

## Workshop

### Trends, challenges and opportunities for the Hospital of the Future

July 27<sup>th</sup>, 2021

From 13:00 – 15:35 pm CET

New global challenges, such as the Sustainable Development Goals and the COVID-19 pandemic are demonstrating that high levels of collaboration are required for interconnected societies to face (and recover from) emergencies and crisis.

In this context, rethinking and reshaping the role of hospitals as physical and virtual spaces is a fundamental need that National Healthcare Systems are called to lead.

However, hospital management is not data-driven yet, clinical, and logistic processes work substantially in silos. Tapping into those data streams requires creating favorable technological, economical, and social conditions.

In this workshop we are going to see relevant experiences from thought leaders that will inform on perspective, vision, and experiences on how health informatics is acting already as a driver toward these changes. These experiences will be shown around three main areas of interventions:

- **Enhanced Hospital Workers:** the aim is to explore how to empower hospital workers (e.g., nurses, porters, technicians, doctors, etc.) with appropriate technologies to enhance their skills and support their daily work.
- **Enhanced Robots:** the aim is to automatize those hospital processes, which are no more in need of humans or can benefit from automatons.
- **Enhanced Locations:** the aim is to instrument medical locations for enabling them to support proactively the hospital processes. Medical locations will be enhanced with sensors, technologies for interacting with humans and high connectivity to interact with workers, robots, devices, and other relevant hospital assets safely and effectively.

## Agenda

13:00 CET	<b>Welcome and Introduction</b> Giuseppe Fico <i>Universidad Politécnica de Madrid</i>	<b>360° Vision on the Hospital of the Future (HoF)</b> Maria Teresa Arredondo <i>Universidad Politécnica de Madrid</i>
13:20	<b>Integrated AI-based Robotics in Healthcare</b> <u>Gastone Ciuti</u> <i>Scuola Sant'Anna di Pisa</i>	
13:40	<b>Digital transformation: interoperability, platforms, and data spaces for the HoF</b> <u>Alejandro Medrano</u> <i>Universidad Politécnica de Madrid</i>	
13:55	<b>Enhancing Healthcare Processes through AI and Internet of Things</b> <u>Sergio Guillén</u> <i>Chief Innovation Officer at MYSPHERA (<a href="https://www.mysphera.com">https://www.mysphera.com</a>)</i>	
14:15	Coffee Break	
14:20	<b>Using AI for modeling and optimizing workflow in Smart Hospitals–</b> <u>Daphni Plati</u> <i>Unit of Medical Technology and Intelligent Information Systems, FORTH/IMBB, Ioannina, Greece</i>	
14:40	<b>NeuroRehabilitation: trends and opportunities for the HoF</b> <u>Catherine Adans-Dester</u> <i>PT, PhD, Research Fellow, Motion Analysis Lab, Spaulding Rehabilitation Hospital, Dept. of Physical Medicine and Rehabilitation. Harvard Medical School</i>	
15:00	<b>Operating Room of the future: robots, augmented reality and proactive intelligent controls</b> <u>Yves Bayon</u> <i>Chief Scientist and Medtronic Technical Fellow - Medtronic</i>	
15:20	Round Table (webinars)	
15:35	End	