

## Innorna Receives IND Clearance for IN001 Herpes Zoster mRNA Vaccine in China

UNITED STATES, July 24, 2024 /EINPresswire.com/ -- Innorna Receives IND Clearance for IN001 Herpes Zoster mRNA Vaccine in China.



Innorna, a clinical-stage biotech company pioneering its proprietary lipid

nanoparticle (LNP) technology to develop novel RNA therapeutics, today announced that China National Medical Products Administration (NMPA) has granted a Drug Clinical Trial Approval Notice for its self-developed Herpes Zoster (HZ) mRNA vaccine IN001.



We are excited that the NMPA granted IN001, China's first mRNA-based HZ vaccine, for clinical trials. This approval represents a significant step towards a potentially better and safer HZ vaccine."

Linxian Li, Ph.D., CEO and Founder of Innorna

IN001 is the first mRNA-based HZ vaccine approved by the NMPA for clinical trials in China. This milestone follows the Investigational New Drug (IND) approval from the U.S. Food and Drug Administration (FDA), making IN001 the third HZ mRNA vaccine approved for clinical trials after Moderna and Pfizer/BioNTech.

The Phase I clinical study for IN001, involving healthy volunteers in New Zealand and the U.S. (NCT06375512), is currently in progress. The clinical trial in China is expected to initiate shortly, accelerating the availability of IN001 to the global population.

This approval represents a significant step towards bringing a potentially better and safer HZ vaccine to the world. Innorna remains committed to advancing innovative therapies and improving global health.

About Herpes Zoster (HZ) and IN001

Herpes Zoster (HZ) is a common infectious skin disease caused by Varicella-Zoster Virus (VZV) reactivation after a prior primary infection manifesting as chickenpox. The clinical symptoms of HZ primarily include clustered skin lesions and neuropathic pain, which can complicate into chronic pain (i.e., postherpetic neuralgia, PHN) and other severe disorders, significantly affecting

the quality of life of the patients. HZ can affect individuals of all ages, but the incidence rate substantially increases with age, especially after 50. Although antiviral therapy and symptomatic treatment can alleviate discomfort and pain symptoms for HZ patients, they cannot significantly shorten the disease course or alleviate complications.

HZ vaccination is currently the most effective measure for preventing HZ and its complications. However, existing HZ vaccines' safety, effectiveness, and availability limit their application. With the growing global aging population, the disease burden of HZ is escalating. Developing a next-generation HZ vaccine with equal or superior efficacy, better safety, and simplified production processes will help improve the accessibility and coverage of the HZ vaccine, addressing this critical global public health issue.

IN001 is an innovative HZ mRNA vaccine independently developed by Innorna. Its core technology includes the mRNA sequence that expresses the VZV glycoprotein E (gE) and Innorna's unique LNP delivery system. Preclinical studies demonstrated that IN001 can effectively induce both humoral and cellular immune responses. Compared with Shingrix®'s literature-reported data, IN001 has a better safety profile and is expected to demonstrate lower adverse reactions in clinical studies. In a head-to-head preclinical immunogenicity study, IN001 induced higher levels of cellular immune responses than Shingrix® and demonstrated excellent immunological durability. The manufacturing process of IN001 is robust and easy to scale up. Key raw materials have been standardized, resulting in a stable supply chain and a significant reduction in vaccine costs, ensuring robust vaccine production for domestic and international markets.

The development of IN001 represents a promising breakthrough in HZ vaccine research, offering greater accessibility and vaccine coverage for this disease globally. We are committed to working with regulatory agencies and partners to advance IN001 into clinical development, expedite its approval, and bring this next-generation HZ vaccine to the public as soon as possible.

## About Innorna

Founded in 2019, Innorna aims to develop a globally leading lipid nanoparticle (LNP) delivery technology platform and innovative RNA therapies to address unmet clinical needs. The company has established a Diversity-Oriented Lipid Library (DOLL), encompassing over 5,000 ionizable lipids, to develop various innovative prophylactic and therapeutic applications, including mRNA vaccines and drugs, gene editing, and cell therapy. Leveraging its proprietary mRNA and LNP technology platform, Innorna has established multiple internal R&D pipelines for infectious disease vaccines, rare diseases, and tumor immunotherapy. The company has also partnered with several multi-national biopharmaceutical and biotechnology companies to explore the technology's potential for broader treatment applications.

Innorna's comprehensive R&D capability fully supports the end-to-end process of innovative therapies for internal development and external collaboration partners, from discovery to clinical

development. Innorna has developed an extensive global patent portfolio and filed over 40 patent applications regarding the innovation of LNP and mRNA technology.

Since its establishment, Innorna has gained wide recognition from the investment and industrial sectors and has received numerous awards, including being named among MIT Technology Review's global top 50 smartest companies and Fortune China's most socially influential startup companies. For more information, please visit the company's official website at <a href="https://www.innorna.com">www.innorna.com</a>.

At Innorna, we value INNOVATION, INTEGRITY, EFFICIENCY, and OPENNESS. We are committed to exploring the frontier of mRNA application based on platform technologies and leading the revolutionary step toward expanding the clinical application of mRNA in various therapeutic approaches to fulfill the unmet medical needs of patients worldwide.

Please visit the Innorna website at <u>www.innorna.com</u> for more information.

bd@innorna.com Innorna email us here

This press release can be viewed online at: https://www.einpresswire.com/article/729976479

EIN Presswire's priority is source transparency. We do not allow opaque clients, and our editors try to be careful about weeding out false and misleading content. As a user, if you see something we have missed, please do bring it to our attention. Your help is welcome. EIN Presswire, Everyone's Internet News Presswire™, tries to define some of the boundaries that are reasonable in today's world. Please see our Editorial Guidelines for more information.

© 1995-2024 Newsmatics Inc. All Right Reserved.