ABSTRACT

Study the structure and status of mangrove communities in estuarine ecosystems Kali Lamong East Java aims to determine the community structure, diversity, and the status of mangrove conditions. Mangrove vegetation analysis performed using the transect method is divided into several plots with each plot size of 10 meters x 10 meters. The data have been obtained in the form of density, frequency, dominance, importance, diversity index, dominance index and evenness index types. In addition, supporting data obtained in the form of physical and chemical parameters. In field observations found eight mangrove species of four Family of Avicenniaceae (Avicennia marina and Avicennia alba), Rhizophoraceae (Rhizophora stylosa, Rhizophora mucronata, Rhizophora apiculata and Bruguiera hainessi), Sonneratiaceae (Sonneratia alba) and Meliaceae (Xylocarpus moluccensis). Important value for the largest growth rate of trees owned by Avicennia alba at 133.66%, this suggests that Avicennia alba is the dominant species in this area. Based on diversity indices, the level of diversity that this region has a low (0.28 to 0.37). The status of mangrove communities are in unstable condition and ecologically depressed index calculation based on the analysis of dominance and evenness index types.

Key words: Diversity index, dominance index, evenness index types, mangroves, importance, community structure, status, Kali Lamong.