



Some Major Issues Influencing Nuclear Energy Prospective

DANILO FERETIĆ

University of Zagreb, Faculty of Electrical Engineering and Computing

Unska 3, 10000 Zagreb, Croatia
danilo.feretic@fer.hr

The presentation analyses some issues which are of particular importance for future nuclear power application. These include duration of uranium reserves and high level radioactive waste decay period in function of uranium reserves (determined, assumed and speculative) and type of fuel cycle used. Public acceptance during essential historical milestones of nuclear power use, influence of safety and compatibility evaluations, quantified risk, externalities and nuclear accidents. Short review of major accidents, causes, consequences, impact of LNT and hormesis hypothesis.

Particular problem for future of nuclear power is potential shortage of experienced personnel due to long period without plants construction. To address some of problems which may face future investors a brief review of specific events experienced during construction of NPP Krško is presented. Such events could be of interest to countries planning to construct nuclear power plant.

Keywords: *nuclear energy perspective, low-doses radiation risks*