



*Malays. Appl. Biol.* (2018) 47(4): 71–77

## **NUTRIENT COMPOSITION OF FIVE SELECTED GLUTINOUS**

### **RICE-BASED TRADITIONAL**

### **MALAYSIAN *KUIH***

AZIZAH MAHMOOD<sup>1</sup>, LYE YUEEN MEI<sup>1</sup>, MOHD FAIRULNIZAL MD NOH<sup>2</sup> and

HAYATI MOHD YUSOF<sup>1\*</sup>

<sup>1</sup>*School of Food Science and Technology, Universiti Malaysia Terengganu,*

*21030 Kuala Nerus, Terengganu*

<sup>2</sup>*Cardiovascular, Diabetes, Nutrition Research Centre (CDNRC),*

*Institute for Medical Research, Jalan Pahang, 50588 Kuala Lumpur*

*\*E-mail: hayatimy@umt.edu.my*

Accepted 6 September 2018, Published online 25 October 2018

## **ABSTRACT**

The latest Malaysian Food Composition Database (FCD) of 1997 edition still has limited list of

nutrient resources. This study aims to provide new data on the nutritional compositions of five commonly consumed glutinous rice-based traditional Malaysian kuih. Analyses of proximate and mineral composition were carried out on the selected

*kuih*

, including

*Pulut Serunding,*

*Tepung Gomak, Badak Berendam, Kuih Dangai*

and

*Pulut Berinti*

. Milk powder (

*Ensure*

brand) and cream cracker (

*Jacobs'*

brand) were used as Standard Reference Materials (SRM) and analyzed ten times in different days to provide more reliable

and relevant data. Depending on the method of preparation and the ingredients used, nutrient composition varies between

different types of

*kuih*

. Among the traditional

*kuih*

,

*Badak Berendam*

was the highest in moisture content,

*Kuih Dangai*

was

the highest in energy, fat and phosphorus content, and

*Tepung Gomak*

was the highest in crude fibre and carbohydrate.

Meanwhile, both

*Pulut Serunding*

and

*Kuih Dangai*

showed significant protein levels, and

*Pulut Serunding*

and

*Pulut Berinti*

showed high in ash content. All types of

*kuih*

contain high amount of sodium (66-71 mg/100g), except

*Badak Berendam*

.

Levels of potassium, iron and zinc in 100g of kuih were in the range of 26-96 mg, 0.6-1.0 mg and 0.3-0.6 mg, respectively.

Results for each analysis are valid with high acceptability due to standardized sampling procedure with internal quality control

for laboratory performance. Updating the FCD will help dieticians and other nutrition professionals assess dietary status and planning, and evaluate adequacy of meals and diets intake for in hospitalized patients, students, and other population groups.

**Key words:** Proximate value, mineral composition, traditional *kuih*, glutinous rice