

Summer school "No Risk No Energy"

Description

The main assumption beyond the statement "No Risk No Energy" is that all energy sources have both positive and negative effects and it is not realistic to consider that a source bears zero risks. So to each community instruments should be given to evaluate and choose "acceptable" risks in the energy field, by considering the entire lifecycle of the exploration and exploitation of the resource (from the cradle to the grave).

In this perspective, the development of a procedure able to compare different energy sources and their impacts can play a decisive role in the selection of policies.

The evaluation of environmental, economic and social impacts associated with different energy systems thanks to a tool facilitating that comparison will allow a consistent and transparent assessment of different energy alternatives. The comparative evaluation of different impacts related to the exploitation of different energy sources is a hot topic interesting many studies over the last thirty years, attempting to quantify those effects. Different methods have been used to compare environmental effects of different energy source also trying to integrate them into a decision-making process.



TRANSPORTS: ALL TRASPORTS CONNECTED TO ALL PHASES. The NoRisk No Energy Summer School is promoted by the University of Salerno and it is financed by the *H2020 project S4CE* (Science4Clean Energy).

The *School* aims at giving students the instruments to develop a methodology for making national and international authorities aware of environmental, economic and social impacts connected with the exploration and exploitation of hydrocarbons and geothermal resources.

An interdisciplinary team of researchers will give students all the critical elements to evaluate real risks and opportunities coming from the most common sources of energy.

The Summer School can host 26 PhD and/or postdoc students all over Europe and around the world

	Monday	Tuesday
	16.09.19	17.09.19
9:30-11:00	Water contamination	<u>Geothermal project</u> <u>development. Chances</u>
		and challenges
11:00-11:30	coffee break	coffee break
11:30-13:00	Recommendations on water pollution	Regulation and best practice for safety of Italian mining and energy activities
13:00-14:00	Lunch	Lunch
14:00-15:30	<u>Methodologies for</u> <u>quantitative plant</u> <u>processes risk analysis</u>	Induced seismicity during exploitation and exploration of energy geo resources
15:30-16:00	coffee break	coffee break
16:00-17:30	Methodologies for quantitative plant processes risk analysis	IS-EPOS platform

Draft Agenda

	Wednesday 18.09.19
9:30-11:30	<u>Multi hazard & multi</u> <u>risk analysis for</u> <u>exploitation and</u> <u>exploration of energy</u> <u>geo resources</u>
11:30-12:00	Coffee break
12:00-13:00	Environmental sustainability and Life Cycle Assessment

Summer School Lecturers small CV

Andrew Gunning

Managing Director, RSK@Stirling, RSK Group, UK Technical consultancy to the energy, mining, construction, governmental and utility sectors with a focus on environmental risk management& mitigation strategies and innovation.

Ernesto Salzano

Professor of Chemical Plants, University of Bologna, Italy Harmonized approach to stress tests for critical infrastructures against natural hazards, Methodologies for quantitative plant processes risk analysis

Fausto Batini

CTO of Magma Energy Italia s.r.l., Italy

Chair of ETIP-DGF (European Technology & Innovation Platform on Deep Geothermal) R&D of innovative technologies for exploration, well field testing and monitoring, environmental monitoring, exploration management, worldwide business development management.

Beata Orlecka Sikora

General Director of the Institute of Geophysics PAS, Poland Coordinator of the GeoPlanet- Earth and Planetary Research Centre of Polish Academy of Sciences. Chair of EPOS Thematic Core Service Anthropogenic Hazards in Europe Professor of Earth Sciences, main domain of interest in anthropogenic and natural seismicity, interaction with earthquakes, seismic hazard assessment, and statistical seismology.

Alexander Garcia-Aristizabal

Researcherat INGV (Istituto Nazionale di Geofisica e Vulcanologia), Italy Bayesian data analysis, stochastic modelling in Geophysics, and computational methods for stochastic processes, extreme Value analyses, multi-hazard and multi-risk assessment.

Kostas Leptokaropoulos

Institute of Geophysics, Polish Academy of Sciences (IG-PAS), Poland Development and implementation of algorithms and software for seismological research, statistical seismology, earthquake magnitude distribution and seismic hazard analysis.

Ilaria Antoncecchi

Researcher at Research on Energy System S.p.A. seconded at Italian Ministry of Economic Development (MISE DGSUNMIG).

Responsible for scientific research agreements for the CLYPEA "Innovation network for future energy" project promoted by the Italian Ministry of Economic Development.

Involvement in national and international working Groups for transposition and adoption of some Directives and best practices.

Andrea Paulillo

Research Associate in Life Cycle Assessment. University College London, UK.

Development of the Life Cycle Assessment (LCA) methodology and its application to energy and energy-related systems. Member of the S4CE project, performing LCA studies on geo-energy technologies.

