

## NodThera Announces Positive Phase 1 Study Readouts for the NLRP3 Inflammasome Inhibitors NT-0796 and NT-0249

-NT-0796 successfully completes Phase 1 study, demonstrating blood-brain barrier penetration and reduced inflammatory biomarkers supporting advancement in neuroinflammatory and peripheral inflammatory diseases-

-Second clinical candidate NT-0249 achieves positive interim results from its Phase 1 study supporting once daily dosing for peripheral inflammatory disease-

**LEXINGTON, MA** – September 21, 2022 – NodThera, a clinical-stage biotechnology company developing a new class of potent and selective oral, small molecule NLRP3 inflammasome inhibitors to treat diseases driven by chronic inflammation, today announced positive Phase 1 clinical readouts for its first and second clinical candidates, NT-0796 and NT-0249. NT-0796 has completed its Phase 1 study confirming brain penetration with excellent pharmacokinetic (PK) & pharmacodynamic (PD) profiles and NT-0249 has completed dosing of the Phase 1 single ascending dose cohorts confirming a potentially best-in-class PK/PD profile and the potential for once-a-day dosing. The results collectively support further development and clinical evaluation in a range of CNS and peripheral inflammatory diseases.

"We are delighted that NT-0796 continues to demonstrate an exceptional and differentiated clinical profile," said Adam Keeney, Chief Executive Officer at NodThera. "Neurological and neurodegenerative diseases are a significant and growing burden to patients and society. This is the first clinical demonstration of a brain penetrant inhibitor of the NLRP3 inflammasome, which represents a major milestone for addressing this urgent medical challenge."

NT-0796 is a novel chemotype, designed as an orally bioavailable, brain penetrant NLRP3 inhibitor. The Phase 1 study showed exposures of NT-0796 and its bioactive metabolite NDT-19795 increased linearly with dose. A dose-dependent pharmacodynamic effect was also observed through inhibition of stimulated IL-1β and IL-18 in *ex vivo* blood samples, which translated into an anti-inflammatory effect via reduction of key inflammatory biomarkers, including C-reactive protein (CRP). Blood-brain barrier penetration of NT-0796 was verified with cerebrospinal fluid (CSF) drug concentrations in excess of anti-inflammatory free blood concentrations. Overall, NT-0796 was safe and well tolerated and no drug-related liver function test (LFT) abnormalities were observed.

NodThera's second clinical compound, NT-0249, is a peripherally restricted NLRP3 inflammasome inhibitor that has successfully completed its Phase 1 single ascending dose study. NT-0249 was safe and well tolerated with proportional increases in drug exposure with increasing dose. This profile has the potential to be best-in-class as a peripheral NLRP3 inflammasome inhibitor, demonstrating pharmacokinetics consistent with a once-a-day therapy and pharmacodynamics confirming a low clinical dose for efficacy.

"From design to development, the success of our Phase 1 data represents a breakthrough in targeting the NLRP3 inflammasome both peripherally and in the CNS" said Alan Watt, NodThera's CSO and President of R&D. "Delivery of NT-0796 into the CNS and the positive interim data for NT-0249 continues to reinforce NodThera's leadership in the NLRP3 inflammasome field."

## **About NodThera**

NodThera is a clinical-stage biotechnology company developing a new class of potent and selective NLRP3 inflammasome inhibitors for the treatment of diseases driven by chronic inflammation. Led by an



experienced management team, NodThera is leveraging new insights into inflammasome biology and chemistry to build a clinically advanced portfolio of highly differentiated small molecule NLRP3 inflammasome inhibitors. The company was founded in 2016 by Epidarex Capital and financed by 5AM Ventures, Cowen Healthcare Investments, Epidarex Capital, F-Prime Capital, Novo Holdings, Sanofi Ventures and Sofinnova Partners. NodThera is headquartered in Lexington, MA, with additional locations in Cambridge, UK and Seattle, WA. Learn more at <a href="https://www.nodthera.com">www.nodthera.com</a> or follow us on <a href="https://www.nodthera.com">LinkedIn</a>.

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