Study of Water Quality, Fish and Fishery of Mechi-River

A Dissertation

Submitted by

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For the partial fulfillment of M. Sc Degree In Zoology (Fish and Fisheries)

To

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2008

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This is to certify that the dissertation work entitled 'Study of water quality, fish and fishery of Mechi-River' has been carried out by Mr. Bishwa Raj Pokharel for the partial fulfillment of M.Sc. Degree in Zoology under my guidance and supervision. To the best of my knowledge, this dissertation has not been submitted for any other degree till date. I, therefore, recommend this dissertation for final approval and acceptance.

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We, all the members of the evaluation committee, went through the dissertation entitled 'Study of water quality, fish and fishery of Mechi-River' and found satisfactory to recommend qualified for awarding Mr. Bishwa Pokharel MSc. Degree in Zoology with Fish and Fisheries as special paper.

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ABSTRACT

The present study of "Study of Water Quality, Fish and Fishery of Mechi-River", was conducted from 16th December, 2006 A.D. to 15th June, 2007A.D. The study area was divided into station A, B and C. The water samples from each sampling sites were collected in the morning throughout the study period. The physical parameters such as temperature, depth, transparency, water colour, nature of the day were performed on the field itself. The analysis of chemical parameters such as pH, hardness, DO, CO_2 , alkalinity were examined on the same day. The maximum DO 7.3ppm was observed on March, '07. The free CO₂ fluctuated from 8 - 15.3ppm. The alkalinity was found between 55 -110ppm with an average of 92.5ppm. The value of total hardness recorded during the study ranged from 25 - 37ppm with an average of 31ppm. The various types of fishing gears used by the local fisherman included cast net, chhanki, Ganj, Sola, line fishing, gill net, scoop net, dip net, basket trap, Ghorlong etc. Fishing activities in Bhadrapur is not a solely subsistence occupation which depended for its prosperity on Market conditions. Fisherman conducts their transaction with much haggling and employ complicated methods of finance and credit. A total of 32 species of fishes belonging to 23 genera were recorded during the study period. The use of traditional fish preservations were not able to keep the storing life of fish for a long time.

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