Department of Civil Engineering



Transportation Planning: Consideration of Sustainable Public Transportation System

Mitsuaki KAWABATA

Associate Professor, Dr. Eng. Email: kawabata@gifu-nct.ac.jp

Research Fields

Traffic engineering, Urban and regional planning

Keywords

Public transportation planning, Traffic demand management Public acceptance, Regional vitalization



Research Outline

Analysis of travel behaviour

Public transportation(such as "bus") service supply has diminished and finally abolished in a local city that public transportation demand is low density. Its mobility is very low as well as restrictive for elderly people and disadvantaged people who have no private means. I use discrete choice models to predict demand for planned sustainable public transportation systems.

Measurement of option values and project appraisal for public transportation services

There have been a few attempts to apply the option value concept in the cost-benefit analysis for public transportation services. Option values can be interpreted in terms of a risk premium that individuals with uncertain demand are willing to pay over and above their expected user benefit for the continued availability of a transport facility.

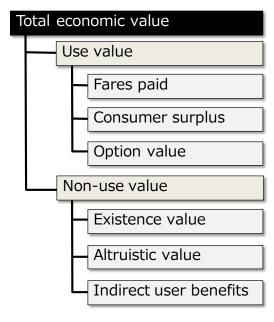


Fig. Classification of economic value

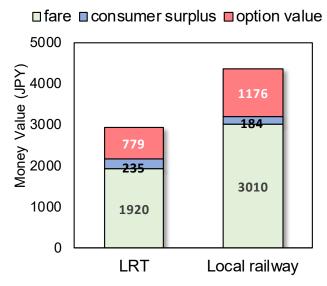


Fig. Estimated result of "Option value"