



Altamira Therapeutics Announces Collaboration with Univercells Group on Nanoparticle-Delivered mRNA Vaccines

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- *Univercells to test proprietary mRNA vaccine delivered with Altamira's SemaPhore™ nanoparticles*
- *Targeting safer and accessible mRNA vaccines*

Altamira Therapeutics Ltd. ("Altamira" or the "Company") (Nasdaq:CYTO), a company providing nanoparticle-based technology for efficient RNA delivery to extrahepatic targets, today announced that it has entered into a collaboration agreement with Univercells Group ("Univercells") to evaluate the use of the Company's proprietary SemaPhore platform for the delivery of mRNA vaccines. Univercells is a global life sciences company creating platforms for developing and manufacturing biologics, including mRNA vaccines and therapeutics, in a simple, scalable and cost-efficient way.

Under the terms of the agreement, Univercells will test *in vitro* and *in vivo* a proprietary mRNA vaccine delivered with Altamira's SemaPhore nanoparticle platform. Should the experiments prove successful, Univercells and Altamira intend to discuss and negotiate a commercial agreement for the development and manufacturing of nanoparticle-based mRNA vaccines using Univercells' production platform.

"We are thrilled to initiate this collaboration with Univercells to explore SemaPhore as a delivery vehicle for mRNA vaccines", commented Covadonga Pañeda, PhD, Altamira's Chief Operating Officer. "SemaPhore has shown to be an efficient delivery vehicle for therapeutic RNA in many different disease models. With this collaboration we will explore for the first time its potential utility in delivering mRNA vaccines. Current delivery vehicles used in the field of mRNA vaccines suffer from significant rates of mRNA loss during cell entrance; in addition, they may cause local or systemic side effects. SemaPhore reduces mRNA loss during cell entrance, which may allow for using lower doses. This feature, together with its favorable tolerability profile could make SemaPhore a compelling alternative to conventional delivery vehicles."

"We're delighted to be partnering with Altamira to explore better ways to deliver mRNA to patients," said José Castillo, PhD, Chief Technology Officer of Univercells. "mRNA vaccines, and mRNA in general, have proven to be a game-changer in how we prevent, treat, and cure diseases in a range of fields from oncology to infectious diseases. To unlock its full potential, however, we need constant innovation to make mRNA products more effective, efficient, and affordable. One key step is to develop platforms that use lower doses of mRNA."

mRNA vaccines work through priming the body's immune system to recognize and destroy a pathogen. The vaccines introduce a small piece of the target pathogen's proteins into specialized cells in our bodies that can produce the full protein. These cells then manufacture the target protein in small amounts triggering the production of specific antibodies to destroy any entity that has the same protein, such as a virus. Although our bodies break down the vaccine's mRNA very quickly, the antibodies linger so that we are protected should we contract the virus in the future.

About SemaPhore

SemaPhore is a versatile platform designed to enable safe and effective delivery of mRNA into target cells, using systemic or local administration. It is based on a proprietary 21 amino acid peptide that can engage any type of RNA in rapid self-assembly into a polyplex. The polyplex has a size, charge, and other physical features that allow it to escape hepatic clearance and thus to reach target tissues other than the liver. SemaPhore protects the RNA payload from degradation in the circulation and allows for rapid and effective cell entrance. Efficient delivery and positive treatment outcomes have been demonstrated in multiple murine models of disease so far.

About Altamira Therapeutics

Altamira Therapeutics (Nasdaq: CYTO) is developing and supplying peptide-based nanoparticle technologies for efficient RNA delivery to extrahepatic tissues (OligoPhore™ / SemaPhore™ platforms). The Company currently has two flagship siRNA programs using its proprietary delivery technology AM-401 for KRAS driven cancer and AM-411 for rheumatoid arthritis, both in preclinical development beyond *in vivo* proof of concept. The versatile delivery platform is also suited for mRNA and other RNA modalities and made available to pharma or biotech companies through out-licensing. In addition, Altamira holds a 49% stake (with additional economic rights) in its commercial-stage legacy asset Bentrio®, an OTC nasal spray for allergic rhinitis. Further, the Company is in the process of partnering / divesting its inner ear legacy assets. Founded in 2003, Altamira is headquartered in Hamilton, Bermuda, with its main operations in Basel, Switzerland. For more information, visit: <https://altamiratherapeutics.com>

About Univercells

Univercells is a global life sciences company with the mission of making biologics accessible. Using our combined expertise in scaling, production and bioprocessing, Univercells finds new and sustainable ways to widen access to life-changing drugs. Our affiliate companies deploy innovations in infrastructure, drug substance manufacturing, equipment manufacturing, equipment design, training, and on-the-ground health services to drive down costs, shrink manufacturing footprints and meet the needs of the entire health value chain. Headquartered in Jumet (Belgium), Univercells is supported by regional and national investors, as well as international investors active in vaccines and healthcare, such as the European Investment Bank and Global Health Investment Fund, among others. <https://www.univercells.com/>

Forward-Looking Statements

This press release may contain statements that constitute "forward-looking statements" within the meaning of Section 27A of the Securities Act of 1933, as amended, and Section 21E of the Securities Exchange Act of 1934, as amended. Forward-looking statements are statements other than historical facts and may include statements that address future operating, financial or business performance or Altamira's strategies or expectations. In some cases, you can identify these statements by forward-looking words such as "may", "might", "will", "should", "expects", "plans", "anticipates", "believes", "estimates", "predicts", "projects", "potential", "outlook" or "continue", or the negative of these terms or other comparable terminology.

Forward-looking statements are based on management's current expectations and beliefs and involve significant risks and uncertainties that could cause actual results, developments and business decisions to differ materially from those contemplated by these statements. These risks and uncertainties include, but are not limited to, the success of strategic transactions, including licensing or partnering, with respect to Altamira's legacy assets, Altamira's need for and ability to raise substantial additional funding to continue the development of its product candidates, the clinical utility of Altamira's product candidates, the timing or likelihood of regulatory filings and approvals, Altamira's intellectual property position and Altamira's financial position, including the impact of any future acquisitions, dispositions, partnerships, license transactions or changes to Altamira's capital structure, including future securities offerings. These risks and uncertainties also include, but are not limited to, those described under the caption "Risk Factors" in Altamira's Annual Report on Form 20-F for the year ended December 31, 2022, and in Altamira's other filings with the Securities Exchange Commission ("SEC"), which are available free of charge on the SEC's website at: www.sec.gov. Should one or more of these risks or uncertainties materialize, or should underlying assumptions prove incorrect, actual results may vary materially from those indicated. All forward-looking statements and all subsequent written and oral forward-looking statements attributable to Altamira or to persons acting on behalf of Altamira are expressly qualified in their entirety by reference to these risks and uncertainties. You should not place undue reliance on forward-looking statements. Forward-looking statements speak only as of the date they are made, and Altamira does not undertake any obligation to update them in light of new information, future developments or otherwise, except as may be required under applicable law.

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