PRESENTATION TITLE: Flood Risk Management Master Programme - Success Story

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Abstract: (250 to 500 words: for each heading use the bullet points or narrative - the submission including graphics should not exceed one page)

Problems - Issues / Challenges-Needs
Flood risk management challenged human society in 21st century. In the last decade (1995-2015) there is 157.000 victims, 2.300.000 people affected and damage in $ p.a. (2001-2011) reach 24.000.000.000. Integrated flood risk management aims to reduce the human and socio-economic losses caused by flooding while taking into account the social, economic and ecological benefits from floods and the use of flood plains or coastal zones. The need for the adoption of a holistic integrated approach to managing flood risks has been reflected in the Flood Directive of the European Parliament.

Solutions - Methods / Results - Findings
The FLOODRisk master offers a unique, multi-disciplinary course of studies equipping graduates to deal with the growing flood risks of the 21st century. There is a lack of professionals with the interdisciplinary engineering skillset needed to tackle the environmental, social and economic aspects of the problem.

The Erasmus Mundus Programme, started in 2011 and up to the year 2016 74 students from different European countries and other continents graduate, has funded the Master Programme on Flood Risk Management. Courses share between partner Universities. First semester started at TU Dresden, second semester continue on IHE and third one started at TU Barcelona and finished on University of Ljubljana. Research work for Master Thesis supported by several leading European research Institutes, figure 1.

A survey carried out in 2016 has shown that 91% of the FLOODRisk11 graduates reported that they have jobs, of which 97% are in water sector. Students' employed 48% in research and 42% in consultancy.

The syllabus developed with the view that students not only learn the scientific basis and the principles of flood risk management, but also trained in using computer-based modelling, forecasting, optimization and decision support tools. The syllabus upgraded with new developments, for example, in EC-funded research projects on the engagement of citizens in gathering water data and water governance that leads to participatory water management. The aim is to train students with practical tools so that students better trained to work in a real-life situation and thus will be closer to the job market.

Novelty - Value / Relevance to …
The course based on integrated approach to flood risk management and has multi-disciplinary character. Such course single institutes cannot offer and present Ideal example of joint education. Course was recognize as Success Story and presented on the Kick-off meeting for Erasmus-Mundus the projects selected in year 2018.

Keywords: master degree study; flood risk management; training and education; university learning; Erasmus Mundus,
Hydro-meteorological processes and climate change (TU- Dresden)

Modelling and decision support (IHE-Delft)

Hazards and disasters (BarcelonaTech)

Thesis research (One of full/ associate partners)

Socio-economic aspects and spatial planning (University of Ljubljana)

(Graphics: please use the gray area below for representative graphics or graphical summary: select the gray area below and paste your graphics)