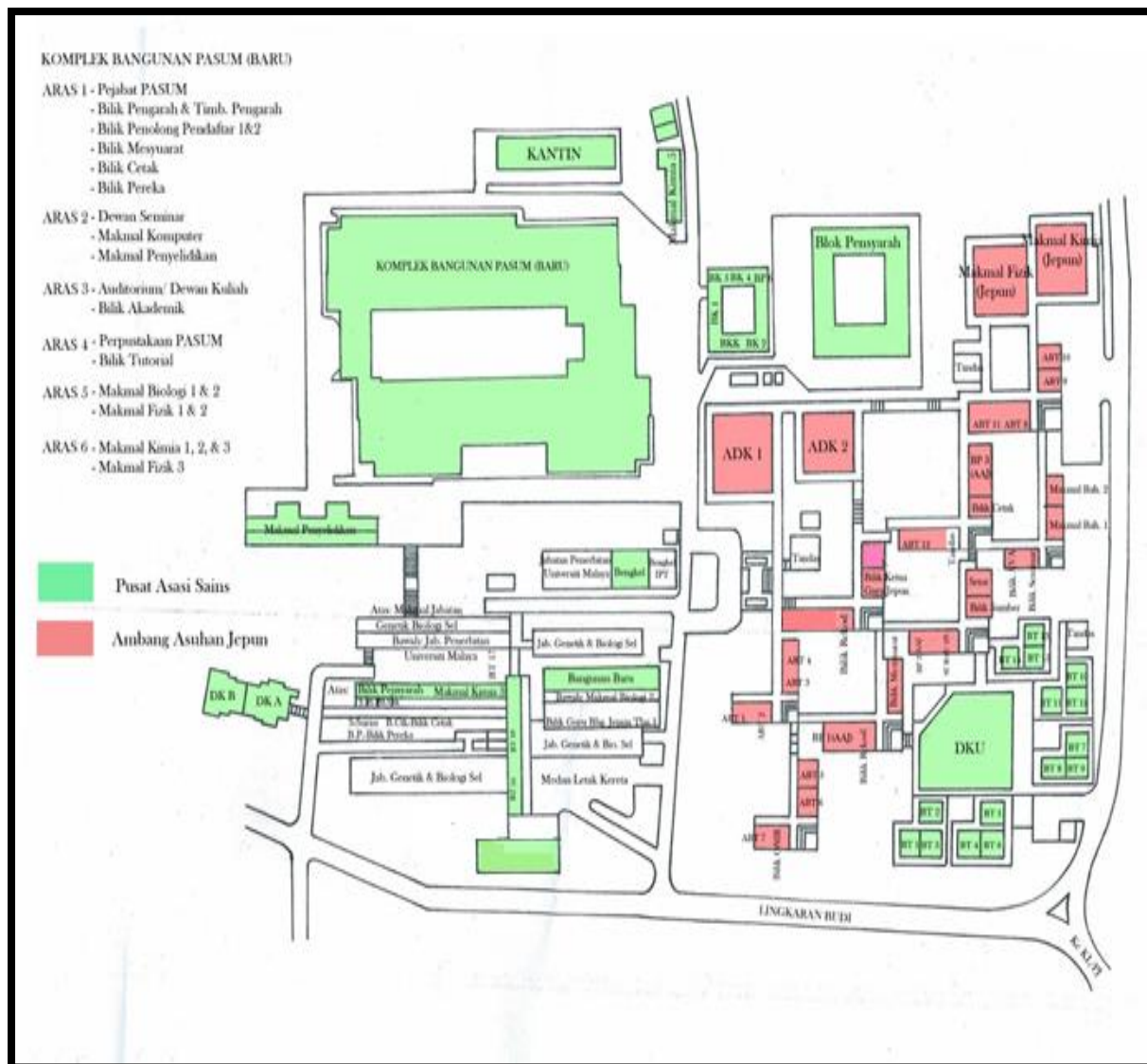
DAPAT Resit Pembayaran



GET

DAPAT

PASUM LOCATION MAP



IMPORTANT TELEPHONES NUMBERS

- PASUM General Office 03 - 7967 5929/5822/5873/5821
- Universiti Malaya Security Office 03 - 7967 7777
- Universiti Malaya Student Health Clinic 03 - 7967 6444/6445
- Bursar - Student Finance Division 03 - 7967 3271
- Administration and Services Department 03 - 7967 3282 / 3440/3441
- Dayasari Residential College (KK5) 03 - 7956 7948
- Ungku Aziz Residential College (KK11) 03 - 7954 0806
- Raja Dr. Nazrin Shah Residential College (KK12) 03 - 7957 7367
- 13th Residential College Universiti Malaya (KK13) 017 - 397 5116
- Universiti Malaya Medical Centre (UMMC) 03 - 7649 4422
- Pantai Police Station 03 - 2282 2222
- Pantai Fire Station 03 - 2282 4444



UNIVERSITI
MALAYA

PUSAT ASASI SAINS

Centre for Foundation Studies in Science

03-79675800/5821/5873

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