

Amarantus Announces Positive Top-Line Interim Clinical Data for Alzheimer's Blood Diagnostic LymPro Test(R)

SAN FRANCISCO and GENEVA, Aug. 1, 2014 (GLOBE NEWSWIRE) --Amarantus Bioscience Holdings, Inc. (OTCQB:AMBS), a biotechnology company focused on the discovery and development of novel diagnostics and therapeutics related to endoplasmic reticulum stress, cell cycle dysregulation, neurodegeneration and apoptosis, today announced positive interim clinical performance data for the Company's proprietary cell cycle dysregulation diagnostic blood assay LymPro Test®, currently under development for Alzheimer's disease diagnosis. In an interim analysis of 44 subjects (34 healthy controls and 10 Alzheimer's patients) from LP-002, a projected 72 patient clinical performance study, the Company announced it achieved replication of the two earlier peer reviewed publications, the primary objective of the study.

"We are very pleased that in this interim analysis with a small sample size, we were able to demonstrate a statistically significant difference between Alzheimer's disease and healthy normal subjects," said Gerald E. Commissiong, President & CEO of Amarantus. It illustrates the robustness of the LymPro assay measures.

The interim analysis completed from the blood samples drawn from the 44 subjects in the LP-002 clinical study was conducted with the primary objective to identify whether the Company could replicate data published in two peer-reviewed publications (Stieler, et al 2001, and Stieler, et al 2012). The expression of the marker CD69 on the surface of lymphocyte subpopulations CD14 (p=0.037) and CD19 (p=0.010) was statistically significantly different between Alzheimer's patients and healthy controls. Moreover, initial predictive models correctly classified AD subjects with an overall accuracy of 80% from a single lymphocyte sub-population (CD19+, unadjusted for training and test sample sets). The Company is currently completing enrollment and will report full data sets later in the third quarter.

"Our initial target market for LymPro will be the pharmaceutical industry, for enrichment of their clinical trial enrollment population prior to undergoing the expense and waste of advanced imaging techniques for Alzheimer's biomarkers for beta amyloid and tau," said Dr. Louis Kirby, consulting neurologist and member of the Amarantus Board of Advisors who is currently overseeing the LymPro team. "Our ability to fine tune the assay to optimize for sensitivity in an Alzheimer's cohort, while retaining acceptable specificity in the non-Alzheimer's cohort is extremely valuable. We are looking forward to completing enrollment in this trial and analyzing the full dataset. Based on the positive signal we have seen today, we will continue our preparations to establish the analytical performance package to validate the LymPro in a contract laboratory to support the pharmaceutical and biotechnology industry."

A copy of the slide presentation announcing the data is available on the company's website at www.Amarantus.com.

About Alzheimer's disease

It is estimated that over 5.4 million people in the United States suffer from Alzheimer's disease and over 500,000 patients are diagnosed annually, with nearly one in eight older Americans affected by the disease. Alzheimer's is the third leading cause of death in the United States. The cost of unpaid care in the United States is estimated at over \$210 billion annually and the total payments for care are estimated at over \$200 billion annually, including \$140 billion in cost to Medicare and Medicaid. It is estimated that the expenditures in the United States will exceed \$1.4 trillion by 2050.

About Amarantus BioScience Holdings, Inc.

Amarantus BioScience Holdings (AMBS) is a biotechnology company developing treatments and diagnostics for diseases associated with neurodegeneration and protein misfolding-related apoptosis. AMBS has licensed Eltoprazine ("Eltoprazine"), a phase 2b ready small molecule indicated for Parkinson's Levodopa induced dyskinesia and Adult ADHD. AMBS has an exclusive worldwide license to the Lymphocyte Proliferation test ("LymPro Test(R)") for Alzheimer's disease and owns the intellectual property rights to a therapeutic protein known as Mesencephalic-Astrocyte-derived Neurotrophic Factor ("MANF") and is developing MANF-based products as treatments for brain disorders. AMBS also owns intellectual property for the diagnosis of Parkinson's disease ("NuroPro") and the discovery of neurotrophic factors ("PhenoGuard"). Amarantus operations are located at Janssen Labs @QB3 in San Francisco, CA. For further information please visit www.Amarantus.com, or connect with the Company on Facebook, LinkedIn, Twitter and Google+.

Certain statements, other than purely historical information, including estimates, projections, statements relating to our business plans, objectives, and expected operating results, and the assumptions upon which those statements are based, are forward-looking statements." These forward-looking statements generally are identified by the words believes," project," expects," anticipates," estimates," intends," strategy," plan," may," will," would," will be," will continue," will likely result," and similar expressions. Forward-looking statements are based on current expectations and assumptions that are subject to risks and uncertainties which may cause actual results to differ materially from the forward-looking statements. Our ability to predict results or the actual effect of future plans or strategies is inherently uncertain. Factors which could have a material adverse effect on our operations and future prospects on a consolidated basis include, but are not limited to: changes in economic conditions, legislative/regulatory changes, availability of capital, interest rates, competition, and generally accepted accounting principles. These risks and uncertainties should also be considered in evaluating forward-looking statements and undue reliance should not be placed on such statements.

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