Tamkang University Academic Year 114, 1st Semester Course Syllabus

Course Title	CLOUD SECURITY	Instructor	YANG, PO-HUNG
Course Class	TEIBM1A MASTER'S PROGRAM, DEPARTMENT OF COMPUTER SCIENCE AND INFORMATION ENGINEERING (ENGLISH-TAUGHT PROGRAM), 1A	Details	◆ General Course ◆ Selective ◆ One Semester ◆ 2 Credits
Relevance to SDGs	SDG4 Quality education		

Departmental Aim of Education

Ⅰ. Cultivate the ability to conduct independent research and problem solving.

Ⅱ. Strengthen creativity and research capacity.

Ⅲ. Build profound professional knowledge in computer science and information engineering.

Ⅳ. Engage in self-directed lifelong learning.

Subject Departmental core competences

A. Independent problem solving ability.(ratio:10.00)

B. Independent innovative thinking ability.(ratio:20.00)

C. Research paper writing and presentation ability.(ratio:15.00)

D. Research & development (R&D) ability in information engineering.(ratio:20.00)

E. Project execution and control ability.(ratio:20.00)

F. Lifelong self-directed learning ability.(ratio:15.00)

Subject Schoolwide essential virtues

1. A global perspective. (ratio:10.00)

2. Information literacy. (ratio:20.00)

3. A vision for the future. (ratio:10.00)

4. Moral integrity. (ratio:20.00)

5. Independent thinking. (ratio:10.00)

6. A cheerful attitude and healthy lifestyle. (ratio:10.00)

7. A spirit of teamwork and dedication. (ratio:15.00)

8. A sense of aesthetic appreciation. (ratio:5.00)

Course Introduction	This course introduces cloud security by integrating fundamental concepts with practical applications. It begins with core principles of information security, which lay the groundwork for understanding cloud-specific concerns. The course covers key cloud computing topics, including service categories (IaaS, PaaS, SaaS), deployment models, and major security concerns. A project presentation encourages students to actively participate and helps develop their ability for self-directed learning.

The correspondences between the course's instructional objectives and the cognitive, affective, and psychomotor objectives.

Differentiate the various objective methods among the cognitive, affective and psychomotor domains of the course's instructional objectives.

I. Cognitive : Emphasis upon the study of various kinds of knowledge in the cognition of the course's veracity, conception, procedures, outcomes, etc.
II.Affective : Emphasis upon the study of various kinds of knowledge in the course's appeal, morals, attitude, conviction, values, etc.
III.Psychomotor: Emphasis upon the study of the course's physical activity and technical manipulation.

No.	Teaching Objectives	objective methods
1	Students will learn the common service categories of cloud computing.	Cognitive
2	Student will learn the required knowledge in the area of cloud security.	Cognitive
3	Students will learn the basic information security concepts.	Cognitive

The correspondences of teaching objectives : core competences, essential virtues, teaching methods, and assessment

No.	Core Competences	Essential Virtues	Teaching Methods	Assessment
1	ABCDEF	12345678	Lecture, Discussion	Discussion(including classroom and online), Report(including oral and written)
2	ABCDEF	12345678	Lecture, Discussion	Discussion(including classroom and online), Report(including oral and written)
3	ABCDEF	12345678	Lecture, Discussion	Discussion(including classroom and online), Report(including oral and written)

Course Schedule			
Week	Date	Course Contents	Note
1	114/09/15 ~ 114/09/21	Course introducation	
2	114/09/22 ~ 114/09/28	The basic concepts of information security	
3	114/09/29 ~ 114/10/05	The basic concepts of information security	
4	114/10/06 ~ 114/10/12	The basic concepts of information security	
5	114/10/13 ~ 114/10/19	Cloud concepts, architecture, and design	
6	114/10/20 ~ 114/10/26	Security concepts relevant to cloud computing	
7	114/10/27 ~ 114/11/02	Cloud data security	
8	114/11/03 ~ 114/11/09	Cloud data security	
9	114/11/10 ~ 114/11/16	Midterm presentation	
10	114/11/17 ~ 114/11/23	Cloud platform and infrastructure security	
11	114/11/24 ~ 114/11/30	Cloud platform and infrastructure security	
12	114/12/01 ~ 114/12/07	Cloud application security	
13	114/12/08 ~ 114/12/14	Cloud application security	
14	114/12/15 ~ 114/12/21	Cloud security operations	
15	114/12/22 ~ 114/12/28	Constitution Day of the Republic of China (No class)	
16	114/12/29 ~ 115/01/04	Founding Day of the Republic of China (No class)	
17	115/01/05 ~ 115/01/11	Final presentation	
18	115/01/12 ~ 115/01/18	Final presentation	
Key capabilities		self-directed learning Problem solving	
Interdisciplinary			

Distinctive teaching	
Course Content	Logical Thinking
Requirement	1. Presentation schedules and groupings will be determined based on the number of participants. 2. Presentation topics include, but are not limited to, cloud computing techniques, information security in cloud environments, cloud applications, and other topics specifically related to cloud computing or cloud security. 3. In the midterm presentation (Week 9), please present an overview of your selected topic. The overview should include a title, a brief introduction, and the expected results or findings. 4. For the final presentation (Weeks 17–18), you should prepare well-organized slides and clearly explain the motivation, details, and results or findings of your selected topic to the audience. 5. Midterm and final presentation slides must be submitted at least one week before the presentation. Failure to comply will result in a 10-point deduction from the presentation score. 6. All group members must attend the presentation, except in cases of unavoidable circumstances. Any unexcused absence will result in a score of zero. A leave request must be supported by valid documentation, and the absent member’ s score will be subject to a 10% deduction from the group’ s presentation score.
Textbooks and Teaching Materials	Self-made teaching materials:Presentations Name of teaching materials: 1. Arthur J. Deane, CCSP for Dummies, 2nd Edition, John Wiley & Sons, Inc, 2024 2. L. Fife, A. Kraus, and B. Lewis, Certified Cloud Security Professional, Third Edition, John Wiley & Sons, Inc, 2021.
References	1. Arthur J. Deane, CCSP for Dummies, 2nd Edition, John Wiley & Sons, Inc, 2024. 2. L. Fife, A. Kraus, and B. Lewis, Certified Cloud Security Professional, Third Edition, John Wiley & Sons, Inc, 2021.
Grading Policy	◆ Attendance： 20.0 % ◆ Mark of Usual： % ◆ Midterm Exam： 35.0 % ◆ Final Exam： 45.0 % ◆ Other〈 〉： %
Note	This syllabus may be uploaded at the website of Course Syllabus Management System at https://web2.ais.tku.edu.tw/csp or through the link of Course Syllabus Upload posted on the home page of TKU Office of Academic Affairs at http://www.acad.tku.edu.tw/CS/main.php. ※"Adhere to the concept of intellectual property rights" and "Do not illegally photocopy, download, or distribute." Using original textbooks is advised. It is a crime to improperly photocopy others’ publications.