

บทคัดย่อ (ภาษาอังกฤษ)

The stream ecological monitoring, water quality and benthic macroinvertebrates diversity at Mae Sa stream, Doi Suthep-Pui National Park, Mae Rim District, Chiang Mai Province were investigated. The 7 sampling sites were carried out in 3 seasons; rainy (October 2004), cool and dry (December 2004) and hot dry (April 2005). The results reveal that the Mae Sa stream was more or less disturbed by human activities such as at the upstream was disturbed by some agriculture area while the middle and down stream were severe polluted and impacted by community, elephant camps and agriculture areas. The water quality of the Mae Sa stream was classified as medium class (class 2-4) which was indicated that polluted by human activities. The water in general was fit for fauna conservation, fishery, recreation and swimming, agricultural and industrial purposes, The Mae Sa stream ecological situation as a whole is urgently needed some restoration and remediation especially in site no. 2 to 7. The macroinvertebrates diversity in site no. 1 was unique and different from other sites in all 3 seasons, while in site no. 2 to 7 were more or less difference depend on season, land use and human activities.