

**ANALISIS KUALITAS FISIK DAN SENSORIS BERAS PRATANAK
(PARBOILED RICE) SEBAGAI FUNGSI DARI LAMA WAKTU
PERENDAMAN DAN PENGUKUSAN GABAH**

ABSTRAK

Oleh:

WAHYU ISMI DESTIANINGRUM

15/379215/TP/11171

Masih banyak permasalahan yang dihadapi terkait mutu beras, salah satunya yaitu sulitnya menghindari patahan dalam butir beras. Hal tersebut dapat terjadi pada saat proses pengupasan sekam (*husking*) dan proses penyosohan beras. Ketika presentase beras banyak mengandung patah dan menir, akan membuat harga jual beras menjadi rendah. Salah satu alternatif solusi yang dapat dilakukan untuk mengatasi permasalahan tersebut adalah dengan mengolah gabah menjadi beras pratanak. Beras pratanak adalah beras yang dihasilkan dari proses pratanak. Pratanak merupakan proses perendaman gabah dalam air dan proses pemberian uap panas dengan cara pengukusan, yang selanjutnya dilakukan proses pengeringan. Penelitian ini bertujuan untuk mengkaji kualitas fisik dan sensoris beras pratanak (*parboiled rice*) sebagai fungsi dari lama waktu perendaman dan pengukusan gabah. Bahan yang digunakan pada penelitian ini adalah gabah pratanak dengan kadar air 14% wb hasil dari perendaman 2, 3, 4 jam dan pengukusan 10, 20, 30 menit. Dalam penelitian ini dilakukan analisis kualitas fisik beras meliputi *lightness*, *whiteness*, kekerasan, rendemen beras, presentase beras kepala, presentase butir patah dan menir. Perlakuan terbaik terdapat pada waktu perendaman 4 jam dan waktu pengukusan 30 menit yang menghasilkan kekerasan sebesar 6,83 kgf; beras kepala 92,53%; butir patah sebesar 6,43%; menir sebesar 1,03%; rendemen 97,29%; *lightness* sebesar 54,95 dan *whiteness* sebesar 48. Selain itu dilakukan analisis statistik pada hasil uji sensoris nasi meliputi atribut warna, aroma, rasa dan penerimaan keseluruhan. Hasil uji sensoris nasi pratanak yang paling banyak disukai panelis yaitu warna nasi dengan perlakuan 3 jam 30 menit, aroma nasi dengan perlakuan 2 jam 30 menit, rasa dengan perlakuan 2 jam 30 menit dan penerimaan keseluruhan dengan perlakuan 3 jam 30 menit. Panelis lebih menyukai nasi tanpa perlakuan pratanak dibandingkan nasi dengan perlakuan pratanak. Kelebihan dari pratanak adalah mencegah kerusakan beras sehingga presentase kepala meningkat serta patah dan menir menurun. Menghindari kehilangan nilai gizi dan nilai indeks glikemik rendah.

Kata kunci: Beras pratanak (*parboiled rice*), kualitas fisik, sensoris, perendaman, pengukusan.

ANALYSIS OF PHYSICAL QUALITIES AND SENSORY OF PARBOILED RICE AS FUNCTION OF SOAKING AND STEAMING TIME OF ROUGH RICE

ABSTRACT

By:

WAHYU ISMI DESTIANINGRUM

15/379215/TP/11171

There are still many problems faced regarding the quality of rice, one of which is the difficulty of avoiding broken rice grains. This can occur during the husking and whitening process of rice. When the percentage of rice contains a lot of broken and small broken (menir), it will reduce the selling price of rice. One alternative solution that can be done to overcome these problems is by processing rough rice into parboiled rice. Parboiled rice is rice produced from the parboiled process. Parboiled is a process of soaking rough rice in water and the process of giving steam by steaming, which is then carried out by the drying process. This study aims to examine the physical qualities and sensory of parboiled rice as a function of the duration of soaking and steaming of rough rice. The material used in this study was parboiled rough rice with a moisture content of 14% wb resulting from 2, 3, and 4 hours of immersion and 10, 20, and 30 minutes of steaming. In this study, an analysis of the physical qualities of rice included lightness, whiteness, hardness, rice yield, percentage of head rice, percentage of broken grains and small broken. The best treatment was found at 4-hour soaking time and 30 minutes steaming time which resulted in hardness of 6.83 kgf; 92.53% of rice head; 6.43% of broken grain; 1.03% of small broken; yield of 97.29%; lightness of 54.95 and whiteness of 48.82. Furthermore, a statistical analysis was carried out on the results of the sensory test of rice including the attributes of color, aroma, taste and overall acceptance. The results of the parboiled rice sensory test that most preferred by the panelists were the color of rice with a treatment of 3 hours 30 minutes, the aroma of rice with a treatment of 2 hours 30 minutes, taste of rice with a treatment of 2 hours 30 minutes and overall reception with a treatment of 3 hours 30 minutes. Panelists prefer rice without parboiled treatment compared to rice with parboiled treatment. The advantage of parboiled is to prevent damage to rice so that the percentage of the head increases and the percentage of broken and small broken decreases. Avoid losing nutritional value and low glycemic index values.

Keywords: Parboiled rice, physical qualities, sensory, soaking, steaming.