December 20, 2010

Peregrine Completes Treatment of Last Patient in Phase II Cotara(R) Brain Cancer Trial

Top-Line Survival Data Expected Mid-2011; Company Plans for FDA Meeting to Determine Registrational Pathway

TUSTIN, CA -- (MARKET WIRE) -- 12/20/10 -- Peregrine Pharmaceuticals, Inc. (NASDAQ: PPHM), a clinical-stage biopharmaceutical company developing first-in-class monoclonal antibodies for the treatment of cancer and viral infections, today announced the completion of enrollment in the company's Phase II dose confirmation trial of Cotara® in patients with recurrent glioblastoma multiforme (GBM), the deadliest form of brain cancer. Cotara is a targeted monoclonal antibody linked to a radioisotope that is administered as a single dose directly into the tumor, irradiating the tumor from the inside out, with minimal exposure to healthy tissue.

Interim median overall survival for patients treated with Cotara has ranged from 38 to 41 weeks, with 86 weeks from 14 patients at a single medical center. Expected survival is only approximately 24 weeks for recurrent GBM patients. Cotara has been granted orphan drug status and fast track designation for the treatment of GBM and anaplastic astrocytoma by the U.S. Food and Drug Administration.

"As currently approved therapies have failed to improve overall survival for recurrent GBM patients, the interim overall survival reported to date from our Cotara trials has been quite remarkable and we are eager to advance our treatment into a registrational trial," said Joseph S. Shan, vice president of clinical and regulatory affairs at Peregrine. "We expect top-line data to be available by mid-year 2011 and plan to meet with the FDA to define the optimal registration pathway for Cotara."

About Cotara
Cotara is an investigational targeted monoclonal antibody linked to a radioisotope that is administered as a single dose directly into the tumor, irradiating the tumor from the inside out, with minimal exposure to healthy tissue. Peregrine's Phase II open-label trial was designed to enroll 40 GBM patients at first relapse at multiple sites in the U.S. and India. The primary endpoint is safety and tolerability of the maximum tolerated dose, a single 25-hour interstitial infusion of 2.5 mCi/cc of Cotara. Secondary endpoints include overall survival, progression free survival, and proportion of patients alive at six months after treatments.

About Brain Cancer
According to the American Cancer Society, in 2010 there will be an estimated 22,000 malignant tumors diagnosed and approximately 13,000 deaths attributed to brain or spinal cord cancer in the United States. The most common type of brain cancer is glioblastoma multiforme (GBM), which accounts for 60% of all malignant brain cancers. An aggressive form of cancer, GBM is the deadliest form of brain cancer, with a five-year survival rate of only 3%. Currently approved therapies include Temodar® (temozolomide) and Avastin® (bevacizumab), both of which have modest effect on patient survival.

About Peregrine Pharmaceuticals
Peregrine Pharmaceuticals, Inc. is a biopharmaceutical company with a portfolio of innovative monoclonal antibodies in clinical trials for the treatment of cancer and serious viral infections. The company is pursuing multiple clinical programs in cancer and hepatitis C virus infection with its lead product candidate bavituximab and novel brain cancer agent Cotara®. Peregrine also has in-house cGMP manufacturing capabilities through its wholly-owned subsidiary Avid Bioservices, Inc. (www.avidbio.com), which provides development and biomanufacturing services for both Peregrine and outside customers. Additional information about Peregrine can be found at www.peregrineinc.com.

Safe Harbor Statement: Statements in this press release which are not purely historical, including statements regarding Peregrine Pharmaceuticals' intentions, hopes, beliefs, expectations, representations, projections, plans or predictions of the future are forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995. The forward-looking statements involve risks and uncertainties including, but not limited to, the risk that results from this trial will not be consistent with results experienced in earlier clinical trials and preclinical studies, the risk that results may not support registration filings with the U.S. Food and Drug Administration, and the risk that Peregrine may not have or raise adequate financial resources to complete the planned clinical programs. Factors that could cause actual results to differ materially or otherwise adversely impact the company's ability to obtain regulatory approval for its product candidates include, but are not limited to, uncertainties associated with completing preclinical and clinical trials for our technologies; the early stage of product development; the significant costs to develop our products as all of our products are currently in development, preclinical studies or clinical trials; obtaining additional financing to support our operations and the development of our products;

obtaining regulatory approval for our technologies; anticipated timing of regulatory filings and the potential success in gaining regulatory approval and complying with governmental regulations applicable to our business. Our business could be affected by a number of other factors, including the risk factors listed from time to time in the company's SEC reports including, but not limited to, the annual report on Form 10-K for the year ended April 30, 2010 and the quarterly report on Form 10-Q for the quarter ended October 31, 2010. The company cautions investors not to place undue reliance on the forward-looking statements contained in this press release. Peregrine Pharmaceuticals, Inc. disclaims any obligation, and does not undertake to update or revise any forward-looking statements in this press release.

Peregrine Contact:

Amy Figueroa

Peregrine Pharmaceuticals

(800) 987-8256

info@peregrineinc.com

Source: Peregrine Pharmaceuticals

News Provided by Acquire Media