Course Title: Planet B - Simulation Gamification on Systemic Decision Making in Global Sustainability Actions (SDG based)

Course form	Workshop - Gamification
Study type	Undergraduate (Bachelor level)
Module responsible	Prof. Dr. Siegfried Zürn, siegfried.zuern@hs-esslingen.de
Language	English
Turnus	On request
Recommended	English level B2
prerequisites	
Course description	Areas of expertise
	 Gaining professional competence through practical training about the intercorrelations of SDGs and the necessity to think and act in a systems perspective to achieve improvements in sustainability on local, regional and global level. Methodological competence by integrating sustainability
	aspects into political decision making processes
	<u>Learning outcomes</u>
	The focus is on developing an understanding of systems, thinking in interrelationships and promoting decision-making skills based on the method of Systems Thinking. Students will understand the complexity of sustainability aspects and their interactions. They will be able to change perspectives on a global level and learn to work across disciplines to achieve results even within a system of conflicting individual goals.
	Content
	 Theory/ Introduction Introduction to the SDG system (Varied) global approaches to sustainability Systems Thinking methodology Simulation Game Workshop
	3. Debriefing and Self-reflection
Assessment type	Study assignment, contribution during the gamification and debriefing, self-reflection (written)
Credit hours	2
Credits	2
Literature	Arnold, R. D., & Wade, J. P. (2015). A definition of systems thinking: A systems approach. Procedia computer science, 44, 669-678. Hák, T., Janoušková, S., & Moldan, B. (2016). Sustainable Development Goals: A need for relevant indicators. Ecological indicators, 60, 565-573. Rajagopal, R., Hettiarachchi, C., & Zürn, S. G. (2024). Using a Result-Oriented Systems Thinking approach to design and evaluate strategies for the digital transformation management of

small and medium-sized enterprises (SMEs). Sustainable Manufacturing and Service Economics, 3

Sachs, J., Kroll, C., Lafortune, G., Fuller, G., & Woelm, F. (2022). Sustainable development report 2022. Cambridge University Press.

UN - Department of Economic and Social Affairs (n.d.). The 17 Goals. https://sdgs.un.org/goals

UN - Department of Economic and Social Affairs (2024). Interagency policy briefs on accelerating progress on the 2030 Agenda from local to global levels https://sdgs.un.org/publications/interagency-policy-briefs-accelerating-progress-2030-agenda-local-global-levels