

## **Anti-pancreatic lipase and antioxidant activity of selected tropical herbs.**

### **Abstract**

The anti-pancreatic lipase and antioxidant activity of *Momordica charantia*, *Morinda citrifolia* fruit, and *Centella asiatica* extract were evaluated for potential use as an anti-obesity agent. Antioxidant activity of the extracts was determined using 2,2-diphenyl-1-picrylhydrazyl and ferric-reducing antioxidant power assays. Inhibition of pancreatic lipase was measured in vitro. Results from this study showed that *Momordica charantia*, *Morinda citrifolia* fruit, and *Centella asiatica* extract exhibited different levels of antioxidant activity, with IC<sub>50</sub> ranging from  $0.90 \pm 0.1$  to  $3.7 \pm 0.8$  mg/mL of extracts. All extracts were found to inhibit pancreatic lipase activity, with *Momordica charantia*, *Morinda citrifolia* fruit, and *Centella asiatica* extract demonstrating  $21.0 \pm 1.3$ ,  $25.8 \pm 0.1$ , and  $25.3 \pm 0.4\%$  inhibition, respectively.

**Keyword:** Antioxidant; Catechin; Obesity; Pancreatic lipase; Tropical herbs.