

CAREFNDR: Phase 3, Randomized, Double-Blind, Placebo-Controlled Study of Paltusotine in Adults With Carcinoid Syndrome Due to Well-Differentiated Neuroendocrine Tumors

Aman Chauhan, MD¹; Martyn Caplin, MD²; Rocio Garcia-Carbonero, MD, PhD³; Daniel M. Halperin, MD⁴; Dieter Hörsch, MD⁵; Amr Mohamed, MD⁶; Juan Manuel O'Connor, MD, MSc⁷; Michael J. Demeure, MD, MBA⁸; Mary A. Maluccio, MD, MPH⁹; Denka Markova, PhD¹⁰; Tiffany P. Quock, PhD, MS¹⁰; Zaineb Sharafali, MPH¹⁰; Zhimin Xiao, MD, MS, MPH¹⁰; Bin Zhang, MD, MSc¹⁰

¹Sylvester Comprehensive Cancer Center, University of Miami Health System, Miami, Florida, USA; ²Royal Free Hospital London and University College London, London, UK; ³Hospital Universitario 12 de Octubre, Ima12, UCM, Madrid, Spain; ⁴Winship Cancer Institute, Emory University, Atlanta, Georgia, USA; ⁵Zentralklinik Bad Berka, Bad Berka, Germany; ⁶University Hospitals Seidman Cancer Center, Case Western Reserve University, Cleveland, Ohio, USA; ⁷Instituto Alexander Fleming, Buenos Aires, Argentina; ⁸Hoag Family Cancer Institute, Newport Beach, California, USA; ⁹LSU Health Sciences Center, New Orleans, Louisiana, USA; ¹⁰Crinetics Pharmaceuticals, Inc., San Diego, California, USA

Background

- Paltusotine (PALSONIFY™) is an oral, once-daily, non-peptide, selective somatostatin 2 (SST2) receptor agonist approved by the US FDA for the treatment of adults with acromegaly who had an inadequate response to surgery and/or for whom surgery is not an option^{1,2}
- Paltusotine is currently being investigated for the treatment of carcinoid syndrome (CS); the safety and efficacy for use in this new indication have not been fully evaluated by Regulatory Authorities
- In a phase 2, open-label, dose-ranging study (NCT05361668), paltusotine reduced the frequency and severity of CS symptoms and was well tolerated

Objective

- To evaluate the efficacy and safety of paltusotine for the treatment of patients with CS in a phase 3, randomized, double-blind, placebo-controlled trial

Key Inclusion Criteria

- Male or female ≥18 years of age
- Well-differentiated Grade 1 or Grade 2 neuroendocrine tumor (NET)
 - Positive somatostatin receptor tumor status (previously documented or established during screening)
- Carcinoid syndrome: flushing with or without frequent bowel movements (BMs)
- Somatostatin receptor ligand (SRL) naïve or untreated for ≥16 weeks or currently treated with SRL and agree to washout
- If SRL naïve or untreated for ≥16 weeks
 - >1 flushing episode/day (14-day average)
 - 5-HIAA or serotonin ≥2× the upper limit of normal
- If SRL washout
 - Symptom control on SRL
 - Increase in flushing frequency to >1 flushing episode/day (14-day average)
 - History of elevated 5-HIAA or serotonin (in urine or blood sample)

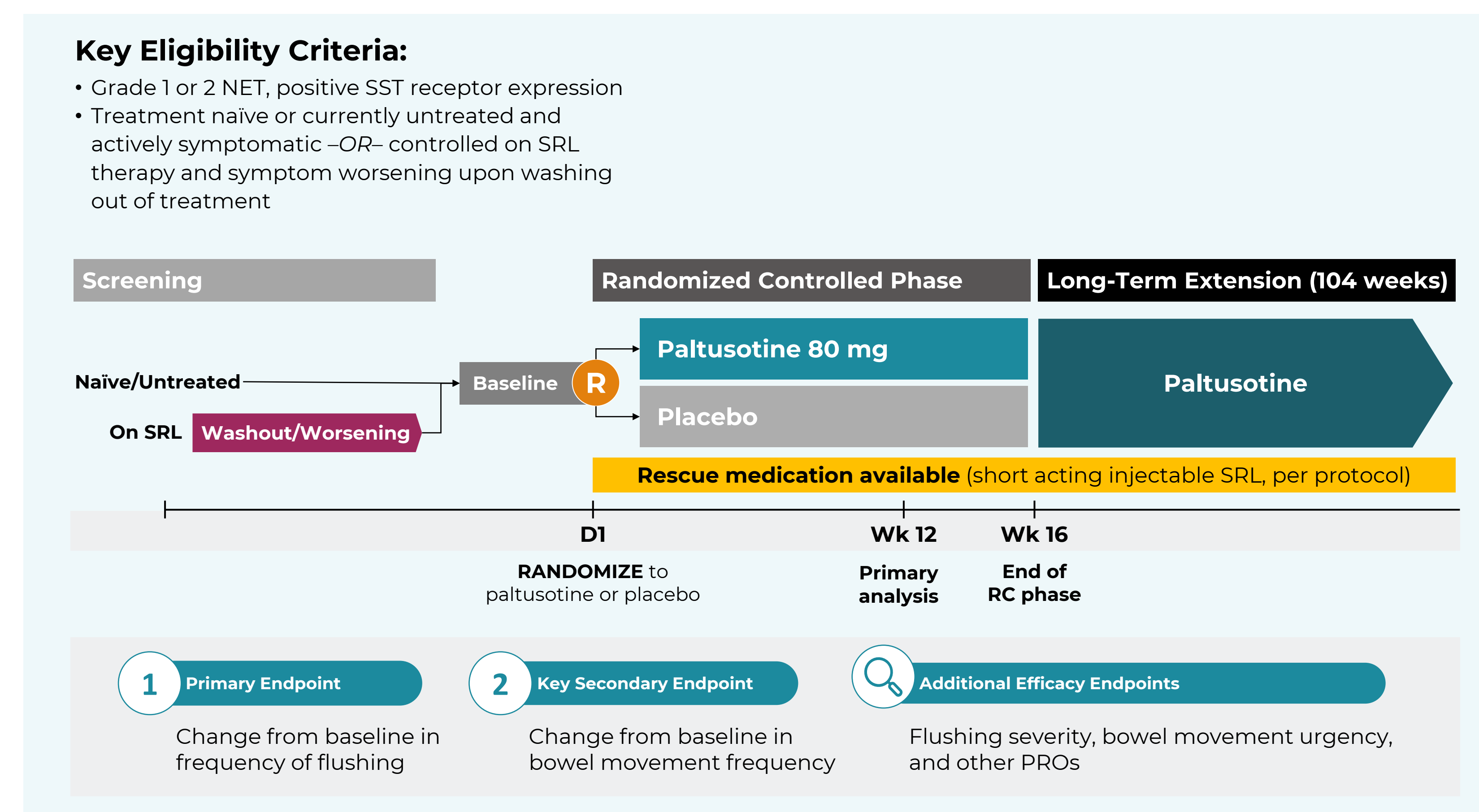
Key Exclusion Criteria

- Diarrhea attributed to any condition(s) other than CS
- Need second-line treatment (eg, telotristat) for control of CS symptoms
- Treatment with specific NET therapy (eg, everolimus, sunitinib) <4 weeks before screening or hepatic embolization, radiotherapy, peptide receptor radionuclide therapy, and/or tumor debulking <12 weeks before screening
- Documented prior nonresponse to SRL

Methods

- Phase 3, multicenter, randomized, parallel-group double-blind, placebo-controlled trial (NCT07087054)
- Approximately 141 adults with CS to be randomized in a 2:1 ratio to once-daily paltusotine 80 mg or matching placebo
- Electronic CS symptom diary (CSSD) to be completed daily
- Antidiarrheal medications (eg, loperamide, diphenoxylate atropine) and rescue medications (eg, short-acting octreotide) are permitted
- Open-label extension to include assessment of anti-tumor effects (eg, progression-free survival)

Study Design



Efficacy Endpoints

Primary Endpoint

- Flushing episodes per day: change from baseline to Week 12 (14-day average)

Key Secondary Endpoint

- BMs per day: change from baseline to Week 12 (14-day average)

REFERENCES

1. Zhao J, et al. *ACS Med Chem Lett*. 2023;14(1):66-74. 2. Madan A, et al. *Pituitary*. 2022;25(2):328-339.

ACKNOWLEDGMENTS

This study was funded by Crinetics Pharmaceuticals, Inc. Technical editorial and medical writing assistance were provided under the direction of the authors by Janetrick Okeyo, PhD, Crinetics Pharmaceuticals, and Synchrony Medical Communications, LLC, West Chester, PA, USA; funding for this support was provided by Crinetics Pharmaceuticals, Inc.

DISCLOSURES

A. Chauhan reports serving as a principal investigator for Crinetics; receiving research support from Bristol Myers Squibb, Clovis Oncology, EMD Serono, Lexicon Pharmaceuticals, Nano-Pharmaceutics, Novartis, Seneca Therapeutics, and TerSera Therapeutics; and being an advisor for Boehringer Ingelheim, Crinetics, Exelixis, Ipsen Biopharmaceuticals, Lexicon Pharmaceuticals, Novartis/Advanced Accelerator Applications, Seneca Therapeutics, and TerSera Therapeutics. M. Caplin reports serving as a principal investigator for Crinetics. R. Garcia-Carbonero reports serving as a principal investigator for Crinetics. D. M. Halperin reports serving as a principal investigator for Crinetics. D. Hörsch reports serving as a principal investigator for Crinetics. A. Mohamed reports serving as a principal investigator and advisor for Crinetics and being a speaker for Ipsen Biopharmaceuticals. J. M. O'Connor reports serving as a principal investigator for Crinetics; receiving grant/research funding from Amgen, Bristol Myers Squibb, Merck Serono, MSD, Pfizer, and Sanofi; and receiving honoraria or being an advisor for Bristol Myers Squibb, MSD, Pfizer, and Sanofi. M. J. Demeure reports serving as a principal investigator for Crinetics. M. A. Maluccio reports serving as a principal investigator for Crinetics. D. Markova, T. P. Quock, Z. Sharafali, Z. Xiao, and B. Zhang are employees of Crinetics Pharmaceuticals.

Summary

- Results from the phase 2 study of paltusotine in patients with CS have supported the design of this phase 3 study
- The CAREFNDR phase 3 trial is underway and will enroll patients in approximately 100 sites (15 countries) to evaluate the efficacy and safety of paltusotine in the treatment of CS
- More information about this study is available at www.carefndr.com

Efficacy Endpoints (continued)

Other Secondary Endpoints

- BMs per day: change from baseline to Week 12 (14-day average) in patients with >3 BMs per day at baseline
- Flushing severity: change from baseline to Week 12 (14-day average)
- BM urgency episodes per day: change from baseline to Week 12 (14-day average) in patients with >1 BM urgency episode per day at baseline
- Percentage of treatment days with short-acting octreotide use
- Total number of treatment days with ≤3 BMs in participants with >3 BMs per day at baseline
- Percentage of treatment days with antidiarrheal medication use
- Total number of treatment days with zero flushing episodes; proportion of patients with zero flushing episodes (14-day average)

Exploratory Biomarkers

- Plasma 5-HIAA and serum serotonin

Safety Endpoints

- Incidence of adverse events (AEs), including serious AEs and AEs leading to treatment discontinuation
- Clinical laboratory tests, vital signs, electrocardiogram

Pharmacokinetic Endpoint

- Plasma paltusotine concentration

