

LICENSING OPPORTUNITIES

with Ulster University



Biomarkers for Amyotrophic Lateral Sclerosis

Ulster University is looking for partners to progress an exciting new technology.

Researchers at Ulster have discovered a novel aspect to Amyotrophic Lateral Sclerosis (ALS) teaching away from traditional pathology. Our research shows that the exosomes present in in myotubes of sporadic ALS patients are specifically toxic to human motor neurons. Therefore, the consistent and systematic accumulation and over-secretion of these exosomes are critical in the progression of ALS.



THE PROBLEM

ALS is a fatal motor neuron disorder with median survival between two and five years from the onset of symptoms. Incidence rate of ALS has been estimated at up to 2.6 cases per 100,000, with an estimated 450,000 people living with ALS world-wide. Diagnosis is slow, often requiring a patient to see several specialists over a period of months: the mean time from onset of symptoms to confirmation of diagnosis is 13–18 months, by which point the disorder may be well progressed.

In addition, it is currently difficult to assess progression of the disease or response to potential therapeutics, and it is impossible to predict a patient's rate of decline. Therefore, the identification of diagnostic, prognostic, and disease-monitoring biomarkers for ALS represents a major need. Only two drugs are currently approved, each with moderate efficacy, so there is also a major need for therapeutics.

THE TECHNOLOGY

We have identified exosomal components that are elevated in ALS patient muscle secretomes. These represent circulating biomarker candidates for ALS, and potential targets (muscle exosomes and their contents) for therapeutic intervention.

The candidate biomarker molecules have potential applications as diagnostic, prognostic, and disease-monitoring biomarkers for ALS.



THE OPPORTUNITY

Further exploration into research and clinical development is required to move towards proof of concept and commercial applications.

We can offer you **exclusive licensing** to enhance your existing intellectual property pipeline and ensure competitive positioning of this emerging technology. In addition, Ulster University experts along with the inventors of this technology are available to assist in its successful commercialisation.

If you would like to collaborate with us and progress this technology, please get in touch using the contact details below.

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