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Variations of Epilithic Diatom Community and an Assessment of Water Quality by using DAIpo In the Water System of Ulleung Island

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The epilithic diatom community and an assessment of water quality with diatom assemblage index of organic water pollution (DAIpo) were investigated in the water system of Ulleung Island. The samples were collected from five sampling stations on April, May, July, August, October, November 2003, January and February 2004. A total 114 taxa collected from this study were classified into 103 species and 11 varieties belonging to 29 genera, 9 families, 3 suborders and 2 orders. DAIpo value was the highest at station 1 as 77.77 on February 2004, the lowest at station 5 as 40.44 0n October 2003. The average saprobic levels were estimated α- oligosaprobic in the water system of Ulleung Island.

keywords: epilithic diatom, DAIpo, Ulleung Island