

Chelsea Therapeutics Presents Data at 14th International Congress on Parkinson's Disease and Movement Disorders

- **Clinical Review Highlights Neuroprotective Potential of Norepinephrine in Parkinson's Disease**
- **Northera, an Orally Available Norepinephrine Pro-drug, Significantly Improves Symptoms of Neurogenic Orthostatic Hypotension in Patients With Parkinson's Disease**
- **Over 25 Years of Research Support Cardiovascular Safety of Northera in Patient Population Characterized by Advanced Age and Significant Co-Morbidities**

CHARLOTTE, N.C., June 17, 2010 -- Chelsea Therapeutics International, Ltd. (Nasdaq:CHTP) announced that data from its pivotal studies of Northera™ (droxidopa) in symptomatic neurogenic orthostatic hypotension was presented during a poster session and featured in a symposium highlighting the role of norepinephrine (NE) deficiency in Parkinson's disease at the 14th International Congress on Parkinson's Disease and Movement Disorders in Buenos Aires, Argentina.

A poster entitled, "Safety and Efficacy of Northera for the Treatment of Symptomatic Neurogenic Orthostatic Hypotension (NOH) in Patients with Parkinson's Disease," detailed the results of a subgroup analysis of 44 patients with Parkinson's disease (PD) from Chelsea's pivotal efficacy study 302. Results from this subgroup analysis demonstrate that PD patients, all of whom were on concomitant Levodopa/dopa-decarboxylase inhibitors, showed the strongest therapeutic response to Northera, achieving highly significant improvements in the signs and symptoms of neurogenic orthostatic hypotension.

In addition to the poster session, Chelsea is sponsoring a symposium, featuring a panel of academic thought leaders and experts in the field of movement disorders, to review the role of norepinephrine in PD and therapeutic opportunities for Northera. The session will be moderated by Joseph Jankovic, MD, Baylor College of Medicine, Houston, TX, and Horacio Kaufmann, MD, New York University School of Medicine, New York, NY, and will include the following presentations:

NE Depletion in the Pathophysiology of Motor and Non-motor Dysfunction in PD

Peter LeWitt, MD

Henry Ford Hospital and Wayne State University School of Medicine
Detroit, Michigan USA

Northera: An Orally Available Norepinephrine Replacement Therapy for the Treatment of Neurogenic Orthostatic Hypotension (Ph II & III results)

Phillip Low, MD

Kern Professor of Neurology, Mayo Clinic
Rochester, Minnesota USA

Safety of Northera Treatment Across Multiple Studies & Indications (Ph II & III studies to date, and Japanese Post-Marketing Surveillance data)

Christopher Mathias, MD

Neurovascular and Autonomic Medicine Unit, Faculty of Medicine
Imperial College School of Medicine
St. Mary's Hospital
London, UK

PDF copies of the full poster and each symposium presentation will be available on Chelsea's website at www.chelseatherapeutics.com.

"Each year, thousands of clinicians and researchers gather at the Movement Disorder Society's International Congress of Parkinson's Disease and Movement Disorders," stated Dr. Simon Pedder, Chelsea's President and CEO. "We are pleased to have such experienced and distinguished thought leaders joining us in this forum to share new insight into the motor and non-

motor dysfunction in Parkinson's disease, the critical role of norepinephrine in the pathophysiology of the disease and the therapeutic potential of our norepinephrine pro-drug, Northera."

Parkinson's disease is the second most common neurodegenerative disorder in America. As a result of decreased levels of norepinephrine associated with PD, up to an estimated 20% of these patients may experience NOH symptoms associated with the disease or as a complication of medication. NOH is a neurogenic disorder resulting from deficient release of norepinephrine, the neurotransmitter used by sympathetic autonomic nerves to send signals to the blood vessels and the heart to regulate blood pressure. This deficiency results in decreased blood pressure when a person assumes a standing position and is characterized by lightheadedness, dizziness, and syncope. Symptoms of chronic NOH can be incapacitating -- not only putting patients at high risk for falls and associated injuries -- but also severely affecting the quality of life of patients and their loved ones, and generating significant health care costs. The only FDA-approved treatment for orthostatic hypotension has a black box warning indicating that the drug has not been shown to be effective in alleviating the symptoms of the condition and is associated with a pronounced side-effect profile including significant supine hypertension.

About Northera™

Northera (droxidopa), the lead investigational agent in Chelsea Therapeutics' therapeutic pipeline, is currently in Phase III clinical trials for the treatment of symptomatic neurogenic orthostatic hypotension (NOH) in patients with primary autonomic failure – a group of diseases that includes Parkinson's disease, multiple system atrophy (MSA) and pure autonomic failure (PAF). Droxidopa is a synthetic catecholamine that is directly converted to norepinephrine (NE) via decarboxylation, resulting in increased levels of NE in the nervous system, both centrally and peripherally. Droxidopa is also being studied for the treatment of fibromyalgia in an ongoing Phase II trial and completed a Phase II trial in intradialytic hypotension (IDH) study with positive results.

About Chelsea Therapeutics

Chelsea Therapeutics is a biopharmaceutical development company that acquires and develops innovative products for the treatment of a variety of human diseases. Chelsea's most advanced drug candidate, Droxidopa, is an orally active synthetic precursor of norepinephrine initially being developed for the treatment of neurogenic orthostatic hypotension. In addition to Droxidopa, Chelsea is also developing a portfolio of metabolically inert oral antifolate molecules engineered to have potent anti-inflammatory and anti-tumor activity to treat a range of immunological disorders, including two clinical stage product candidates: CH-1504 and CH-4051. Preclinical and clinical data suggest superior safety and tolerability, as well as increased potency versus methotrexate (MTX).

This press release contains forward-looking statements regarding future events. These statements are just predictions and are subject to risks and uncertainties that could cause the actual events or results to differ materially. These risks and uncertainties include risks and costs of drug development, risk of regulatory approvals, our reliance on our lead drug candidates Droxidopa and CH-4051, our need to raise operating capital, our history of losses, reliance on collaborations and licenses, intellectual property risks, competition, market acceptance for our products if any are approved for marketing and reliance on key personnel including specifically Dr. Pedder.

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