Microfluidics in Food and Environmental analysis

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Microfluidics Innovation Center

The MIC in a nutshell

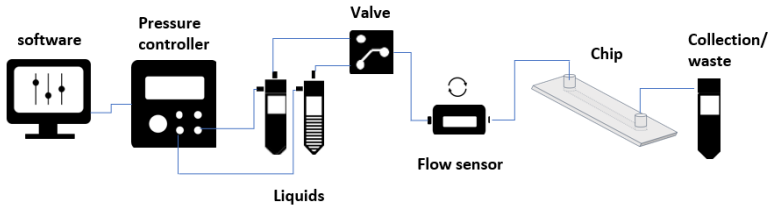
France SME

- Founded in 2024 as spin-off company from Elvesys
- Microfluidic instruments, flow control setups, user-friendly platforms

MICROFLUIDIC SYSTEM DESIGN EXPERTS

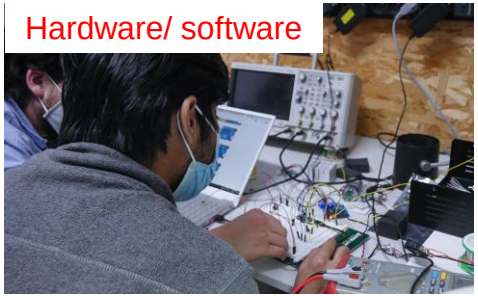
User needs…

- Environmental analysis
- Emulsions
- Screening
- Toxicology



…translated into microfluidic systems

Hardware/ software



Cell biology lab

Microfabrication

Tech skillset

- Electronics
- Mechanics
- Pneumatics
- Software & Firmware
- Simulations
- Fluidics

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Call areas of interest for us

- EIC Pathfinder Open [May 21st 2025; 2026]
- EIC Pathfinder Challenges [Oct 29th 2025; 2026]

Cluster 1: Health
Cluster 4: Digital, Industry and Space
Cluster 5: Climate, Energy and Mobility
Cluster 6: Food, Bioeconomy, Natural Resources, Agriculture and Environment

- Marie Skłodowska-Curie Actions (MSCA)
- Any projects where you need microfluidic expertise (flow control solutions)

Draft call calendar 2025

We are looking for:

Consortia to join as a partner (any stage)

- Where fluid control instruments, modules and platforms are needed.
- Marie Curie Doctoral Networks (**MSCA-DN**): Training PhD candidates in research valorization and entrepreneurship.

Partners to join our consortia (MIC coordinates tech-based proposals; EIC, RIA)

- Biology (e.g. 2D, 3D cell models for use-case and validation; neurobiology, aging, ..)
- Droplets (e.g. encapsulation, -omics, emulsions, ..)
- Biomaterials & fabrication (3D bioprinting, membranes, perfusion scaffolds, ..)
- Clinical (e.g. pre-clinical trial workflows, use-case demos, input on clinical needs, ..)
- Digital, simulation, ML
- Social sciences, DICO, impact (legal, ethical, regulatory aspects of non-animal models, ..)

Impact!

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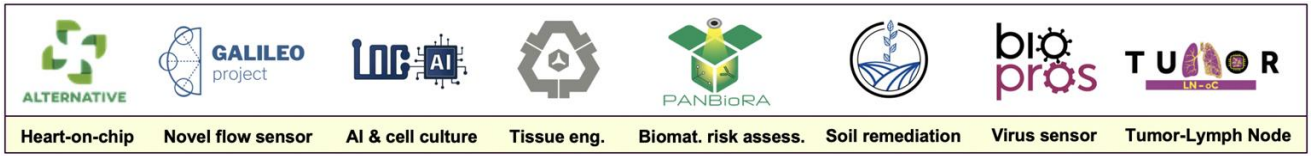
Previous scientific and technology expertise

- >35 EU projects since 2018, 11 ongoing (coordinated 2)
- H2020, Horizon Europe, EIC, MSCA-ITN/ DN, RISE / staff exchange, bilateral calls..



EDAPHOS

- 13 partners
- Aim: Improve land management practices, reduce soil pollution, enhance restoration

- Develop tools for recovery of contaminated lands
- Translate lab protocols into industrial processes
- Design, build and test microfluidic platform
- Install platform in partner lab, aid in use
- Patent our tech, active DICO and exploitation

✓ Polyvalent team – we can understand all our partners: researchers, engineers, metrology, policy, entrepreneurs..

✓ Innovations linked to market need: broad network, market contact activities, SEO

✓ Our goal is technology transfer: IP, freedom to innovate, 10 past spin-offs

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Our expertise for Cluster 6

Project EDAPHOS (Mission Soil): Analysis of soil quality to assess soil remediation techniques

Project ALTERNATIVE (HE Green Deal): Toxicology assessment on hearth tissue

Submitted: Microfluidic droplet generation for emulsion production

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