

Italy embarks on the "deep tech" revolution



"Deep tech" startups specialise in transformative technologies, such as nanotechnology, industrial biotech, and advanced materials

Alessia Argentieri

20 March 2020

Despite representing a young niche within the Italian venture capital landscape, emerging "deep tech" companies have gained popularity among VC funds and investors. Alessia Argentieri reports

"Deep tech" startups specialise in transformative technologies, usually labelled as KET (key enabling technologies), which comprise new and disruptive sectors such as micro- and nano-electronics, nanotechnology, industrial biotechnology, advanced materials, photonics and advanced manufacturing.

The aggregate value of global private investment in the deep tech economy has recorded a 20% growth year-on-year, reaching \$18bn in 2018, according to a recent study published by the Boston Consulting Group.

Sector-specific funds dedicated to this innovative field have been launched across Italy, also benefiting from public initiatives such as the EU Horizon 2020 programme – which has deployed €6bn to fund research and innovation across these technologies – and the Itatech platform, backed by the European Investment Fund and Italian state-owned CDP, which has invested €200m in VC funds targeting the sector.

Among others, VC firm Vertis raised its Vertis Venture Technology Transfer Fund 3 to target the automation and robotics sectors and is now launching a new fund with a €100m target to invest in innovative startups across Italy.

Recently established Italian VC house Eureka Venture launched its Eureka Fund I – Technology Transfer with a €50m target at the beginning of 2020. The vehicle invests in seed and series-A rounds, targeting companies operating in the deep tech industry, primarily focusing on the discovery and production of advanced materials.

"The deep tech economy can be considered a new revolution, which will open new frontiers and trigger a gold rush across the VC space," says Eureka Venture founding partner and CEO Stefano Peroncini. "The sector has great potential and has often been undervalued by VC investors compared with other more popular segments, such as the digital economy and life sciences. In Italy alone, there are more than 50 universities and research centres specialising in deep tech sciences, 700 patents and 100 spin-offs across the sector, which represent a great supply of opportunities waiting to be discovered by investors. Furthermore, Italy has a strong manufacturing industry that will greatly benefit from deep tech innovation, particularly in the advanced materials field."

Greater good

Deep tech startups have also shown a strong correlation with sustainability and have often developed applications able to contribute to a more sustainable economy, and drive solutions to ESG-related challenges.

According to Hello Tomorrow's Global Challenge report, most deep tech companies intend to contribute measurable progress towards at least one of the United Nations' Sustainable Development Goals. "Deep tech startups have a strong impact on sustainability and environmental protection," says Peroncini. "This is very enticing for our

institutional investors, which are looking for sustainable investment strategies and are embracing and incorporating the United Nations' Sustainable Development Goals into their screening selection."

Despite offering attractive opportunities, the sector also presents several challenges, including the difficulty of translating innovations into marketable goods and the hurdle to attracting financing for companies that typically present a high credit risk.

Deep tech startups are capital-intensive and require repetitive and more consistent investments than companies operating in other fields of the tech economy. In addition, the sophistication and complexity of the technology they develop can make it difficult for investors to understand and assess their potential and the long-term impact they can have on the market.

"Investing in deep tech can be very challenging; it requires the need for long-term financing, as well as wide knowledge of the sector, to recognise truly disruptive technologies that are likely to result in successful innovations," says Vertis founding partner and CEO Amedeo Giurazza. "Furthermore, many startups' innovations fail to achieve material scale and are not able to reach commercial viability."