Tamkang University Academic Year 113, 2nd Semester Course Syllabus

Course Title	GERONTECHNOLOGY	Instructor	LIANG, YUAN-LIN
Course Class	TZIBM1A MASTER'S PROGRAM, DIVISION OF GERONTECHNOLOGY, GRADUATE INSTITUTE OF INTELLIGENT HEALTHCARE INDUSTRY, 1A	Details	◆ General Course ◆ Required ◆ One Semester ◆ 3 Credits
Relevance to SDGs	SDG3 Good health and well-being for people SDG4 Quality education SDG9 Industry, Innovation, and Infrastructure SDG11 Sustainable cities and communities		

Departmental Aim of Education

Ⅰ. Development of problem solving capacity.

Ⅱ. Development of reserch and innovation capacity.

Ⅲ. Enhancement of cross-disciplinary capactiy.

Ⅳ. Development of lifelong self learning capacity.

Subject Departmental core competences

A. Capacity of problem solving.(ratio:10.00)

B. Capacity of senior health managemnt.(ratio:15.00)

C. Capacity of Healthcare Industry Management.(ratio:15.00)

D. Analytical capacity of health informatics.(ratio:15.00)

E. Capacity of research and innovation.(ratio:15.00)

F. Capacity of Scientific Paper Writing.(ratio:10.00)

G. Capacity of lifelong self learning.(ratio:5.00)

H. Creative Capacity.(ratio:15.00)

Subject Schoolwide essential virtues

1. A global perspective. (ratio:10.00)

2. Information literacy. (ratio:15.00)

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

4. Moral integrity. (ratio:5.00)

5. Independent thinking. (ratio:15.00)

6. A cheerful attitude and healthy lifestyle. (ratio:20.00)

7. A spirit of teamwork and dedication. (ratio:10.00)

8. A sense of aesthetic appreciation. (ratio:15.00)

Course Introduction	This course explores the intersection of aging and technology, focusing on how innovative solutions can enhance the quality of life for older adults. Students will learn about the role of technology in aging, and the design and application of gerontechnology.

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	Assess existing and emerging technologies for their usability, accessibility, and effectiveness in meeting the needs of older adults.	Cognitive
2	Incorporate universal design and user-centered design principles to create inclusive technology solutions.	Affective
3	Develop innovative technological solutions to enhance the well-being of elders.	Psychomotor

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

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

Course Schedule			
Week	Date	Course Contents	Note
1	114/02/17 ~ 114/02/23	Introduction to Gerontechnology	
2	114/02/24 ~ 114/03/02	Understanding Aging	
3	114/03/03 ~ 114/03/09	The Role of Technology in Aging	
4	114/03/10 ~ 114/03/16	Universal Design Principles	
5	114/03/17 ~ 114/03/23	Digital Literacy Among Older Adults	
6	114/03/24 ~ 114/03/30	Health Monitoring and Telehealth	
7	114/03/31 ~ 114/04/06	Social Connection Technologies	
8	114/04/07 ~ 114/04/13	Robotics in Gerontology	
9	114/04/14 ~ 114/04/20	Midterm	
10	114/04/21 ~ 114/04/27	Cognitive Support Technologies	
11	114/04/28 ~ 114/05/04	Ethical Considerations in Gerontechnology	
12	114/05/05 ~ 114/05/11	Smart Cities	
13	114/05/12 ~ 114/05/18	Financial Technologies	
14	114/05/19 ~ 114/05/25	Entertainment and Leisure Technologies	
15	114/05/26 ~ 114/06/01	Policy and Advocacy in Gerontechnology	
16	114/06/02 ~ 114/06/08	Future Trends in Gerontechnology	
17	114/06/09 ~ 114/06/15	Final-term	
18	114/06/16 ~ 114/06/22	Course Wrap-Up	
Key capabilities		Information Technology	
Interdisciplinary		Competency-based education 'competency exploration' sustained competency or global issues STEEP (Society, Technology, Economy, Environment, and Politics)	

Distinctive teaching	Project implementation course
Course Content	Logical Thinking AI application
Requirement	
Textbooks and Teaching Materials	Self-made teaching materials:Presentations Using teaching materials from other writers:Textbooks, Presentations
References	
Grading Policy	◆ Attendance： 20.0 % ◆ Mark of Usual：20.0 % ◆ Midterm Exam： 30.0 % ◆ Final Exam： 30.0 % ◆ Other〈 〉： %
Note	This syllabus may be uploaded at the website of Course Syllabus Management System at http://info.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 . **※ Unauthorized photocopying is illegal. Using original textbooks is advised. It is a crime to improperly photocopy others' publications.**