Market and welfare economic impacts of sustainable forest management policy on timber market in Sarawak, Malaysia

ABSTRACT

The main objective of this study is to analyse the impact of Sustainable Forest Management (SFM) practices on the timber market in Sarawak, Malaysia. A partial equilibrium model was applied in this study covering domestic and international timber market namely supply, domestic demand and export demand of timber. It was analysed by using a system of equations approach. All of the data are annual time series basis from 1970 to 2008. Based on the first three scenarios, the results show that changing from the conventional logging (CL) practices to SFM practices, reduce the equilibrium quantity of timber and increase the price level. The welfare economic impacts of SFM provide empirical evidence that there is a loss in welfare economic impacts on the timber industry in Sarawak, Malaysia. However, an increase in the domestic price of timber would help to compensate for the loss volume of timber. In addition, the scenarios of market access shows that Sarawak timber industry could benefit from this advantage.

Keyword: Consumer surplus; Producer surplus; Equilibrium price; Equilibrium quantity