

FER I EU EXASCALE HPC PODLOGA ZA SVJETSKU KONKURENTNOST EU GOSPODARSTVA

Prof.dr.sc. Mario Kovač

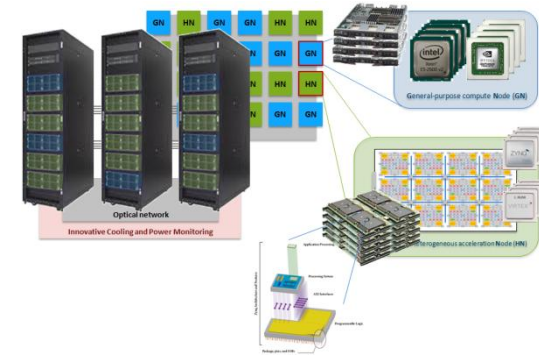
Fakultet elektrotehnike i računarstva

EU DIGITAL SINGLE MARKET STRATEGIJA

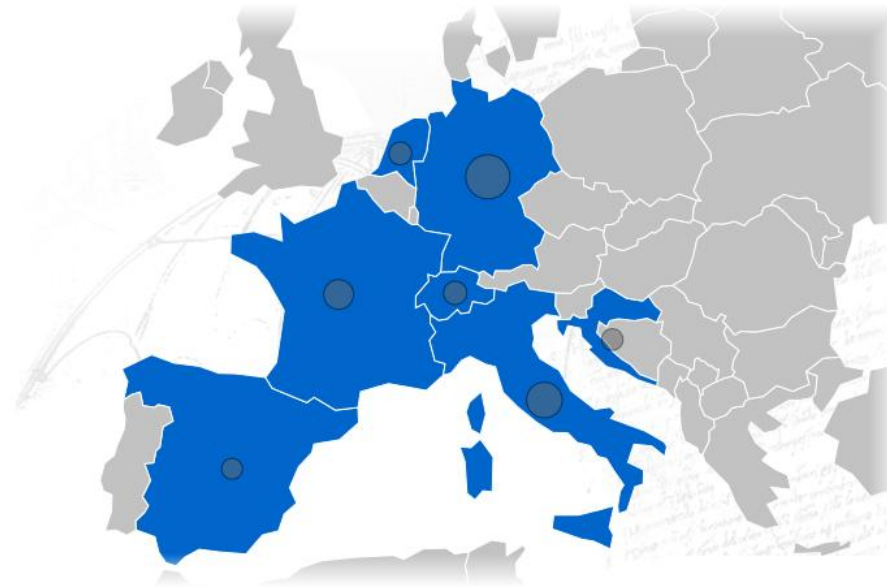
- **Sustavi za visokoučinkovito računarstvo (High Performance Computing, HPC)** - jedan od ključnih faktora **Digital Single Market (DSM) strategije**
 - **HPC pokretač nove globalne digitalne ekonomije**
 - Omogućuje značajan napredak u kreiranju znanstvenih i industrijskih inovacija i konkurentnosti industrije i MSP
- “...each € invested in HPC on average returned €867 in increased revenue/income and €69 in profits...”**

MANGO PROJEKT

- **MANGO: exploring Manycore Architectures for Next-Generation HPC systems**

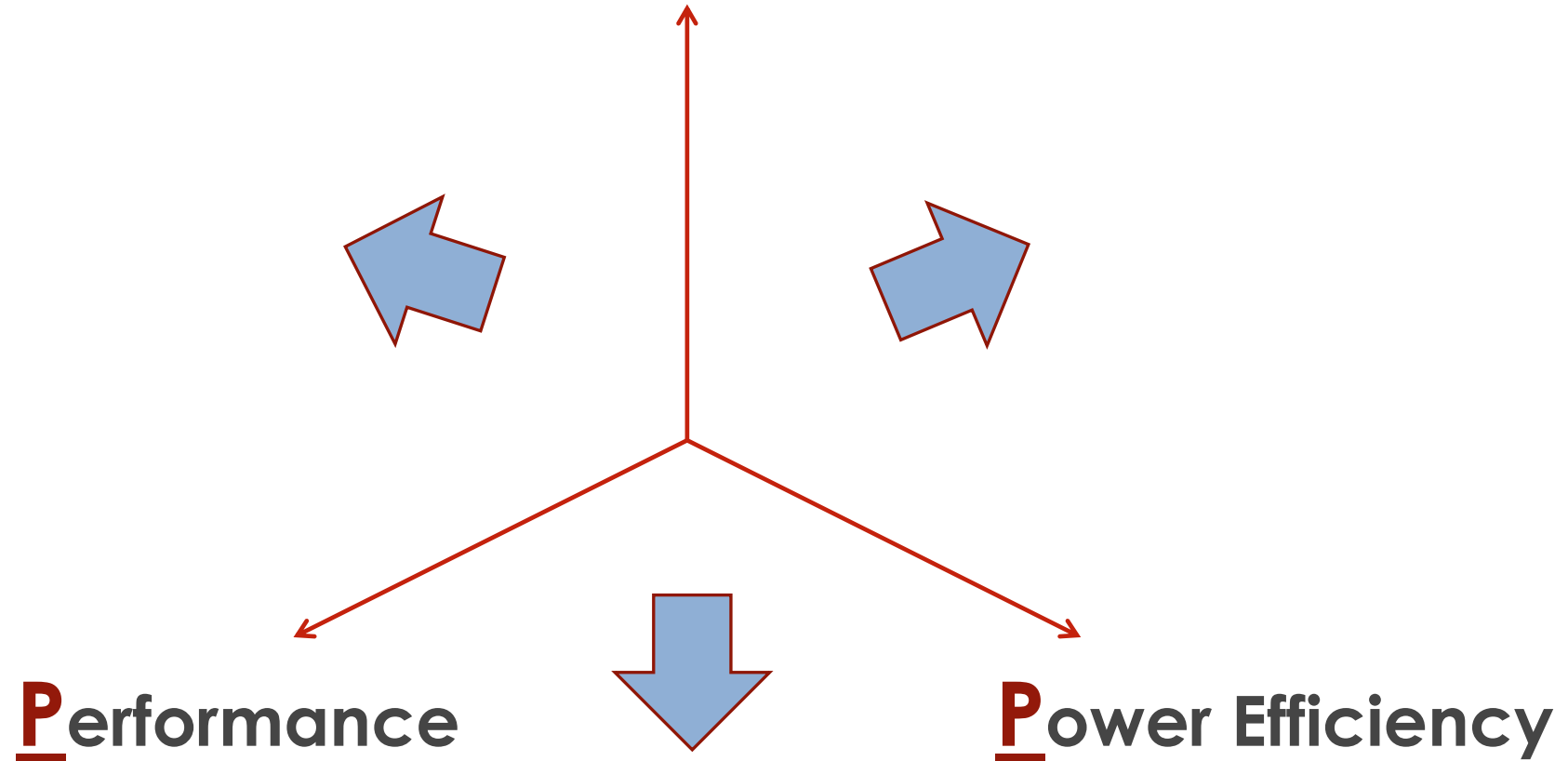


- **Universitat Politècnica de València (SPAIN)**
- **CeRICT / University of Naples (ITALY)**
- **Politecnico di Milano (ITALY)**
- **Zagreb University (CROATIA)**
- **Pro Design GmbH (GERMANY)**
- **Thales Communication & Security (FRANCE)**
- **EPFL (SWITZERLAND)**
- **Philips Medical Systems (NETHERLAND)**
- **Eaton Industries SAS (FRANCE)**



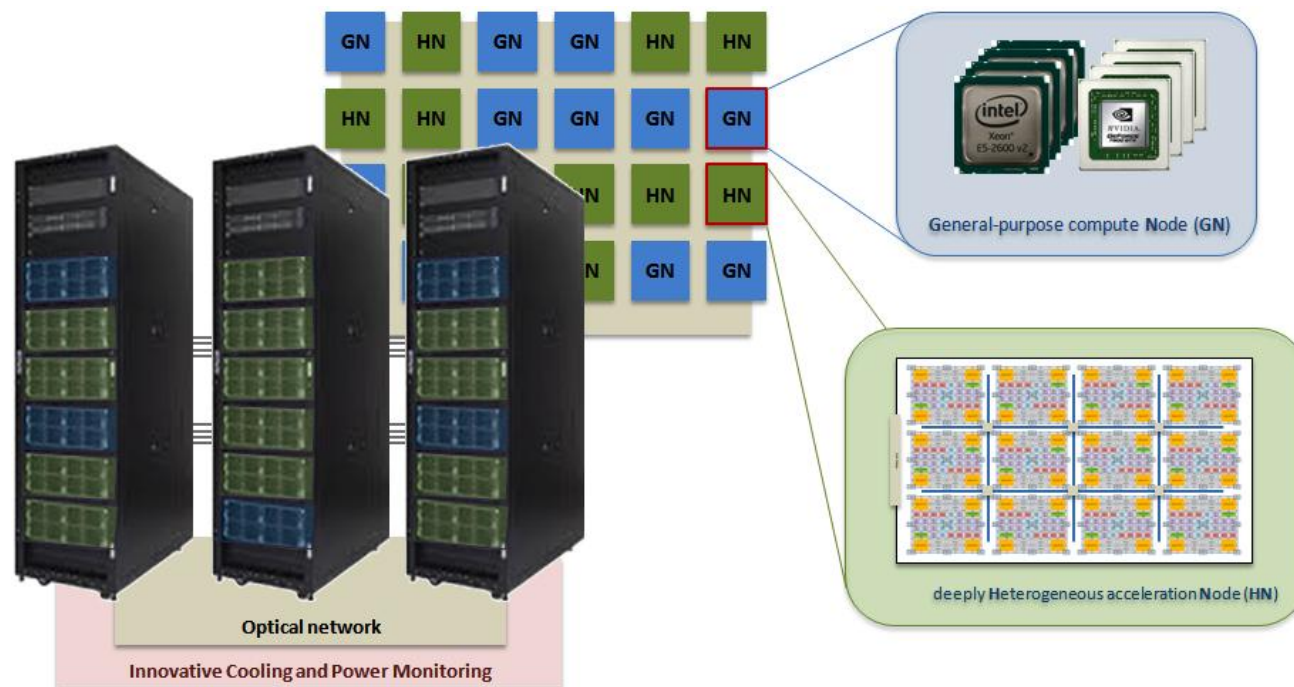
MANGO CILJEVI: *PPP* PROSTOR

Predictability/Quality of Service

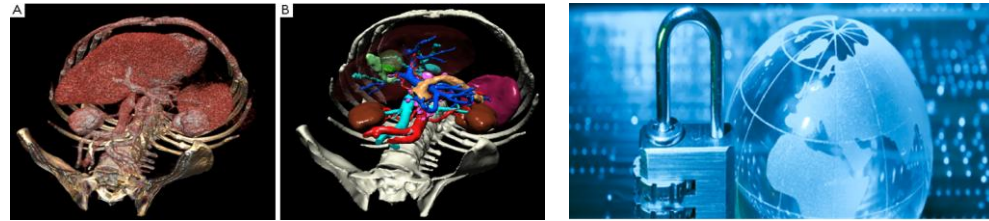


MANGO PROTOTIP

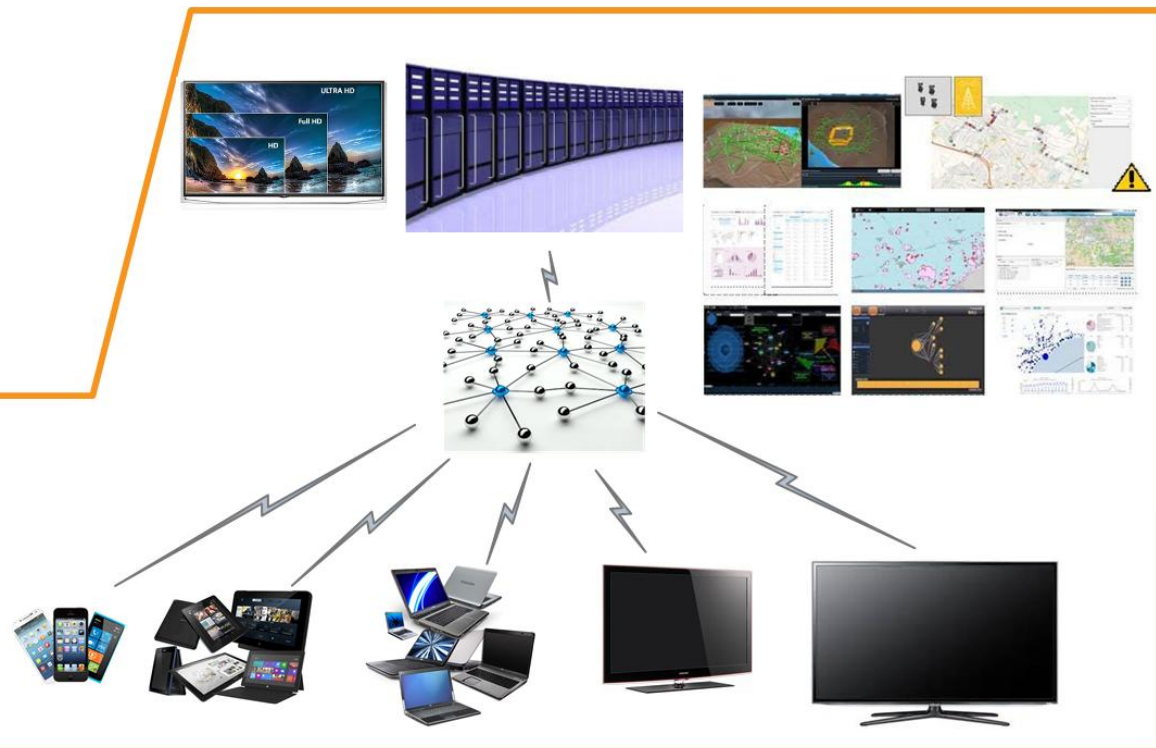
- Visoko heterogena arhitektura
 - High-end CPUs
 - GPGPUs, FPGA
 - Visoko paralelne RISC jezgre
 - Fino granulirani i FPGA akceleratori



MANGO APLIKACIJE

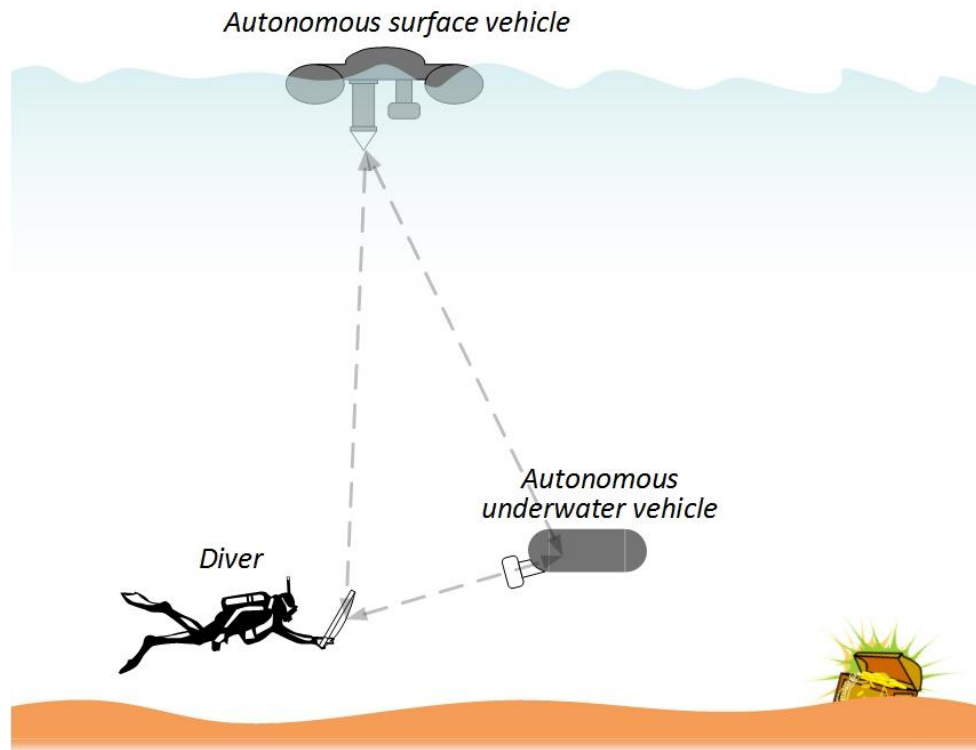


C



FER PROJEKT CADDY – COGNITIVE AUTONOMOUS DIVING BUDDY

Voditelj projekta: doc.dr.sc. Nikola Mišković



Što?

- Uspostava poveznice između ronioca i skupa autonomnih robota.

Kako?

- Višekomponentni kognitivni robotski sustavi, sposobni za učenje, interpretiranje i prilagodbu na ponašanje i stanje ronioca

IZVOZNA ORJENTACIJA

- FER orjentiran na suradnju s industrijom i međunarodne projekte
- Na EU razini, konkurentnost R&D projekata je ogromna (za neke natječaje prolaznost je oko 2-3%)
- FER na godišnjoj razini iz međunarodnih izvora povlači u prosjeku oko 3M€

- CILJ EU: EU HPC među prva 3 na svijetu
- 2017/2018: EU EsD 2x 50M€

Hvala.

mario.kovac@fer.hr

<http://hr.linkedin.com/in/mariokovac>

