Karolinska Development's portfolio company Dilafor initiates collaboration with Liverpool University to study the effect of tafoxiparin on SARS-CoV-2

STOCKHOLM, SWEDEN – April 17, 2020. Karolinska Development (Nasdaq Stockholm: KDEV) announces today that a research group at Liverpool University intends to initiate a preclinical research study to investigate the potential inhibitory effect of Dilafor's pharmaceutical drug candidate tafoxiparin on SARS-CoV-2, the virus causing Covid-19.

Dilafor's pharmaceutical drug candidate tafoxiparin is a unique, proprietary substance mimicking heparan sulfate, an endogenous molecule found on cell surfaces. Tafoxiparin is developed primarily to avoid complications affecting the mother and her infant during childbirth. The drug candidate is currently undergoing a phase 2 clinical trial in an obstetric indication.

Tafoxiparin has important structural similarities to heparin – an anticoagulant used to prevent and treat thrombosis. A limiting side effect from heparin is hemorrhage. This risk is not present with tafoxiparin since the substance lacks anticoagulative properties. It has been shown in experimental studies that heparin has an effect on several types of viruses – SARS-associated coronavirus, herpes, influenza and HIV. However, clinical evaluations of heparin's effect on these viruses have been hampered due to the risk of hemorrhage in patients. Researchers at Liverpool University have recently provided evidence that heparin binds to the "spike protein" on the cell surface of SARS-CoV-2 which the virus uses to attach to and invade human cells. By physically blocking interactions with this protein, the ability of the virus to attack human cells could be impeded. There are also preliminary data indicating that non-coagulative heparin-like substances, such as tafoxiparin, exhibit similar promising qualities.

Liverpool University, in partnership with Keele University, has established a preclinical platform enabling fast screenings of different substances' effects on SARS-CoV-2 interactions with heparan sulfate and cells. Tafoxiparin is one of the drug candidates which the research group will now study in order to find an effective treatment of patients who've been struck by the virus. Dilafor will support the British research groups in the endeavor by providing tafoxiparin, as well as by sharing the company's internal data and in-house knowledge on the drug candidate.

"We are convinced about the potential for non-anticoagulant heparan sulfate mimetics to be used to target mechanisms of SARS-CoV-2 infection causing Covid-19 disease, so we are pleased to have the opportunity to work with Dilafor on their drug candidate tafoxiparin" says Prof Jeremy Turnbull, Johnston Professor of Biochemistry at Liverpool University.

"The University of Liverpool has a taken a commendable initiative to investigate whether tafoxiparin could be a possible treatment option for Covid-19 and other strains of coronaviruses threatening to strike the world in the future. The project is at a very early stage, but we are looking forward to the results of the recently initiated preclinical study", says Viktor Drvota, CEO of Karolinska Development.

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TO THE EDITORS

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Karolinska Development AB (Nasdaq Stockholm: KDEV) is a Nordic life sciences investment company. The company focuses on identifying breakthrough medical innovations in the Nordic region that are developed by entrepreneurs and leadership teams. The Company invests in the creation and growth of companies that advance these assets into commercial products that are designed to make a difference to patients' lives while providing an attractive return on investment to shareholders.

Karolinska Development has access to world-class medical innovations at the Karolinska Institutet and other leading universities and research institutes in the Nordic region. The Company aims to build companies around scientists who are leaders in their fields, supported by experienced management teams and advisers, and co-funded by specialist international investors, to provide the greatest chance of success.

Karolinska Development has a portfolio of nine companies targeting opportunities in innovative treatment for life-threatening or serious debilitating diseases.

The Company is led by an entrepreneurial team of investment professionals with a proven track record as company builders and with access to a strong global network.

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