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primary studies - published RCT

## **Gastric emptying, incretin hormone secretion, and postprandial glycemia in cystic fibrosis--effects of pancreatic enzyme supplementation.**

**Code:** PM21389144

**Year:** 2011 **Date:** 2011

**Author:** Kuo P

### **Study design (if review, criteria of inclusion for studies)**

randomized, double-blind, placebo-controlled crossover study

### **Participants**

Five nondiabetic CF patients (three males; age, 25.8 +/- 1.0 yr; body mass index, 20.2 +/- 1.1 kg/m(2)) with exocrine pancreatic insufficiency and six healthy subjects of similar age and body mass index participated in the study.

### **Interventions**

CF patients consumed a radiolabeled mashed potato meal on 2 separate days, together with four capsules of Creon Forte (100,000 IU lipase) or placebo. Healthy subjects consumed the meal once, without pancreatic enzymes.

### **Outcome measures**

Gastric emptying was measured using scintigraphy, and blood was sampled frequently for blood glucose and plasma glucagon-like peptide-1 (GLP-1), glucose-dependent insulinotropic polypeptide (GIP), and glucagon concentrations.

### **Main results**

CF patients had more rapid gastric emptying (P

### **Authors' conclusions**

Pancreatic enzyme supplementation plays an important role in incretin secretion, gastric emptying, and postprandial hyperglycemia in CF.

<http://dx.doi.org/10.1210/jc.2010-2460>

### **See also**

J Clin Endocrinol Metab. 2011 May;96(5):E851-5. Epub 2011 Mar 9.

### **Keywords**

Adult; Gastrointestinal Diseases; Hypoglycemic Agents; Insulin; pharmacological\_intervention; Pancreas insufficiency; Pancreatic Diseases; Pancreatic Enzyme Replacement Therapy; Supplementation; Malabsorption; Nutrition Disorders; Capsules; Creon; Gastrointestinal Agents;