

SARJANA SAINS DATA

MASTER OF DATA SCIENCE

Pengenalan Program / *Introduction*

The Master of Data Science program provides students with the skills and knowledge needed to excel in the dynamic field of data science. Designed for individuals with backgrounds in mathematics, statistics, computer science, or related disciplines, this program equips students with expertise in analyzing, interpreting, and utilizing complex datasets.

Data science combines mathematics, statistics, computer science, and domain knowledge to extract meaningful insights from large data sets. As the demand for skilled data scientists grows in industries relying on data-driven decision-making, this program meets that demand by imparting a solid foundation in core data science concepts and techniques.

The curriculum covers diverse topics such as statistical modeling, machine learning, data visualization, data mining, and programming languages like Python and R. Students learn to collect, clean, and preprocess data, apply statistical and machine learning techniques, and effectively present their findings.

The program emphasizes practical projects and real-world case studies, allowing students to gain hands-on experience. Besides technical skills, critical thinking, problem-solving, and communication are emphasized. Graduates possess the ability to analyze complex data sets, identify patterns, and make data-driven decisions. These skills are highly sought after in finance, healthcare, marketing, technology, and consulting.

Upon graduation, students find various career paths in data science, such as data scientists, data analysts, machine learning engineers, research scientists, or consultants. Industries like finance, healthcare, e-commerce, and others offer a wide range of opportunities. Some graduates may pursue research or academic positions in data science.

Durasi / *Duration*

- Full time: 2 – 4 semester
- Part time: 4 – 8 semester

Hasil Pembelajaran Kursus / Course Learning Outcome

PROGRAMME LEARNING OUTCOME

- Analyze and evaluate data in depth.
- Support development & deployment of innovative big data platforms for advanced analytics
- Solve problem with innovative solutions for business purpose.
- Understand data and information modelling to design, construct and evaluate database and data warehouse for structured and unstructured data.
- Apply data analysis method and technique for changing raw data into valuable and useful information

Yuran / Fees

RM24,000 for LOCAL candidate.

Complete program fee is RM24,000 which will be paid in THREE (3) installments (FULL-TIME) on per semester basis (1st Sem:RM9,000, 2nd Sem:RM7,500 and 3rd Sem: RM7,500),

OR

FOUR (4) installments (PART-TIME) on per semester basis (1st Sem:RM7,200, 2nd Sem:RM5,600, 3rd Sem:RM5,600 and 4th Sem: RM5,600)

RM32,000 for INTERNATIONAL candidate.

Complete program fee is RM32,000 which will be paid in THREE (3) installments (FULL-TIME/PART-TIME) on per semester basis (1st Sem:RM12,000, 2nd Sem:RM10,000 and 3rd Sem: RM10,000)

Struktur Kursus / Course Structure

Structure	Course Credit	Course
Compulsory	24 credits (equivalent to 6 courses)	<ul style="list-style-type: none">> TC6424 Fundamental of Data Science> TR6124 Statistical Methods for Data Analytics> TP6234 Unstructured Data Analytics> TS6024 Information Modeling and Databases> TU6434 Big Data Analytics and Management> TC6444 Machine Learning for Data Science> TM6112 Research Method in Computing (AUDIT)
Electives	4 credits (equivalent to 1 courses)	<ul style="list-style-type: none">> TU6214 Decision Support and EIS
Project	12 credits	<ul style="list-style-type: none">> TU607C Project
Total	40 Credits	

Kelebihan Program / *Advantages of Program*

Syarat Kemasukan / *Entry Requirements*

Bachelor Degree in Medicine, Technology and Science or Social Science with an excellent CGPA (Minimum CGPA 2.75) from any institution of higher learning recognized by the senate

or

Bachelor Degree in Medicine, Technology and Science or Social Science with an CGPA 2.50, with conditional and interviews

or

Bachelor Degree in Medicine, Technology and Science or Social Science with CGPA less than 2.50, must has 5 years experience in relevant area

or

Candidate with bachelor degree in social science must passed mathematic/or statistic or credit in mathematic or passed add math in SPM level

TOEFL/IELTS/MUETS/CEFR

For international candidates, requirements for English Language is:

minimum 550 (PBT) / 46-59 (iBT) score for the Test of English as a Foreign Language (TOEFL)

or

5.5 for the International English Language Testing System (IELTS) or

Band 3 for Malaysian University English Test (MUET) or

level B2 for the Common European Framework of Reference for Languages (CEFR/CEFRL) as a prerequisite for entry into graduate programmes at FTSM.

Language Requirement

Malay Language Courses (4 units)

All international students are required to follow two (2) Malay language courses equivalent to 4 units offered by the Citra Centre. Exemptions can be given to candidates who have taken and passed Malay language courses organized by other bodies recognized by the UKM Senate.

Mod Program / *Mode of Program*

Modular

Cara Memohon / *How to Apply*

Pendaftaran secara online melalui <https://join.ukm.my/> setahun dua pengambilan (pengambilan Mac dan September). Yuran permohonan sebanyak RM50.00 (untuk pemohon tempatan) dan USD30.00 atau RM100.00 (untuk pemohonan antarabangsa) dibuat ke akaun

CIMB Bank Berhad atas nama Pusat Kembangan Pendidikan (8002233817).

Online registration via <https://join.ukm.my/> (Mac and September Intake). Application fee of RM50.00 (for Malaysian application), USD30.00, or MYR100.00 (for International applicants) has been paid to Pusat Kembangan Pendidikan, CIMB account number (8002233817).

Hubungi / **Contact**

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