



Xgene Pharmaceutical Pty Ltd. Announced the Enrollment of the First Cohort in the Phase I clinical trial of XG2002 capsules, a novel selective TRPM8 channel blocker.

On May 8, 2024, Xgene Pharmaceutical Pty Ltd. announced the enrollment of the first cohort in the phase I clinical trial of XG2002 capsules, a novel oral small molecule selective blocker targeting the pain channel TRPM8, at the CMAX Research Center in Australia.

This single-dose escalation study aims to evaluate the safety, tolerability, pharmacokinetic profile and the maximum tolerated dose of XG2002 in healthy volunteers.

About TRPM8

TRPM8 is an ion channel expressed in peripheral sensory neurons. Upon activation, it allows the influx of Na⁺ and Ca²⁺ ions into the cell, leading to depolarization and the generation of electrical currents that transmit signals into neurons, ultimately resulting in the sensation of pain. Numerous studies have shown high expression of TRPM8 ion channels and increased channel sensitivity in various painful conditions, such as neuropathic pain, chemotherapy-induced pain, complex regional pain syndrome, bladder pain syndrome, and many others. Additionally, TRPM8 ion channels are also highly expressed in various cancer cells. It is an androgen-dependent Ca²⁺ channel that is closely associated with the survival of prostate cancer cells, making it a promising potential target for cancer therapy.

XG2002, licensed from RaQualia Pharma, Inc., Japan, via inhibiting TRPM8 channels, exhibits pain suppressing effects in various animal model of pain with good safety profile. This Phase I clinical study aims to assess the safety, tolerability, and pharmacokinetic profile of XG2002 in healthy subjects, laying the groundwork for subsequent trials and potential tests across various pain-related conditions.

Dr. Leon Jiang, Chief Medical Officer and Senior Vice President of Xgene Pharmaceutical Pty Ltd emphasized the significant clinical unmet need for safe and effective analgesic treatments. Various painful pathways are activated to various extent in different pathological processes, thus, drugs targeting different modes of action are needed to precisely address corresponding pathogenesis including different stages of a painful condition. The enrollment of the first subject marks a significant milestone in XG2002's clinical development, enabling exploration of additional treatment options for acute and chronic pain management.

Dr. Feng Xu, Co-founder, Chief Operating Officer and Chief Scientific Officer of Xgene Pharmaceutical Pty Ltd, highlighted the pivotal role of TRPM8 in pain sensation and its association with various physiological pathologies. He expressed confidence in XG2002 as a novel TRPM8 channel blocker with favorable safety and efficacy profile, paving the way for its future clinical applications.

Dr. Gene Hsu, Founder and CEO of Xgene Pharmaceutical Pty Ltd, reaffirmed the company's patient-centric approach and commitment to addressing clinical needs in pain management. He emphasized the company's focus on developing safe and effective treatments for a wide range of acute and chronic pain conditions, leveraging the unique drug conjugation platform and exploring novel therapeutic targets.

About Xgene

Xgene Pharmaceutical Pty Ltd is a subsidiary of the Xgene parent company, registered in Australia. Xgene Pharmaceutical Inc. is a clinical stage, venture capital-backed, international company utilizing linker technology to create novel, multimodal, conjugated molecules for the treatment of pain and other neurological disorders. Xgene's linker technology, is tailored to overcome the challenges of the multimodal therapy approach, and offers potentially better, safer, and more efficient treatments. Current programs are focused on dual-action NCEs with improved analgesic efficacy and tolerability with the pipeline comprising late-stage clinical programs as well as assets in discovery and preclinical development. Xgene has gained recognition and support from leading investment institutions such as Morningside Capital, TF Capital, Ping'an Venture Capital, Hengxu Capital, CITIC Securities and other investment institutions.