FOR IMMEDIATE RELEASE

ChemGenex to Present Positive Data for Omapro™ from Multiple Clinical Trials at ASH

- **Pivotal data in T315I+ patients via oral presentation on 7th December**
- **Data in multi-resistant CML via oral presentation on 8th December**
- **Phase 2 combination therapy trial presented in a poster session**

MELBOURNE, Australia, and MENLO PARK, California U.S.A. (1 December 2009) – ChemGenex Pharmaceuticals Limited (ASX:CXS) announced today that updated clinical data from several of its clinical trials with Omapro™ (omacetaxine mepesuccinate) will be presented at the upcoming 51st American Society of Hematology Annual Meeting in New Orleans, Louisiana.

Dr. Jorge Cortes, MD, Professor of Medicine and Deputy Chair in the Department of Leukemia at The University of Texas, MD Anderson Cancer Center will present data via oral presentations for both the ChemGenex studies 202 and 203.

On Monday, 7th December at 4:45 p.m. Central Time, Dr. Cortes will present data from "Imatinib-Resistant Chronic Myeloid Leukemia (CML) Patients Who Harbor the Bcr-Abl T315I Mutation in an oral session entitled: Chronic Myeloid Leukemia - Therapy: Managing Resistance and Residual Disease".

During the oral session entitled Chronic Myeloid Leukemia - Therapy: New Trends in Management, Dr. Cortes will present data from "CML Patients Who Are Resistant or Intolerant to Two or More Tyrosine Kinase Inhibitors". This session will take place on Tuesday, 8th December at 8:00 a.m. Central Time.

ChemGenex will also present combination data for Omapro during the poster session entitled: Chronic Myeloid Leukemia - Therapy on Sunday, December 6th from 6:00 to 8:00 p.m. Central Time on Poster Board II-170. This phase 2 trial was designed to study the "Combination of Omacetaxine and Imatinib in the Treatment of Patients with CML in Advanced Stages or After Failure to Imatinib".

About Omapro™ (omacetaxine mepesuccinate)

Omacetaxine mepesuccinate is administered subcutaneously and acts differently from TKIs. It may have a therapeutic advantage for patients who have failed TKIs. Omacetaxine is currently in global phase 2/3 clinical trials for CML and has been granted Orphan Drug designations by the U.S. Food and Drug Administration (FDA) and European Medicines Agency (EMEA) as well as Fast Track status by the FDA.

Omacetaxine is a first-in-class cetaxine with demonstrated clinical activity as a single agent in a range of hematological malignancies. Omacetaxine has a novel mechanism of action, specifically binding to the ribosomal A-site cleft and inhibiting protein translation of short-lived oncoproteins that are

upregulated in leukemic cells (particularly Cyclin-D1, Mcl-1 and c-Myc). In addition, pre-clinical research presented at the 14th Congress of the European Hematology Association (EHA) in Berlin, Germany this summer, demonstrated that omacetaxine kills human CML stem cells that are known to be insensitive to TKIs.

About Chronic Myeloid Leukemia (CML)

Chronic myeloid leukemia (CML) is a cancer of the bone marrow with a worldwide prevalence of approximately 200,000 patients. The bone marrow is responsible for the production of specialized cells that constitute blood; these cells include red blood cells (to carry oxygen around the body), thrombocytes (to help stop bleeding) and certain white cells (part of the body's defense system against infection). In patients with CML the cell production system is diseased and defective. Cells multiply uncontrollably and do not fully develop (differentiate) into functional blood cells.

About ChemGenex Pharmaceuticals Limited

ChemGenex is an oncology focused biopharmaceutical company developing small molecules with new mechanisms of action to treat malignancies with significant unmet medical needs. The company is developing omacetaxine, its lead product candidate, for the treatment of patients with Chronic Myeloid Leukemia (CML), Acute Myeloid Leukemia (AML), and Myelodysplastic Syndrome (MDS). A New Drug Application has been accepted by the U.S. Food and Drug Administration and a Marketing Authorization Application has been validated by the European Medicines Evaluation Agency for CML patients with the Bcr-Abl T315I mutation. The corporate strategy for ChemGenex is to commercialize omacetaxine independently in North America and to establish commercial partnerships in the rest of the world. ChemGenex currently trades on the Australian Stock Exchange under the symbol "CXS" For additional information on ChemGenex Pharmaceuticals please visit the company's website at http://www.chemgenex.com.

Details on the clinical trials can be accessed from the following websites:
http://www.clinicaltrials.gov/ct2/show/NCT00375219?term=homoharringtonine&rank=9 and

http://www.tkiresistantcmltrials.com

Omapro™ is a trademark of ChemGenex Pharmaceuticals Limited

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