

Yield and quality of two kenaf varieties as affected by harvesting age

ABSTRACT

Kenaf (*Hibiscus cannabinus* L.) is grown either as an animal feed or as a source of fibre. In Malaysia, the variety V 36 has been planted since 2001 and currently a new variety MHC 123 is being evaluated. This experiment was conducted at the Malaysian Agricultural Research and Development Institute (MARDI) Serdang, (latitude N 3o 17', longitude E 101o 46') from August to December 2012 to determine the optimum harvest age for the two varieties of kenaf for animal feed and for fibre production. The two varieties were harvested at 8, 12, 16 and 20 weeks after planting (WAP). Mean biomass yield of MHC 123 (11.7 t ha⁻¹) was significantly higher ($p < 0.05$) compared to V 36 (8.7 t ha⁻¹). The crude protein (CP) of MHC 123 decreased slowly from 18.06 to 17.22% while CP of V 36 declined rapidly from 21.72 to 11.32% between 8 and 12 WAP. Acid detergent fibre content in MHC 123 increased slowly (31.72 to 36.86%) compared to V 36 (39.57 to 55.59%) from 8 to 12 WAP. From these findings, MHC should be harvested at 12 WAP while V36 should be harvested at 8 WAP for use as forage. Tests on the fibre showed that the tensile strength for both varieties was highest at 16 WAP and both varieties should be harvested at this age for fibre production.

Keyword: Kenaf; Animal feed; Fibre; Harvest dates