Lyesse Laloui, Swiss Federal Institute of Technology at Lausanne

"Revolutionizing Foundations: Advances in Thermo-Active Piling Engineering"

Lyesse Laloui is a professor of civil and environmental engineering at the Swiss Federal Institute of Technology at Lausanne (EPFL) where he directs the Laboratory for Soil Mechanics. He is a world-renowned expert in geomechanics and geo-energy. Inspired by the intricate systems of the natural world, his groundbreaking research into the physical mechanisms of geomaterials has unlocked innovative technologies crucial for addressing climate change, resource optimization and the widespread adoption of renewable energy. Prof. Laloui's international recognition is further solidified by two doctorate honoris causa in recognition of his sustainability leadership.

Prof. Laloui holds influential positions within the Swiss Academy of Engineering Sciences and the Academia Europaea, and serves as European vice president for the International Society of Soil Mechanics and Geotechnical Engineering. As Director for Europe of the International Associated Research Centers for the Urban Underground Space, he advances global efforts in sustainable urban development.

As founder and honorary editor-in-chief of *Geomechanics for Energy and the Environment* journal, Prof. Laloui shapes the field's discourse. His vast publication record (13+ books, 400+ journal papers, 20,000 citations) includes internationally celebrated works. He is a sought-after keynote speaker (>50 conferences) and the recipient of numerous awards, including the RM Quigley Award (2016), Kersten Lecture (2020), Vienna Terzaghi Lecture (2022) and more.

Prof. Laloui's commitment to innovation extends beyond academia, holding several patents and founding five startup. This underscores his ability to translate cutting-edge science into impactful technologies, often drawing inspiration from nature's own solutions.