

Comparison of Milled Rice Physicochemical Properties between Risotto Rice Varieties and Taiwanese Rice Varieties¹

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Abstract

Risotto is a common national meal in restaurants. Although there have been many studies on the physical and chemical properties of rice cultivars, there is no assessment of whether Taiwanese varieties are suitable for risotto. This study was to compare the physicochemical properties of imported risotto rice varieties and Taiwanese rice varieties. The milled rice length, widths and thicknesses of the risotto rice were between 5.47-7.16 mm, 2.95-3.12 mm, and 1.94-2.07 mm, respectively. The hardness of risotto rice varieties were between 6.02-10.02 kgf, the viscosity were between 0.15-0.55 kgf. Results of water absorption analysis showed that risotto rice varieties were between 61.27%-82.49%. In this study, the characteristics of risotto rice were summarized as large grain size, slightly poor water absorption, hard taste, low viscosity, but there is no similar varieties in Taiwan. In this study, HKB228 is the closest to the risotto rice variety in grain shape and physicochemical properties, and with the opportunity to a risotto rice variety in Taiwan.

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