PENENTUAN KADAR VITAMIN B1 PADA BERAS PECAH KULIT DAN BERAS GILING DENGAN METODE SPEKTROFOTOMETRI UV-VIS

(DETERMINATION OF THIAMIN IN BROWN RICE AND MILLED RICE USING UV-VIS SPEKTROFOTOMETRY METHOD)

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ABSTRAK

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Berdasarkan cara pengolahannya beras dibedakan menjadi dua yaitu beras pecah kulit dan beras giling. Gabah yang hanya terkupas bagian kulit luar atau sekamnya disebut beras pecah kulit. Sedangkan beras pecah kulit yang seluruh kulit arinya telah dipisahkan dalam proses penyosohan disebut beras giling. Penelitian ini bertujuan untuk mengetahui kadar vitamin B1 pada beras pecah kulit dan beras giling.

Penentuan kadar vitamin B1 pada beras pecah kulit dan beras giling dilakukan dengan metode spektrofotometri UV-vis.Beras pecah kulit dan beras giling dihaluskan dengan cara diblender sehingga diperoleh bahan berupa tepung beras. Penentuan kadar vitamin B1 dengan spektrofotometer UV-Vis dilakukan dengan mengukur absorbansi larutan uji pada panjang gelombang maksimum dan dengan blangko HCl 0,1 N.

Hasil penelitian menunjukkan bahwa nilai absorbansi beras pecah kulit lebih tinggi daripada beras giling. Kadar vitamin B1 pada beras sampel pecah kulit dan beras giling berturut-turut sebesar 0,465 mg/100 gram dan 0,426 mg/ 100 gram.

Kata kunci : Vitamin B1, Beras Pecah Kulit, Beras Giling, Spektrofotometri UV-vis

ABSTRACT

Depends on its technique of processing, type of rice devided into brown rice and milled rice. Brown rice is grain that separated from its husk. And milled rice is the brown rice that policed to remove the rice from its caryopsis. The research was aimed to determine the thiamin content of brown rice and milled rice.

Thiamin content in Brown rice and milled rice were analysed using UV-Vis Spektrofotometry Method. Brown rice and milled rice were mashed into powder form using blender. The determination of thiamin content by Uv-Vis Spektrofotometer was analysed by measuring sample's absorbance value at maximum wavelenght and HCl 0,1 N as the blanko.

From the result of absorbance value measurement, brown rice has a bigger absorbance value than it is in milled rice. It was found that the thiamin content in brown rice and milled rice respectively were 0,465 mg/gram and 0,426 mg/gram.

Keywords: Thiamin, Brown Rice, Milled Rice, UV-Vis Spektrofotometry