

Nathania Ernita Ekawati Edawua, 2012. Diversity of Bryophyta in the hot spring Baths Forest Kingdom R. Soeryo Cangar East Java. This study with guidance of Dr. Hamidah and Dra. Thin Soedarti, CESA, Department of Biology, Faculty of Sains and Technology, Surabaya.

ABSTRACT

Moss is a low level plants and is part of the biodiversity that has not been widely researched in a garden forest britain (TAHURA) R. Soeryo Cangar East Java , is one of the potential for forest habitat of the moss plant diversity. This research aims to discover diversity of mosses (Bryophyta), mosses habitat, morphology, as well as knowing the character of kinship of every genus Bryophyta. This type of research is descriptive study sampling technique in the plot I, plot II, plot III, plot IV, with random. Moss samples that have been taken and identified to the lab to be with the use of books “ *How to know the mosses and liverworts* ”, data on characteristics and numerical and then analyzed by the program SPSS 16.0. using *Hierarchical Cluster* with *Classify average linkage* method for *agglomerative*. The research results obtained by as much as three classes with five genera, namely class Bryopsida obtained three genus (*Leucobryum*, *Fissidens*, *Hypnum*), of the class Antocerotopsida is one genus (*Anthoceros*), and of the Hepatoptya class gets one genus (*Marchantia*). Based on the analysis of mind that the Bryophyta in TAHURA R. Soeryo in Cangar have kinship as follows, the genus *Marchantia* having the kinship relation close to *Anthoceros* and genus *Leucobryum* more closely related with *Fissidens* compared with the genus *Hypnum*, the most distant kinship is a genus *Anthoceros* and *Marchantia*, with *Leucobryum*, *Hypnum*, *Fissidens*. Causing much kinship and close due to differences in morphological characteristics each posses a genus distinct from each other.

Kata kunci : diversity, Bryophyta, kinship, TAHURA R.Soeryo.