

# Learning Creativity by Art-Science-Technology

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## Abstract

Creativity is characteristic competency of human. However, it is uncertain how to foster creativity of individuals, except teaching creative techniques. This presentation gives a claim of human creativity that might be understood as learning rather than educating. Indeed, it is rare to address STEAM to gain innovative ability of human in higher education in comparison of children's education in pedagogy. Besides, this gap originated from disconnection of education scheme from early ages to adults and it would make an unbalance between the work in real world and in individual learning process.

In this presentation, we propose a reforming system to integrate multiple disciplines into creative knowledge. A plan of WISE (Doctoral Program for World-leading Innovative & Smart Education) program to be establish between Kanazawa College of Art (KANABI) and JAIST is shown and explained what projects are prepared to generate Art-Science-Technology. Introducing entertainment science, this project focuses on highlighting the value creation process of research with social implementation. We aim to foster creative competencies by integration of different knowledge and skills in cross diversity situation through learning by STEAM with advanced design thinking. A goal of this proposed program for reforming doctoral education is growing up the university students not only to be successful creators as human resources, but also to be challengers to lead social innovation to bring future society to reach SDGs, and to enhance motivations of human creativity.

**Keywords:** Creativity, STEAM in Doctoral Education, Social innovation and SDGs