**SYLLABUSES FOR THE DOUBLE DEGREE OF
BACHELOR OF ARTS [BA] AND
BACHELOR OF ENGINEERING IN ARTIFICIAL INTELLIGENCE AND DATA
SCIENCE [BEng(AI&DataSc)]**

These syllabuses apply to students admitted to the BA&BEng(AI&DataSc) curriculum in the academic year 2025-26 and thereafter.

The BA&BEng(AI&DataSc) curriculum comprises 300 credits of courses as follows:
   (a) 78 credits for the Major in Artificial Intelligence and Humanity comprising 42 credits of core courses in AI and Humanity (including 6 credits of capstone experience), and 36 credits of Humanities electives in any single Arts programme*;
   (b) 144 credits of Professional Core in Artificial Intelligence and Data Science comprising 36 credits of Foundation Courses, 24 credits of introductory discipline core courses, 30 credits of advanced discipline core courses, 36 credits of discipline elective courses, 18 credits of capstone experience, including 6 credits of internship;
   (c) 42 credits of University requirements, including non-credit bearing "CAES1001. Academic Communication in English"^, 6 credits in an "English in the Discipline" course@, 6 credits in a Chinese language enhancement course#, 6 credits in artificial intelligence literacy and 24 credits of Common Core courses from any different Areas of Inquiry;
   (d) 36 credits of free electives (i.e. any courses from Arts, Computing and Data Science, or any other disciplines, except the Common Core curriculum); and
   (e) a non-credit bearing national education and national security education, and any other non-credit bearing courses as may be required from time to time.

* an Arts programme refers to a programme offered by the School of Chinese, School of English, School of Humanities, School of Modern Languages and Cultures, and the Centre of Buddhist Studies

^ Candidates who have achieved Level 5 or above in English Language in the Hong Kong Diploma of Secondary Education Examination, or equivalent, are exempted from taking CAES1001.

@ (i) To satisfy the "English in the Discipline" (ED) requirement, candidates who have passed the ED course for a Major but subsequently change that Major are required to pass the ED course for the new Major, or either of the double Majors finally declared upon graduation.
   (ii) Candidates declaring double Majors are not required to take a second ED course but may be advised by the Programme Director to do so. If they fail in the ED course for one of the Majors, they can either re-take and successfully complete that failed ED course, or successfully complete the ED course for the other Major.
   (iii) Candidates who undertake studies in double degrees are not required to take a second ED course but may be advised by the Faculty Programme Director to do so.

Candidates who did not study Chinese language during their secondary education and have not reached the required proficiency level for the Chinese language enhancement course may take a course in either Chinese language or Chinese culture offered by the Chinese Language Centre of the School of Chinese in lieu.

Major in Artificial Intelligence and Humanity (AIH) (78 credits)

AIH Core Courses
Year 1
AIHU1001 Foundations of AI and humanity (6 credits)
AIHU1002 Ethics, society and law of Artificial Intelligence (6 credits)

Year 2 to 3
AIHU2001 Human and machine cognition (6 credits)
AIHU2002 Modelling, assessment, and benchmarking (6 credits)
AIHU2003 Creativity and generative AI (6 credits)

Year 3 to 5
AIHU3001 Advanced topics in AI and humanity (6 credits)
AIHU4001 Research project in AI and humanity (capstone experience) (6 credits)

AIH Humanities Electives
Year 1 to 5
36 credits of advanced courses, except language-learning courses (e.g. "FREN2001. French II.1"), in any single Arts programme (e.g. Philosophy, General Linguistics)

[Note: The Major in in Artificial Intelligence and Humanity is not offered to students from other curricula.]

Professional Core in Artificial Intelligence and Data Science (144 credits)

Foundation Courses
Year 1

COMP1110	Computing and data science in everyday life (6 credits)	
COMP1117	Computer programming (6 credits)	
COMP2113	Programming technologies (6 credits)	
MATH1013	University mathematics II (6 credits)	
MATH2012	Fundamental concepts of mathematics (6 credits)**	

Year 2
MATH2014 Multivariable calculus and linear algebra (6 credits)**

** *Students who are passionate and would like to explore more about mathematics can opt for MATH2101 Linear algebra I and MATH2211 Multivariable calculus in replacement of MATH2012 and MATH2014.*

Introductory Disciplinary Core Courses
Year 2
COMP2119 Introduction to data structures and algorithms (6 credits)
COMP2501 Introduction to data science (6 credits)
SDST2601 Probability and statistics I (6 credits)
SDST2602 Probability and statistics II (6 credits)

Advanced Disciplinary Core Courses
Year 3 to 5
COMP3270 Introduction to artificial intelligence (6 credits)
COMP3278 Introduction to database management systems (6 credits)
COMP3312 Law and ethics in data science (6 credits)
COMP3314 Introduction to machine learning (6 credits)
COMP3340 Introduction to deep learning (6 credits)

Capstone Experience & Internship
Year 3 to 4
COMP3512 Internship (6 credits)
COMP3522 Real-life AI and data science (6 credits)

Year 5
COMP4503 AI and data science in humanity project (6 credits)

Disciplinary Elective Courses
Year 3 to 5
Students are required to complete 36 credits of the following disciplinary elective courses offered by School of Computing and Data Science in Year 3 to 5:
COMP3160 Web3.0 for Social Impact: An Innovative and Experiential Venture (6 Credits)
COMP3317 Introduction to computer vision (6 credits)
COMP3323 / Advanced database systems /
FITE3010 Big data and data mining (6 credits)
COMP3353 Bioinformatics (6 credits)
COMP3355 Cyber security (6 credits)
COMP3361 Natural language processing (6 credits)
COMP3362 Hands-on AI: experimentation and applications (6 credits)
COMP3407 Scientific computing (6 credits)
COMP3413 Research internship (6 credits)
COMP3513 Big data systems (6 credits)
COMP3516 Data analytics for IoT (6 credits)
COMP3520 Special topics in data science (6 credits)
COMP3521 / Visualization for data analytics /
SDST3622 Data Visualization (6 credits)
COMP3523 Security and privacy in artificial intelligence (6 credits)
COMP3524 Web intelligence (6 credits)
COMP4510 Principles of machine learning (6 credits)
COMP4511 Principles of deep learning (6 credits)
COMP4512 Advanced computer vision (6 credits)
FITE2010 Distributed ledger and blockchain (6 credits)
SDST3600 Linear statistical analysis (6 credits)
SDST3612 Statistical machine learning (6 credits)
SDST3621 Statistical data analysis (6 credits)
SDST4601 Time-series analysis (6 credits)
SDST4602 Multivariate data analysis (6 credits)

Common Core Courses (24 credits)

Candidates are required to complete 24 credits from different Areas of Inquiry in the Common Core Curriculum within the first three years of studies.

Artificial Intelligence Literacy (6 credits)

- "AILT1001. Artificial Intelligence Literacy I" (3 credits) in Year 1
- Another AILT course (3 credits) to be taken in Year 2

Language Enhancement Courses (12 credits)

- "CAES1001. Academic Communication in English" (0 credit) in <u>Year 1</u>

- Take *one* of the following "English in the Discipline" courses (6 credits) in <u>Year 2</u>:
  CAES9201.   Academic English: Countries and Cultures
  CAES9202.   Academic English: Literary Studies
  CAES9203.   Academic English: Philosophy and the History of Ideas
  CAES9204.   Academic English: History
  CAES9205.   Academic English: Language Studies
  CAES9206.   Academic English: Creative and Visual Arts
  <div align="center">OR</div>
  CAES9542.   Technical English for Computer Science <u>in Year 4 or Year 5</u>

- Take *one* of the following Chinese language enhancement courses (6 credits) in <u>Year 3</u>:
  {CART9001.   Practical Chinese for Arts Students; or
   the "Practical Chinese" course for Computing and Data Science Students}
  CUND9001.   Basic Spoken and Written Cantonese for Mandarin Speakers
  CUND9002.   Practical Chinese and Hong Kong society
  CUND9003.   Cantonese for non-Cantonese Speaking Students
  CUND9004.   Practical Applied Chinese Writing and Effective Presentation Skills for Non-
          local Mandarin Speaking Students
  Note: CUND9XXX courses are for Putonghua-speaking students only.

Free electives (36 credits)

Candidates are required to complete 36 credits of free electives in Year 1 to 5. Free electives are courses offered by the Faculty of Arts, School of Computing and Data Science and other teaching units of the University, except the Common Core curriculum. It is optional for candidates to pursue a minor, which can be offered by the Faculty of Arts, School of Computing and Data Science or other teaching units.

Notes:
1. A course cannot be counted towards more than one requirement relating to a major and/or a minor. Suitable Arts courses will be counted as "AIH Humanities electives" to fulfil the requirements of "Major in Artificial Intelligence and Humanity" by default. Hence, if students wish to declare an Arts minor during their degree studies, they may be required to take extra courses from the Programme concerned.

2. Candidates may be required to take additional course(s) to fulfil the pre-requisite(s) or co-requisite(s) of an AIH Humanities elective or a free elective. Please refer to the relevant Programme's syllabuses for course descriptions and enrollment conditions.

3. Candidates shall normally complete 60 credits in an academic year. The normal study load of Semester 1 and that of Semester 2 is 30 credits. Candidates may opt to take 36 credits in these semesters without seeking approval from the Board of Studies.

4. Candidates who opt out of the BA programme before the end of the second semester of the Second Year will be required to complete 12 more credits of Common Core courses, CAES9542 (6 credits) and the "Practical Chinese" course for Computing and Data Science students to fulfill the University requirements for the BEng(AI&DataSc) degree as prescribed in the BEng(AI&DataSc) regulations according to their respective admissions years. Regarding the Common Core requirement, they will be required to complete at least 6 credits from each AoI in total.

COURSE DESCRIPTIONS

Not all courses are offered every semester or annually. Please check with the teaching units for their course offering around August.

Major in Artificial Intelligence and Humanity – Compulsory courses

AIHU1001.   Foundations of AI and humanity (6 credits)

Foundations of AI and Humanity is an interdisciplinary course that explores how the integration of artificial intelligence and humanistic inquiry can lead to new insights, innovations, and critical understandings. The course focuses on how scholars and practitioners have successfully bridged AI with the humanities to create meaningful and beneficial applications. Students will learn about interdisciplinary collaborations between technologists and humanists that have led to significant, disruptive, and yet responsible advancements. The course prepares students to contribute thoughtfully and innovatively to the ongoing dialogue between AI and the humanities, equipping them with the skills to collaborate across disciplines, and design and deploy AI in ways that enrich society and the human experience.
Assessment: 100% coursework.

AIHU1002.   Ethics, society and law of Artificial Intelligence (6 credits)

Ethics, Society, and Law of AI is an interdisciplinary course that critically examines the ethical, societal, and legal challenges posed by the rapid development and deployment of artificial intelligence. The course provides students with the tools to analyze and address key issues such as fairness, accountability, transparency, privacy, and the societal impact of AI. Students will explore how AI can perpetuate or mitigate social inequalities, the ethical dilemmas inherent in AI decision-making, and the potential for AI to challenge traditional legal frameworks. The course covers foundational ethical theories and principles, applying them to contemporary AI dilemmas and design challenges. In addition, students will critically assess how AI technologies are transforming social structures, influencing public policy, and reshaping notions of privacy and individual rights. The course also explores the global dimensions of AI governance, considering how different cultural, political, and economic contexts influence the development and regulation of AI.
Assessment: 100% coursework.

AIHU2001.   Human and machine cognition (6 credits)

Human and Machine Cognition is an interdisciplinary course that explores the similarities and differences between human cognitive processes and machine-based cognition. As artificial intelligence systems increasingly emulate aspects of human thought, understanding how these systems compare to human cognitive abilities is crucial for both technical and ethical considerations. The course offers an in-depth examination of cognitive theories from psychology, neuroscience, and philosophy, and compares them with the principles underlying machine learning, neural networks, and other AI models. Students will explore key topics such as perception, learning, memory, reasoning, language, and decision-making, analyzing how both humans and machines perform these functions. The course also delves into the philosophical implications of machine cognition, including debates about consciousness, free will, and the nature of intelligence. Students will engage with thought experiments and case studies that challenge the boundaries between human and machine cognition. A further focus of the course is the interplay between human and machine cognition in collaborative environments. Students will explore how AI can augment human cognitive abilities, leading to new forms of human-machine interaction and intelligence.

Assessment: 100% coursework.

AIHU2002.   Modelling, assessment, and benchmarking (6 credits)

Modelling, Assessment, and Benchmarking is a comprehensive course that delves into the core methodologies and practices used in the development, evaluation, and comparison of artificial intelligence systems. As AI technologies continue to advance, the ability to accurately model complex systems, assess their performance, and benchmark them against industry and safety standards, ethical and legal guidelines, and user/societal needs is increasingly vital. The course provides students with the theoretical foundations and practical tools needed to assess the effectiveness, and benchmark the performance of AI models in various contexts. The course will also explore the challenges and limitations of evaluation and benchmarking, including issues related to the evolving nature of AI capabilities, alignment, and the complexity of socio-technical systems. Students will investigate how the choice of benchmarks and evaluation metrics can influence the development of AI systems andpotentially leadito unintended consequences. The course encourages a critical examination of how assessment and benchmarking practices can be aligned with broader societal and ethical goals.
Assessment: 100% coursework.

AIHU2003.   Creativity and generative AI (6 credits)

The Creativity and Generative AI course is an interdisciplinary course that explores the intersection of artificial intelligence and human creativity, focusing on the capabilities and implications of generative AI systems. As AI technologies increasingly contribute to creative processes in fields such as art, music, literature, and design, understanding how these systems operate, and their impact on human creativity, is essential. This course provides students with a comprehensive understanding of generative AI. Students will explore the technical foundations of these systems, how design of their design can be modulated, while critically examining their role in the production of creative works and creative practice. The course will also delve into the collaborative potential of generative AI, examining how these systems can augment human creativity and serve as co-creators in artistic and design processes. In addition to technical and creative exploration, the course addresses the philosophical, legal, and ethical questions raised by generative AI. Students will discuss issues such as authorship, originality, and the nature of creativity in the context of AI-generated works. What does it mean for a machine to create? How does the use of AI in creative fields challenge traditional notions of artistic expression and intellectual property? Students will examine the broader cultural and societal implications of generative AI, considering how these technologies are reshaping industries, influencing cultural production, and impacting the way we perceive creativity. The course will highlight real-world applications of generative AI in various creative domains, from AI-generated literature and visual art to AI-assisted music composition and architectural design.
Assessment: 100% coursework.

AIHU3001.   Advanced topics in AI and humanity (6 credits)

Advanced Topics in AI and Humanity is an interdisciplinary course designed to explore cutting-edge issues at the intersection of artificial intelligence and humanities. The course offers students the opportunity to delve into emerging topics and complex challenges that arise as AI continues to shape and be shaped by human society, culture, and values.
Each iteration of the course will focus on a selection of advanced topics that reflect the latest developments in AI research. The course is designed to be responsive to new trends and debates, allowing students to engage with the most relevant and pressing issues of the time.
Assessment: 100% coursework.

AIHU4001.   Research project in AI and humanity (Capstone Experience) (6 credits)

The Research Project in AI and Humanity (Capstone Experience) offers students the opportunity to apply their interdisciplinary knowledge to an original research project that explores the intersection of artificial intelligence and the humanities. This capstone course is designed to allow students to synthesize the concepts, theories, and methodologies they have learned throughout the programme and to contribute meaningfully to the ongoing dialogue between AI and humanistic inquiry.

In this course, students will identify a specific research question or challenge that lies at the crossroads of AI and one or more humanities disciplines. They will then design and execute a research project that rigorously investigates this question, employing a combination of qualitative and/or quantitative research methods as appropriate to their topic. By completing this course, students will have demonstrated their ability to conduct independent, interdisciplinary research that bridges the gap between AI and the humanities. They will emerge from the program with a Capstone research experience that showcases their intellectual capabilities and readiness to contribute to academic, professional, or creative endeavours in the rapidly evolving field of AI and humanity.

Assessment: 100% coursework.

Major in Artificial Intelligence and Humanity – Humanities electives

Please find the course descriptions and enrollment conditions of the eligible courses on the BA syllabuses (https://arts.hku.hk/current-students/undergraduate/BA/regulations-syllabuses).

Professional Core in Artificial Intelligence and Data Science

Foundation Courses

COMP1110.   Computing and data science in everyday life (6 credits)

In this course, students will dive into the dynamic world of computing and data science, focusing on real-world problem-solving skills. The course will explore the latest advancements and innovations in computing, big data analytics and artificial intelligence technologies, and examine how they shape our daily lives. Students will also recognize the challenges and opportunities faced by computing and data science professionals. Through hands-on projects and teamwork, students will gain firsthand experience in creating data-driven solutions to solve practical challenges in computing and data science.

Assessment: 100% continuous assessment

COMP1117.   Computer programming (6 credits)

This is an introductory course in computer programming. Students will acquire basic Python programming skills, including syntax, identifiers, control statements, functions, recursions, strings, lists, dictionaries, tuples and files. Searching and sorting algorithms, such as sequential search, binary search, bubble sort, insertion sort and selection sort, will also be covered.

Mutually exclusive with: ENGG1111 or ENGG1330 or IIMT2602

Assessment: 50% continuous assessment, 50% examination

COMP2113.   Programming technologies (6 credits)

This course covers intermediate to advanced computer programming topics on various technologies and tools that are useful for software development. Topics include Linux shell commands, shell scripts, C/C++ programming, and separate compilation techniques and version control. This is a self-learning course; there will be no lecture and students will be provided with self-study materials. Students are required to complete milestone-based self-assessment tasks during the course. This course is designed for students who are interested in Computer Science / Computer Engineering.
Prerequisite: COMP1117 or ENGG1330
Mutually exclusive with: ENGG1340 or COMP2123
Assessment: 60% continuous assessment, 40% examination

Please find the course descriptions and enrollment conditions of the listed MATH courses on https://webapp.science.hku.hk/sr4/servlet/enquiry?frmid=MenuC (enter "MATH" on the "Course Code" field).

Introductory Disciplinary Core Courses

COMP2119.   Introduction to data structures and algorithms (6 credits)

Arrays, linked lists, trees and graphs; stacks and queues; symbol tables; priority queues, balanced trees; sorting algorithms; complexity analysis.
Prerequisite: COMP2113 or COMP2123 or ENGG1340
Mutually exclusive with: COMP2118
Assessment: 40% continuous assessment, 60% examination

COMP2501.   Introduction to data science (6 credits)

The course introduces basic concepts and methodology of data science. The goal of this course is to provide students with an overview and practical experience of the entire data analysis process. Topics include: data source and data acquisition, data preparation and manipulation, exploratory data analysis, statistical and predictive analysis, data visualization and communication.
Prerequisite: COMP1117 or ENGG1330
Mutually exclusive with: SDST1005 or SDST1015 or SDST1016 or SDST1018
Assessment: 50% continuous assessment, 50% examination

SDST2601.   Probability and statistics I (6 credits)

The discipline of statistics is concerned with situations in which uncertainty and variability play an essential role and forms an important descriptive and analytical tool in many practical problems. Against a background of motivating problems this course develops relevant probability models for the description of such uncertainty and variability.
Prerequisite/Co-requisite: MATH2014, or (MATH2101 and MATH2211)
Mutually exclusive with: ELEC2844 or MATH3603 or SDST1603 or SDST2901
Assessment: 40% continuous assessment, 60% examination

SDST2602.   Probability and statistics II (6 credits)

This course builds on SDST2601, introducing further the concepts and methods of statistics. Emphasis is on the two major areas of statistical analysis: estimation and hypothesis testing. Through the disciplines of statistical modelling, inference and decision making, students will be equipped with both quantitative skills and qualitative perceptions essential for making rigorous statistical analysis of real-life data.
Prerequisite: SDST2601
Mutually exclusive with: SDST3902
Assessment: 40% continuous assessment, 60% examination

Advanced Disciplinary Core Courses

COMP3270.   Introduction to Artificial intelligence (6 credits)

This course provides an introduction to the fundamental concepts and techniques of artificial intelligence (AI). Students will learn about intelligent agents, problem solving, uncertain knowledge, and logical agents. The course combines theoretical foundations with practical applications to equip students with the tools needed to understand and develop intelligent systems.
Prerequisite: COMP2119 or COMP2118 or FITE2000 or COMP2502
Mutually exclusive with: ELEC4544 or IIMT3688
Assessment: 50% continuous assessment, 50% examination

COMP3278.   Introduction to database management systems (6 credits)

This course studies the principles, design, administration, and implementation of database management systems. Topics include: entity-relationship model, relational model, relational algebra, database design and normalization, database query languages, indexing schemes, integrity and concurrency control.
Prerequisite: COMP2119 or COMP2118 or COMP2502 or ELEC2543 or FITE2000
Mutually exclusive with: IIMT3601
Assessment: 50% continuous assessment, 50% examination

COMP3312.   Law and ethics in data science (6 credits)

The primary objective of this course is to explore the legal and ethical challenges and ramifications in the modern practice of data science. Using a case-based approach, students will analyse contemporary controversies from a techno-legal and ethical perspectives. The focuses are data privacy and the regulation of using data in specific areas of law. Topics include basic privacy protection techniques, such as encryption and data anonymization data privacy laws, open data policy, data protection process and technology, issues in the usage of sensitive personal data and public data.
Assessment: 100% continuous assessment

COMP3314.   Introduction to machine learning (6 credits)

This course introduces basic concepts, algorithms, practices, tools, and applications of machine learning. Topics include classical methods in supervised learning (classification and regression), such as perceptrons, linear regression, decision trees, logistic regression, support vector machines, and KNN; classical methods in unsupervised learning, such as K-means clustering and principal component analysis; common practices in data pre-processing, feature selection, hyper-parameter tuning, and model evaluation; tools/libraries/APIs such as scikit-learn and multi/many-core CPU/GPU programming; applications such as flower species prediction, tumor cell classification, and handwritten

digit recognition.

Prerequisites: MATH1853 or MATH2014 or MATH1013; and COMP2119 or COMP2118 or COMP2502 or ELEC2543 or FITE2000

Assessment: 50% continuous assessment, 50% examination

COMP3340.   Introduction to deep learning (6 credits)

This course provides practical skills and foundational knowledge in deep learning, emphasizing hands-on experience and computational principles. Students will explore key models, including Convolutional Neural Networks (CNNs), Transformer Networks, Generative Adversarial Networks (GANs), and Diffusion Models. They will apply these models to real-world challenges like object detection, language tasks, and reinforcement learning. The course also covers cutting-edge applications, such as autonomous driving and AI in scientific research. By working directly with source code, students will understand model implementation and optimization deeply. The course culminates in a project where students apply their skills to a practical problem, showcasing their ability to utilize deep learning technologies.

Prerequisites: COMP2119 or COMP2118 or COMP2502 or ELEC2543 or FITE2000; and MATH1853 or MATH2014 or MATH1013

Mutually exclusive with: ELEC4544

Assessment: 50% continuous assessment, 50% examination

Capstone Experience & Internship

COMP3512.   Internship (6 credit)

The course consists of two components: internship and professionalism. Internship requires students to spend a minimum of four weeks employed, full-time, as IT interns or trainees. During this period, they are engaged in work of direct relevance to their programme of study. The Internship provides students with practical, real-world experience and represents a valuable complement to their academic training. Professionalism exposes students to social and professional issues in computing. Students need to understand their professional roles when working as data science professionals as well as the responsibility that they will bear. They also need to develop the ability to ask serious questions about the social impact of data science and engineering and to evaluate proposed answers to those questions. Topics include: intellectual property, privacy, social context of computing, risks, safety and security concerns for data science professionals, professional and ethical responsibilities, and continuing professional development.

Assessment: 100% continuous assessment

COMP3522.   Real-life AI and data science (6 credits)

In this course, students will learn data science step by step through real analytics example: data mining, modelling, tableau visualization and more. Unlike many classes where everything works just the way it should and the training is smooth sailing, this course will give students a data science odyssey through experiencing the pains a data scientist goes through on a daily basis. Corrupt data, anomalies, irregularities, etc. Upon completing this course, the students will enhance their data wrangling skills and learn how to 1) model their data, 2) curve-fit their data, and 3) how to communicate their findings. The students will develop a good understanding of Tableau, SQL, SSIS, and Gretl that give them a safe ride in data lakes. With no final exam, the students will be given practical exercises that prepare them to be at the helm for real-world challenges.

Prerequisite: ENGG1330 or COMP1117

Assessment: 100% continuous assessment

COMP4503.   AI and data science in humanity project (6 credits)

Students will work on a capstone project which is on data science in the context of humanity. Students are required to identify a data-intensive problem within the realm of humanity, and to implement a data-driven solution for the problem. Students will undergo a complete data science project life cycle, from problem understanding, data collection, data exploration to data modelling, analysis and interpretation, and finally deliver a data science solution.
Mutually exclusive with: COMP4501, COMP4502
Assessment: 100% continuous assessment

Disciplinary Elective Courses

Please find the course descriptions and enrollment conditions of the eligible disciplinary electives on the BEng(AI&DataSc) syllabuses (click the syllabuses of BEng(AI&DataSc) on "Programme Syllabuses" section of https://www.cds.hku.hk/prospective-students/undergraduate/6999-computing-and-data-science/).

Artificial Intelligence Literacy Course

AILT1001.   Artificial Intelligence Literacy I (3 credits) [pending approval]

Artificial Intelligence (AI) literacy is essential for navigating our modern society effectively and responsibly. This course provides students with the skills and knowledge needed to understand AI concepts, interact with AI systems, and critically evaluate their impact. Through lectures, online learning activities and a practical project, students will explore the ethical, social, and technological dimensions of AI, preparing them to make informed decisions in a world that is increasingly AI-driven.
Assessment: 100% coursework.

English Language Enhancement Courses

CAES1001.   Academic Communication in English (0 credit)

The course is designed to equip first-year undergraduate students with a solid foundation in academic English literacy to succeed in their university studies. The course is dedicated to nurturing students' competencies in an English-medium university environment and fostering their confidence in effective oral, written, and visual communication. This is achieved by cultivating students' critical reading skills, information literacy skills, and digital literacy skills for academic English learning. The course also provides students with a comprehensive understanding of academic rhetoric across different mediums, including written, spoken, and visual tasks. By familiarizing students with the key genres and communication conventions in university education, the course empowers students to apply the acquired knowledge and skills to Common Core Courses.
Assessment: 100% coursework.

English-in-the-Discipline (ED) Courses

Please find the course descriptions and enrollment conditions of CAES92xx and CAES9542 on https://caes.hku.hk/courses/ugc/.

Chinese Language Enhancement Courses

Students are required to successfully complete the 6-credit Chinese language enhancement course, i.e. CART9001 or the "Practical Chinese" course for Computing and Data Science Students, for graduation, except for

(a) Non-local Putonghua/Mandarin-speaking candidates who should take one of the CUND9XXX courses; and

(b) Students who did not study Chinese language during their secondary education and have not reached the required proficiency level for the Chinese language enhancement course should seek approval from the Board of the Studies for exemption from the Chinese language enhancement requirement, and take a course in either Chinese language or Chinese culture (CHIN95xx) offered by the Chinese Language Centre of the School of Chinese in lieu.

Please find the course descriptions and enrollment conditions of Chinese language enhancement courses on https://www.clep.hku.hk/coursedetail and that of CHIN95xx on https://clc.hku.hk/courses.