The GH-Method

Hypothesis on Glucose Production Communication Model between the Brain and Internal Organs via Investigating the PPG Values of Pan-Fried Solid Egg Meal vs. Egg Drop Liquid Soup Meal (No. 237)

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Abbreviations: PPG: postprandial plasma glucose; CGM: continuous glucose monitor

1. INTRODUCTION

To establish a specific neurological communication model within the nervous system governing the relationship between the brain and liver in the production of postprandial plasma glucose (PPG).

2. METHODS

The following research methodologies were employed:

A. A continuous glucose monitor (CGM) device was utilized to amass a dataset comprising 48,740 glucose measurements over the course of 647 days.

B. The study concentrated on two meal categories, both exclusively involving eggs. A single large egg contains proteins (6.3g), fats (5g), and a minor quantity of carbohydrates (0.38g), as depicted in Figure 1.

C. The same food materials were employed, but different cooking methods were applied to create two distinct meal types: soup-based (liquid) meals and pan-fried (solid) meals for the purpose of comparison.

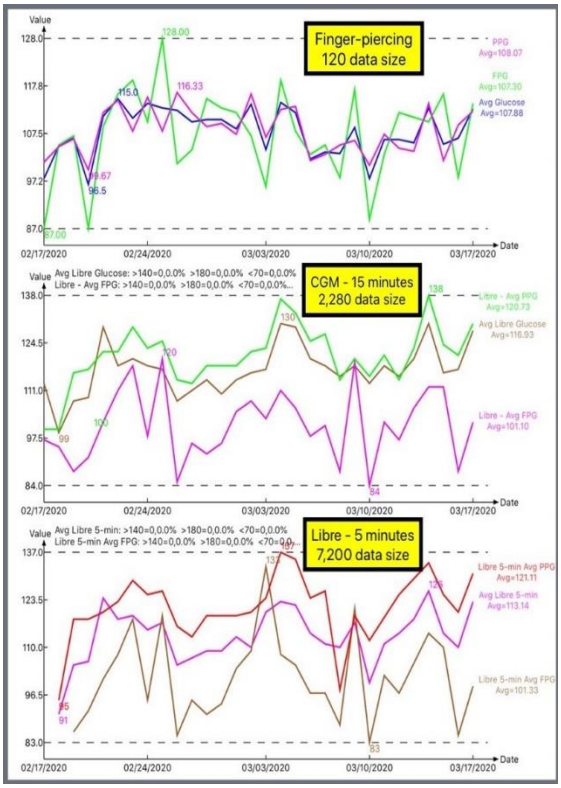

Figure 1: Comparison of daily glucose, FPG, and PPG for finger-piercing, CGM 15 minutes, CGM 5 minutes.

3. RESULTS

The results of this study are summarized as follows:

The PPG "difference" is defined as the discrepancy between the "peak" PPG and the "starting" PPG. This difference manifests a notable 1:5 ratio, with PPG differences of 4

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mg/dL for soup-based liquid meals compared to 22 mg/dL for pan-fried solid meals. The average sensor PPG values exhibit a 19% difference, with values of 117 mg/dL for liquid meals compared to 139 mg/dL for solid meals. However, there is a relatively minor disparity in finger-piercing PPG values, with 108 for liquid meals and 115 for solid meals.

A pivotal discovery is that egg drop liquid food yields significantly lower glucose levels compared to pan-fried egg solid food.

4. CONCLUSION

By leveraging this discovery, it becomes possible to "trick" the brain into regulating glucose production to a lower extent after food intake, without needing to modify or compromise essential food ingredients and nutritional balance. As a result, individuals with diabetes can simply alter their cooking methods to reduce their peak PPG values and average PPG levels, offering a promising avenue for diabetes management.