











## **ERIGrid 2.0 Summer School**

## Advanced operation and control of active distribution networks: $2^{nd}$ Edition

Monday 3<sup>rd</sup> – Thursday 6<sup>th</sup> June 2024, NTUA, HEDNO, Athens, Greece

## Agenda

Agenua				
	Monday	Tuesday	Wednesday	Thursday
Topics	Control & Ancillary Services of DERs	Digitalization of power systems	Industry Session with HEDNO	Efficient, flexible & resilient operation of power systems
10:00- 10:10	Welcome and Introduction Prof. Nikos Hatziargyriou (NTUA) Microgrids as building blocks of	Towards the digitalized centralized protection for modern power systems applying 5G	Visit to HEDNO SCADA DMS	Decentralized control and blockchain Prof. Iasonas Kouveliotis- Lysikatos
10:10- 10:45	smart grids Prof. Nikos Hatziargyriou (NTUA)	Prof. Mazaher Karimi (University of Vaasa)	Visit to	(University of Peloponnese)
10:45- 11:30	Microgrid primary and secondary control Dr. Dimitris Lagos (NTUA)	Recent deep learning advances to energy forecasting Dr. George Sideratos (NTUA)	HEDNO Laboratories of Electricity Meters and Measurement Transformers	Leveraging flexibility in smart distribution networks Dr. Angelina Syrri (NTUA)
11:30- 11:45	Coffee Break	Coffee Break		Coffee Break
11:45- 12:30	Advanced ancillary services from PV& Storage Units Dr. George Makrides (FOSS)	Cybersecurity of active distributions networks Prof. Charalambos Konstantinou (KAUST)	Presentations of the HEDNO laboratories	Electric mobility and power systems Dr. Ioannis Karakitsios (NTUA)
12:30- 13:15	Advanced laboratory testing of active distribution networks Dr. Panos Kotsampopoulos & Alkistis Kontou (NTUA)	Cybersecurity of load-frequency control of smart energy systems Andrew D. Syrmakesis (NTUA)	and telemetering sections	Power system resilience assessment and enhancement Ektoras Stasinos (NTUA)
13:15- 14:30	Lunch Break	Lunch Break	Discussion	
14:30- 16:30	Lab session: HIL Testing of industrial Power Plant Controller for RES applications (PROTASIS S.A.)	Lab session:  1. Cybersecurity of digital substations     Vetrivel S.     Rajkumar     (TUDelft)  2. CHIL tests of inverter controls     (NTUA)	with HEDNO Experts	Visit to Meltemi camp pilot site