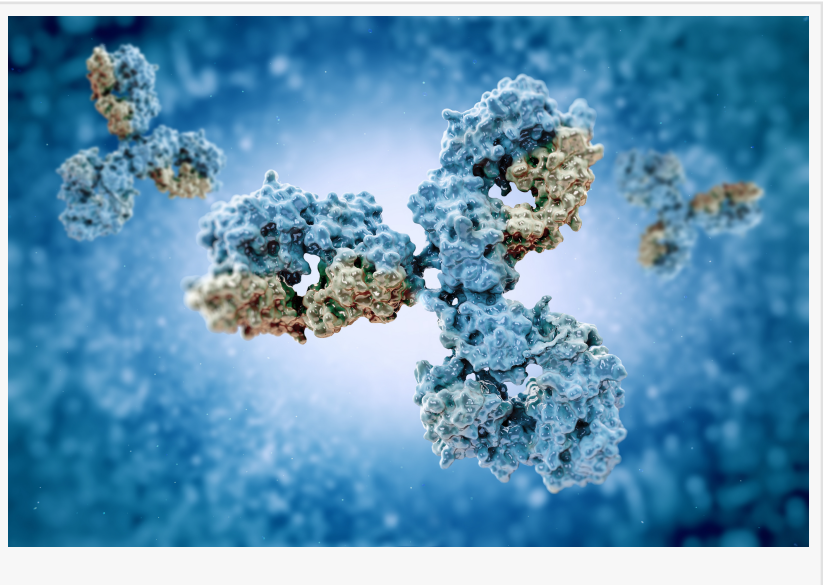


Nano Vivere Granted Patent for Nanotechnology Encapsulation of Combination Drugs & Drug Products

Such smart targeting will further reduce toxicities associated with Top1 and Tbd1 inhibitors while increasing efficacy and therapeutic index

GUANGZHOU, GUANGDONG, CHINA, June 29, 2018 /EINPresswire.com/ -- [Nano Vivere](#) (ISIN: [CN0024013913](#)), a late stage clinical company, pioneering nanomedicine whose technology is based on proprietary technologies and patents, today announced that it will be granted a Patent entitled "Methods for Encapsulation of Combination Drugs and Encapsulated Drug Product," for its nanoencapsulation technology.



This invention is for a nanotechnology process to encapsulate hydrophobic drugs and hydrophilic drugs in phospholipid nanocells for use in combination therapy by means of Nano Vivere's technology platform. With this technology, nontoxic supercritical or near-critical fluids with or without polar cosolvents are utilized to solubilize phospholipid materials and hydrophobic drugs, and form small, uniform liposomes that co-encapsulate hydrophobic drugs in their lipid bilayers and hydrophilic drugs in their aqueous cores.

This patent also claims a therapeutic drug product that combines a hydrophobic drug consisting of topoisomerase 1 inhibitors such as camptothecin, irinotecan, topotecan and derivatives thereof and a hydrophilic drug selected from the group consisting of tyrosyl-DNA phosphodiesterase inhibitors such as an aminoglycoside antibiotics like tetracycline and ribosome inhibitors like puromycin for drug-resistant cancers. Such a combination of drugs is based on research by Nano Vivere scientists that demonstrate that the enzyme Tbd1 can repair Top1-DNA covalent complexes by hydrolyzing the tyrosyl-DNA bond. Inhibiting Tbd1 has the potential to enhance the anticancer activity of Top1 inhibitors and also to act as anti-infective agents.

Dr. Don T. Leung, co-founder and Chief Executive Officer explains, "We anticipate that the nanocellular formulations will result in reduced systemic toxicity, due to masking of cytotoxic effects of camptothecins and Tbd1 inhibitors. Additionally, the stability of the lactone ring in nanocells will be improved as a result of protection from the neutral pH of the blood stream. By increasing residence time in the circulatory system, nanocells will increase therapeutic efficacy of the combination drugs. Phospholipids can be utilized to provide steric hindrance that will increase residence time and therapeutic efficacy. Furthermore, phospholipids linked with cancer-specific ligands can be utilized to target co-encapsulated camptothecin and Tbd1 inhibitors to cancers of the colon, lung or ovary.

[About Nano Vivere](#) (ISIN: [CN0024013913](#))

Nano Vivere is a late stage clinical company, pioneering nanomedicine that is following its unique path: a new way to treat patients thanks to nanophysics delivered at the cell's nucleus. The company's technology is based on proprietary technologies and patents and it operates worldwide from the headquarters based in Guangzhou. Nano Vivere is led by a highly trained and distinguished team of experts who have demonstrated success in the combined fields medicine, biologics, neuroscience, and nanotechnology along with the specialized business development track record requisite for the launch of cutting-edge medical technologies.

Jackline Tang
Nano Vivere
13057400750
email us here

This press release can be viewed online at: <http://www.einpresswire.com>

Disclaimer: If you have any questions regarding information in this press release please contact the company listed in the press release. Please do not contact EIN Presswire. We will be unable to assist you with your inquiry. EIN Presswire disclaims any content contained in these releases.
© 1995-2018 IPD Group, Inc. All Right Reserved.