GRADUATE CERTIFICATE IN ETHICAL ARTIFICIAL INTELLIGENCE

Purpose

The Certificate in Ethical Artificial Intelligence (AI) is designed to offer professionals and graduate students the opportunity to acquire a deeper grasp of the ethical, legal, and policy issues and implications of developments in artificial intelligence, addressing areas of impact including pharmaceutical and healthcare research and distribution, business application practices in data and finance, law enforcement, live and social media, information and news development and filtering, autonomous transportation (including automobiles and mass transit), the availability and distribution of government services, and other sectors in society. The program consists of three courses and a short research report on a specific application of ethical issues to AI. The award of the certificate means the holder has completed the required courses and research project at an acceptable level of academic accomplishment. The certificate indicates to potential employers and to other academic programs that the holder has achieved a foundation in the basic principles of artificial intelligence, the latest developments in AI, and their ethical implications for society.

Admissions Requirements and Procedure

Selection for admission to the program will be based on applicants' academic background, work experience, and personal recommendations. We have two distinctive admissions procedures: one for matriculated graduate students at SF State and another for area professionals and non-SF State students who have completed a minimum of a Bachelor's degree from an accredited university or college with a 3.0 GPA or better.

A continuing SF State graduate student wishing to be admitted to a graduate certificate program at San Francisco State University is expected to follow the University requirements and procedures outlined herein. Such requirements and procedures may include a supplementary application, a defined set of prerequisite courses, a designated GPA, written recommendations, etc., as may be appropriate for the program in question. **To start the admission process please compete the form Certificate Admissions Application for Continuing SF State Graduate Students (https://powerforms.docusign.net/b79b4024-2cad-4b1e-bc17-b5f4d844d8fa/?env=na3&acct=223bf8e1-bc14-478b-8607-15b5be78981f&accountId=223bf8e1-bc14-478b-8607-15b5be78981f) and sign it with DocuSign application. Student will be then be contacted by graduate office and/or designated advisor.**

For non-matriculated SF State students, the certificate is available through application to CalState Apply (https://www.calstate.edu/apply/) for any student applicant who is eligible to take the required courses and has earned a Bachelor's degree.

Program Learning Outcomes

1. Students will understand the basic principles and technologies of AI and related issues of privacy, security, and transparency.

2. Students will understand how to balance ethics with business needs and apply ethical automated decision-making in various business areas.

3. Students will understand the ways to enforce ethical standards and compliance with laws and rules related to the ethical use of AI.

4. Students will understand the significance of ethical AI for society.

5. Students will be able to analyze and apply knowledge of ethical AI in the form of a case study.

Certificate in Ethical Artificial Intelligence – 10 units

Students must take one course of 3 or more units in each of three areas: (1) AI Technologies and Applications, (2) Business Ethics and Regulatory Compliance, and (3) Ethical Principles.

In addition, students must write one 10-page single-spaced research paper. This paper will ensure that students apply the knowledge they obtained by engaging in a case study type of analysis at the intersection of artificial intelligence, technology, and ethics. The paper will be evaluated by one of the faculty members in charge of the certificate program, selected to match the technical and educational background of each student.

AI Technologies and Applications (3 units)

Select one in consultation with an Ethical AI Certificate advisor:

Code	Title	Units
CSC 859	AI Explainability and Ethics	3
CSC 869	Data Mining	3
CSC 872	Pattern Analysis and Machine Intelligence	3

Business Ethics and Regulatory Compliance (3 units)

Code	Title	Units
MGMT 850	Ethics and Compliance in Business	3

Ethical Principles (3 units)

Code	Title	Units
PHIL 827	Philosophy and Current Applications of Artificial Intelligence	3
PHIL 828	Philosophical Issues in Artificial Intelligence	3

Research and Reflection Paper (1 unit)

Select one:

Code	Title	Units
CSC 899	Independent Study	1
MGMT 899	Independent Study	1
PHIL 899	Independent Study	1