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Zafgen Completes Enrollment of Phase 2a Trial of Beloranib in Hypothalamic Injury-Associated Obesity

BOSTON, Sept. 25, 2014 (GLOBE NEWSWIRE) -- Zafgen, Inc. (Nasdaq:ZFGN), a biopharmaceutical company dedicated to significantly improving the health and well-being of patients affected by obesity and complex metabolic disorders, today announced that the Company has completed enrollment of ZAF-221, a Phase 2a clinical trial of beloranib in the treatment of hypothalamic injury-associated obesity (HIAO). The objective of the study is to evaluate the efficacy and safety of beloranib in HIAO patients over four weeks of randomized treatment, followed by an optional four-week open-label extension. The trial includes 14 obese patients with radiographically confirmed hypothalamic damage who have been enrolled at four trial centers, two in the United States and two in Australia.

HIAO is most commonly caused by damage incurred during removal of a central nervous system tumor called craniopharyngioma, but can also result from less common types of hypothalamic injury. Craniopharyngioma is a rare form of benign brain tumor that occurs most commonly during childhood and infiltrates near the optic nerve, pituitary gland and hypothalamus. Following surgical resection and radiation treatment, hypothalamic dysfunction results in hyperphagia and significant obesity in approximately 50% of these patients, causing a variety of co-morbid conditions and a deteriorated quality of life.

"The completion of enrollment for the ZAF-221 trial represents an important step forward for both Zafgen and beloranib," said Thomas Hughes, Ph.D., Chief Executive Officer of Zafgen. "ZAF-221 will provide us with a first look in patients with HIAO to determine if beloranib has the potential to be a significant new treatment for patients afflicted with this life altering form of obesity. Zafgen expects to complete this study in the fourth quarter of this year."

The ZAF-221 trial consists of randomized, double-blind, placebo controlled, twice-weekly subcutaneous injections of 1.8 mg beloranib or placebo in 14 obese patients with radiographically confirmed hypothalamic damage. The primary outcome measure is change in body weight from baseline to the end of the randomized dosing period of four weeks. Secondary outcomes include changes in the patient's lipid profile, hs-CRP (a marker of systemic inflammation), sense of hunger, and quality of life.

"Currently, there is no marketed treatment available for hypothalamic injury-associated obesity. Patients often experience uncontrollable hunger, much like patients with Prader-Willi syndrome, which can result in hyperphagia and significant obesity," said Dennis Kim, M.D., Chief Medical Officer of Zafgen. "We have seen the therapeutic benefits of beloranib demonstrated in five clinical trials for multiple obesity-related conditions to date, and look forward to learning more from this study regarding beloranib's prospects as a potential treatment for HIAO patients."

For more information about this trial, please visit www.clinicaltrials.gov.

About Beloranib

Beloranib is a novel, first-in-class injectable small molecule therapy with a unique mechanism of action that reduces hunger while stimulating the use of stored fat as an energy source. Beloranib is a potent inhibitor of MetAP2, an enzyme that modulates the activity of key cellular processes that control metabolism. MetAP2 inhibitors work, at least in part, by directing MetAP2 binding to cellular stress mediators, and, thus, reducing the tone of signals that drive lipid synthesis by the liver and fat storage throughout the body. In this manner, MetAP2 inhibition increases metabolism of fat as an energy source. Zafgen holds exclusive worldwide rights (exclusive of South Korea) for the development and commercialization of beloranib. Zafgen exclusively licensed beloranib from Chong Kun Dang (CKD) Pharmaceutical Corp. of South Korea.

About Hypothalamic Injury-Associated Obesity (HIAO)

Hypothalamic injury-associated obesity (HIAO) is most commonly caused by damage incurred during removal of a central nervous system tumor called craniopharyngioma but it can also result from less common types of hypothalamic injury such as a strokes, brain trauma, or radiation therapy to the brain. Craniopharyngioma is a rare form of benign brain tumor that occurs most commonly during childhood and infiltrates near the optic nerve, pituitary gland and the hypothalamus. Treatment of these tumors commonly involves surgical removal of the tumor mass, followed by radiation treatment, which results in disruption or removal of neighboring structures including the hypothalamus. Post-treatment hypothalamic dysfunction results in hyperphagia and significant obesity in approximately 50% of these patients, resulting in a variety of co-morbid conditions and a deteriorated quality of life.Craniopharyngioma-associated obesity occurs in males and females equally and in all races, with the same

incidence around the world. The incidence estimates have ranged from 0.13 to 0.17 per 100,000 per year, or approximately 400 to 500 new cases per year in the United States and 650 to 850 new cases per year in the European Union.

About Zafgen

Zafgen (Nasdaq:ZFGN) is a biopharmaceutical company dedicated to significantly improving the health and well-being of patients affected by obesity and complex metabolic disorders. Zafgen is focused on developing novel therapeutics that treat the underlying biological mechanisms through the MetAP2 pathway. Beloranib, Zafgen's lead product candidate, is a novel, first-in-class, twice-weekly subcutaneous injection being developed for the treatment of multiple indications, including severe obesity in two rare diseases, Prader-Willi syndrome and hypothalamic injury-associated obesity (HIAO), including craniopharyngioma-associated obesity; and severe obesity in the general population. Zafgen aspires to improve the lives of patients through targeted treatments and has assembled a team accomplished in bringing therapies to patients with both rare and prevalent metabolic diseases.

Safe Harbor Statement

Various statements in this release concerning Zafgen's future expectations, plans and prospects, including without limitation, Zafgen's expectations regarding beloranib as a treatment for PWS and other forms of severe obesity including hypothalamic injury-associated obesity (HIAO), its expectations with respect to the timing and success of its clinical trials, the expected timing of additional clinical trials, its plans regarding commercialization of beloranib and its expectations relating to available cash and cash equivalents at the end of 2014 may constitute forward-looking statements for the purposes of the safe harbor provisions under The Private Securities Litigation Reform Act of 1995 and other federal securities laws. Forward-looking statements can be identified by terminology such as "anticipate," "believe," "could," "could increase the likelihood," "estimate," "expect," "intend," "is planned," "may," "should," "will," "will enable," "would be expected," "look forward," "may provide," "would" or similar terms, variations of such terms or the negative of those terms. Actual results may differ materially from those indicated by these forward-looking statements as a result of various important factors, including, without limitation, Zafgen's ability to successfully demonstrate the efficacy and safety of its drug candidates, the pre-clinical and clinical results for its product candidates, which may not support further development of product candidates, actions of regulatory agencies, which may affect the initiation, timing and progress of clinical trials, obtaining, maintaining and protecting intellectual property, Zafgen's ability to enforce its patents against infringers and defend its patent portfolio against challenges from third parties, competition from others developing products for similar uses, Zafgen's ability to manage operating expenses, Zafgen's ability to obtain additional funding to support its business activities and establish and maintain strategic business alliances and new business initiatives, Zafgen's dependence on third parties for development, manufacture, marketing, sales and distribution of products, the outcome of litigation, and unexpected expenditures, as well as those risks more fully discussed in the section entitled "Risk Factors" in the final prospectus related to Zafgen's initial public offering filed with the Securities and Exchange Commission pursuant to Rule 424(b) of the Securities Act, as well as discussions of potential risks, uncertainties, and other important factors in Zafgen's subsequent filings with the Securities and Exchange Commission. In addition, any forward-looking statements represent Zafgen's views only as of today and should not be relied upon as representing its views as of any subsequent date. Zafgen explicitly disclaims any obligation to update any forward-looking statements, whether as a result of new information, future events or otherwise.

CONTACT: FTI Consulting

Brian Ritchie

Investor Relations

(212) 850-5683

Brian.Ritchie@fticonsulting.com

Shauna Elkin

Media Relations

(212) 850-5613

Shauna.Elkin@fticonsulting.com

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