

Assessing the ecological restoration value of brackish water zone in Republic of Korea

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(a) Purpose of study or research hypothesis

This study aims to estimate the value of a brackish water ecosystem restoration in the Republic of Korea, where conflicts have continued on water management policy about an estuary.

(b) Key issue(s) or problem(s) addressed

To secure freshwater and to prevent saltwater infiltration in the estuary, the Republic of Korea had constructed estuary dams and has supplied freshwater stably to several local areas. However, as income levels rise, people put more weight to environmental value. Hence, it has led to conflicts on the opening of the estuary dam: the proponent of opening of the estuary dam for ecological restoration; and the opponent of opening of the estuary dam for stable freshwater supply.

(c) Methodology or approach used

This study attempted to estimate the public's willingness-to pay (WTP) for restoring the brackish water ecosystem of estuary, by applying the contingent valuation (CV) method, widely used technique when valuing environmental goods. To this end, CV surveys were conducted with a stratified random sample of 800 households based on subpopulations of municipalities from the national population.

(d) Results or conclusions derived from the project

After the empirical analysis with 800 households CV survey data, respondents overall accepted the contingent market and were on average willing to contribute a significant amount for the brackish water ecosystem restoration.

(e) Implications of the project relevant to congress themes

The findings of this study can be used to provide basic information for decision making on the river management.

Keywords : ecological restoration, valuation, brackish water ecosystem