



## 3f bio Glasgow, 4<sup>th</sup> July 2017 – Press Release

**3f bio Ltd**, a Scottish company targeting sustainable production of protein, has completed a seed investment round of £461,000 to enable it to extend development activities, to progress to pilot and industrial scale, and to expand the scope of its technology to wider global potential for sustainable protein.

This funding was led by Scottish business angel investment syndicate, **EOS**, and supported by **Scottish Investment Bank**, the investment arm of Scottish Enterprise, the **University of Strathclyde**, **Data Collective DCVC**, a US based venture capital fund, a number of private investors including Nick Elmslie, the former CEO of BP's Global Petrochemicals business, and the 3f bio management team.

3f bio's patented zero-waste process technology covers the large scale integrated production of protein (Food) alongside bioethanol (Fuel) and animal Feed and addresses the global market for protein. By converting carbohydrate (e.g. wheat or grain) to protein with 20 times greater feed efficiency than the cow, this has transformative economics, and strong sustainability advantages.

3f's technology aims to produce mycoprotein, the ingredient in the leading meat-free brand Quorn™, at half the current production cost, and with a 90% lower carbon footprint and 95% lower water and land footprint compared to beef. The company has completed proof of concept at lab scale and is making encouraging commercial progress in the business model which is based on collaborative partnerships with market leading partners. It is anticipated that pilot scale production will start in 2018, and the first industrial plant will be commissioned for 2020.

The global (meat) protein market is worth >£1trn with an average cost of >£3k/tonne and demand is doubling every 25 to 30 years. Demand for protein will increase by >100M tonnes by 2030, however, this is unsustainable economically and environmentally if produced solely from animal protein sources. By 2030, 3f's aim is to produce >1M tonnes of protein cumulatively, which will reduce CO2 emissions by >5m tonnes at the same time as making the lowest cost high quality food protein.

3f was founded in 2015, was spun out from the University of Strathclyde in April 2016, and since that time has completed proof of concept and received validation from potential partners and a range of awards. The founders have combined experience in food, biotech and technology development, with extensive understanding of global agriculture, large scale engineering projects and with a passion for using technological solutions to address large scale societal issues.

Jim Laird, CEO at 3f bio said, "3f bio is at an exciting stage of growth, and we are delighted to have support from investors and to have strengthened the Board. The opportunity for mycoprotein starts in the large and growing meat-free market, but has much greater potential as a healthy low-cost ingredient that is sustainable both economically and environmentally."

Kevin Grainger, founder and gatekeeper at EOS said "EOS is delighted to have led this round as a SIB co-investment partner. We were particularly attracted to this opportunity by the impressive

and highly experienced management team and board, and by the exciting technology and global market opportunity."

[John Cumbers , director at Data Collective DCVC said " ." ]

[University of Strathclyde...]

Nick Elmslie, who joins the Board as a non-executive Director commented "3f's technology and product focus is wholly aligned with megatrends including demographic change, urbanisation, climate change and resource scarcity, and as such I am excited to join the Board."

Kerry Sharp, head of the Scottish Investment Bank, said: "Scottish Enterprise has supported 3f bio since its early stages via SMART, and through our High Growth Ventures unit. We are pleased to continue to support an ambitious, fast-growing Scottish company and we look forward to working closely with 3f bio as it continues to innovate to help it realise its growth potential."

Full contact details for further info can be found at www.3fbio.com

## Footnote:

Morisons LLP acted for 3f bio, Thorntons Law LLP acted for EOS, and Shepperd & Wedderburn LLP acted for Scottish Investment Bank

About EOS - The EOS Technology Investment Syndicate is a St. Andrews based angel network which invests in early stage, IP rich, science and technology businesses which have the potential for global growth. EOS is a Scottish Investment Bank co-investment partner.

About DCVC - Data Collective (DCVC) is a venture capital fund that backs entrepreneurs to transform giant industries. DCVC's strong network, operational experience and technical background delivers unique value to entrepreneurs.

[About the University of Strathclyde ...]

About the Scottish Investment Bank The Scottish Investment Bank (SIB) is the investment arm of Scotland's main economic development agency, Scottish Enterprise, operating Scotland-wide in partnership with Highlands and Islands Enterprise. It manages a suite of co- investment funds including the Scottish Co-investment Fund and the Scottish Venture Fund, which are partly funded by the European Regional Development Fund (ERDF), and the Renewable Energy Investment Fund. SIB is also an investor in Epidarex Capital's life sciences fund. SIB's investment funds support Scotland's SME funding market to ensure businesses with growth and export potential have adequate access to growth capital. SIB also provides a team of Financial Readiness specialists to help companies prepare for new investment and access appropriate finance.

<sup>&</sup>lt;sup>1</sup>http://www.foodingredientsfirst.com/news/3f-Bio-Wins-Start-Up-Challenge-at-Hi-Europe?frompage=news&NewTracking=News