



KemPharm, Inc. Expands Prodrug Pipeline with Candidate for Treatment of Pain and Closes Series B Financing

- Pipeline now includes KP201 for treatment of pain and lead candidate, KP106, for ADHD
- Series B financing provides resources to advance two candidates from Ligand Activated Therapy platform through Phase 1 trials

North Liberty, IA – September 16, 2009 – KemPharm, Inc. today announced the nomination of its second pipeline candidate, KP201, based on its proprietary ligand activated therapy (LAT) platform. KP201 is a new chemical entity (NCE) for the treatment of pain with the possibility of reduced abuse potential. KP201 joins lead candidate KP106, which is a novel prodrug candidate in development for ADHD. KemPharm also today announced the closing of a \$3.8 million Series B financing round, the proceeds of which will be used to advance both of these candidates through Phase 1 proof of concept studies.

“KemPharm plans to submit an IND to the FDA for our lead candidate, KP106 for the treatment of ADHD, by year end with clinical trials initiating shortly thereafter. This achievement would represent a timeline of less than two years from concept to clinical studies, and we project that the new drug application (NDA) will be filed in the second half of 2012,” said Robert W. Karr, M.D., Chief Executive Officer of KemPharm. “We are therefore very pleased to complete this financing round which will support KemPharm’s strategy to rapidly move our LAT prodrug candidates through Phase 1 clinical trials.”

KemPharm’s LAT platform generates modified versions of FDA-approved drugs by chemically attaching a removable substituent, called a ligand, to the approved drug, resulting in a prodrug that is an NCE with potentially improved therapeutic characteristics based on enhanced pharmacokinetic profiles and other characteristics. The LAT platform also confers significant potential advantages including the creation of new, composition-based intellectual property and the ability to reduce development timelines and costs.

“KP201 is the second prodrug candidate to emerge from our proprietary LAT technology platform. We believe this candidate is particularly promising as a novel treatment option for patients with moderate to severe pain because initial studies suggest a profile that offers reduced potential for abuse,” commented Travis C. Mickle, Ph.D., President and Chief Scientific Officer of KemPharm. “In addition, we are looking forward to beginning clinical studies with KP106 as we believe that the prodrug properties of this candidate may offer an improved cardiovascular side effect profile and reduced incidence of weight loss in comparison to currently available ADHD treatments. KemPharm is grateful to have earned the continued support of our investors in moving these candidates forward.”

Previous investor DeWaay Investment Partners, a Midwest based early stage venture fund, led the round alongside KemPharm management and existing and new individual investors,

most of whom are clients of DeWaay Capital Management. According to Adam Claypool, managing director of DeWaay Investment Partners, “KemPharm has made significant progress in a relatively short period of time consuming relatively little capital – a testament to their experienced leadership, promising LAT technology and efficient business model. Our Fund and individual investors are delighted to continue backing KemPharm to advance what we believe is a game changing therapeutic platform that will improve the lives of countless patients.”

About KP106

KP106, KemPharm’s lead prodrug candidate for the treatment of ADHD, is composed of d-amphetamine and a ligand. In preclinical studies, the pharmacokinetic profile of d-amphetamine released from KP106 has a lower Cmax and delayed Tmax compared to the profile observed with Adderall XR®, an approved treatment for ADHD. The preclinical studies suggest that KP106 may have an improved side effect profile, including reduced weight loss and cardiovascular effects and decreased abuse potential. KemPharm intends to file the IND for KP106 by the end of 2009 and an NDA by the end of 2012.

About KP201

KP201, KemPharm’s prodrug candidate for the treatment of pain, is composed of hydrocodone combined with a ligand. Preclinical studies suggest that KP201 may have reduced abuse potential compared with currently approved narcotic analgesics. KemPharm expects to file an IND for KP201 in the second half of 2010 and may be able to use the 505(b)(2) regulatory pathway for a more rapid development timeline.

About KemPharm, Inc.

KemPharm, Inc. is focused on the discovery and development of new chemical entities (NCEs) to treat serious medical conditions through its proprietary and broadly applicable ligand activated therapy (LAT) prodrug technology. KemPharm utilizes its LAT prodrug technology to generate improved versions of FDA-approved drugs. These NCEs create new composition-based intellectual property, may have shorter development timelines and reduced development costs, and may be eligible for 505(b)(2) regulatory submissions for New Drug Applications (NDAs). The Company’s business strategy includes seeking strategic development partners following rapid clinical proof of concept demonstration in Phase 1. KemPharm is developing candidates for ADHD, pain, other central nervous system disorders, cardiovascular disease and cancer. www.kempharm.com

About DeWaay Investment Partners

DeWaay Investment Partners is a Midwest-based venture fund, investing in early stage companies. The Fund targets investments in capital efficient, highly differentiated companies – primarily in the technology industry. The Fund is affiliated with DeWaay Investment Banking, a leading provider of M&A, corporate finance and commercial real estate finance services to lower middle market companies. DeWaay Investment Banking is a division of DeWaay Financial Network, LLC, member FINRA/MSRB/SIPC. www.dewaay.net

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