Mechanical and physical properties of particleboard made from 4-year Old RRIM 2000 series clone rubberwood.

ABSTRACT

Rubber trees are normally felled after 25 years. With the drastic depletion of rubberwood supply, the Malaysian Rubber Board has identified new clones of rubberwood from RRIM 2000 series that are expected to be suitable for timber and latex production. In this study, particleboards were made from 4-year-old RRIM 2000 series rubberwood clones. The clones—RRIM 2002, RRIM 2020 and RRIM 2025 were compared with the currently available clone, PB 260, that is used by most rubberwood processing plants in Malaysia. The board was fabricated using E1 grade urea formaldehyde resin to a density of 700 kg m-3 and board performance was determined according to JIS A 5908-2003. The study revealed that it was technically feasible to use 4-year-old rubberwood from the RRIM 2000 series clones, especially RRIM 2002, for making particleboard which is comparable to that made from the mature (25-year-old) PB 260 clone.

Keyword: Young wood; RRIM 2002; RRIM 2020; RRIM 2025; PB 260