

AHW026-P10

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## Contribution of the Otaki dam and water environment in the surrounding area

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Otaki dam itself was built 84 million tons of storage capacity in 2002, a landslide dam occurred at the bottom of the gate is open, they failed to present the reservoir. Once completed, the water level to rise more than 60m, an internal dam, the downstream effects of concern. Therefore, in this study was to investigate the environment for a long time before hanging up the reservoir, to gather information to determine whether the symptoms occur after water from the reservoir. The survey of the river water of dissolved constituents from upstream to downstream of the dam, the species composition of phytoplankton. The effect of dissolved chemical components, phytoplankton, are investigated to assess the impact of temperature and other physical and chemical effects along with the flow.

As a result, For first quality, in the Otaki dam dam size is small, temperature stratification was formed in the summer. The upper 26.5 degrees Celsius, in the lower 22.7 degrees Celsius, while the concentration of dissolved ions upper dam, found that differences seen in the lower. For turbidity, the turbidity point average near the headwaters of most monitoring sites was 0.3. This point was also very good in the sense transparent look. In contrast, the turbidity of the phenomenon can be seen wearing mud sites in the downstream region Otaki dam, and there was no difference between the prediction about the difference between 0.4 and turbidity of the near and Ryuu Hazime. However, it looks completely different look in the lower reaches of the river water has a creamy color. This is a very small particle size is considered that the idea of getting close to the colloidal state. It was found that likely precipitated the very state that it is difficult.

Keywords: The Otaki dam, Kino river, Tubidty, Plankton, Diatom