ABSTRACT

Valuing a High Altitude Mountain Ecosystem and
Creating Policy Instruments for Ecotourism Development:
A Case Study of Yulong Mountain, China
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This dissertation consists of three connected parts:

The first part is a research paper examines the tourism demand and assesses consumer surplus from visiting a unique tourist attraction site: glaciers in Mt. Yulong, Yunnan, China by using the Zonal Travel Cost Method (henceforth, ZTCM). I aim to uncover the use value of this particular site in tourism development. I divide domestic travelers into 20 groups based on the demographical and geographical characteristics of their place of residence. The empirical results show that the economic value of the glaciers in the tourism industry is more than 3 billion Chinese Yuan (CNY), roughly equivalent to 500 million dollars at the exchange rate of March 2016, which is approximately 10% of the local GDP. The high estimated value of the glaciers suggests that some conservation policy interventions are necessary.

The second research paper attempts to elicit the maximum willingness to pay by the travelers for the ecotourism development, which would conserve the glaciers and the ecosystem in Mt. Yulong. The survey was conducted in Mt. Yulong among the travelers during June to December 2015, and the focused group talk technique was applied. A total of 1,500 survey questionnaires were distributed and 889 returned with completed information. The estimated willingness to pay by each traveler's averages around 220 CNY, which is equivalent to 35 US Dollars at the exchange rate of March 2016. This amount was almost twice higher as the entrance fee to the site and indicates that the travelers are highly concerned with the environmental quality during their traveling experiences and are in favor for the eco-friendlier tourism.

The third part of this dissertation is a discussion paper that aims to compare different techniques of intervention instruments based on the particular situations in Lijiang and Mt. Yulong. This paper combines researches and recommendations from the environmental scientists of Chinese Science Academy and the economic attributions uncovered from the previous two parts of this dissertation into consideration. Even though various market base instruments have their unique advantages and might all be achieving in the case of Mt. Yulong, the Payments for Ecosystem Service (henceforth, PES) package seems to be most effective in addressing the environmental conservation issues as well as enhancing the economic development.