

THE WILLINGNESS TO PAY FOR RENEWABLE ENERGY SOURCES: THE CASE OF ITALY WITH SOCIAL-DEMOGRAPHIC DETERMINANTS

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In reference to the “Renewable Sources” EU Directive 2001/77/CE the Italian goal, for 2010, is to attain the share of 22% in RES electricity production. In such context it becomes crucial to explore the existence of consumer’s Willingness to Pay (WTP) in order to use green energy in the electricity production. My aim is twofold. Firstly, I assess the market sustainability of such energy policy goal and therefore I evaluate the degree of necessary public aid related with the same target policy. Prior studies have found a contained consumer’s WTP if compared with the national policy energy goal as in Ivanova (2004) for Queensland and Batley et al. (2001) for UK. In previous analysis I found that Italian WTP lies between 4 and 9 €per household bimonthly bill with payment card method but the value doubled using contingent valuation method (Bollino – Polinori, 2006, 2007). This study is founded on a national survey with 1601 phone interviews made in November 2006. In my framework I obtain the consumer’s WTP with two different approaches and to this end the sample is divided in two parts. In the first sub-sample (808 respondents) I propose the prices vector and the respondent faces 5 bids downward from 20 to 0 euro per household per bimonthly bill, while in the second sub-sample (793 respondents) I use the same prices vector with an upward elicitation format. In this paper I don’t focus much on the different elicitation formats but I rather focus on the different uncertainty degree that affects respondents choices. There are several approaches to take care econometrically of this issue: i) individual stochastic valuation approach; ii) grouped mean WTP analysis; iii) dichotomous choice or so called referendum approach. In order to apply the econometric analysis, the original dataset has been appropriately treated, recoding the “Don’t Know” (DK) and unsure responses. In the first sub sample 32.7% of respondents are willing to pay a 20 euro increase in the cost of electricity bill, 37.5% would accept to pay 15 € 48.4% have a WTP equal to 10 euro per a bill while 61.6% willing to pay no more than 5 € In the second sub-sample respondents are faced with upward order. In this case 61.2% have a WTP equal to 5€, 29.6% are willing to pay 10 €per bill the electricity produced by RES. Finally, only 8.8% would accept to pay 20 euro.

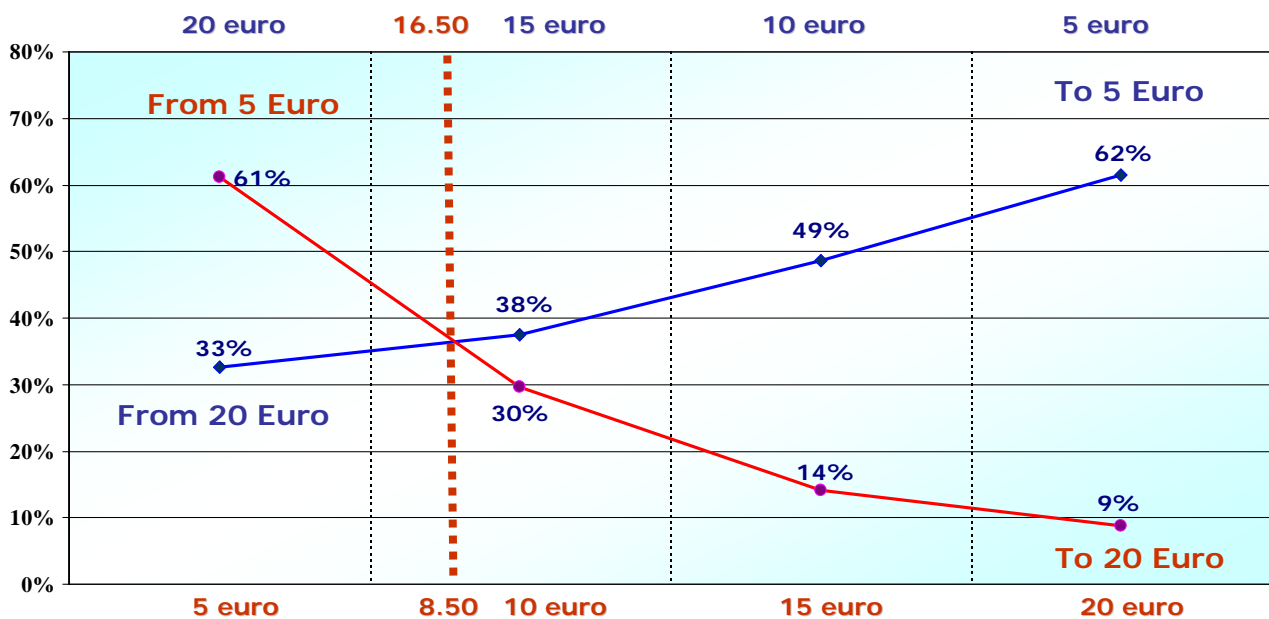


Figure 1

Figure 1 shows the descriptive results of the survey.

In previous analysis (Bollino – Polinori, 2006, 2007) the findings support the view that in Italy there is some consensus on the development of RES. In monetary value, this consensus is estimated as 35% of the total subsidy cost and depends on social demographic characteristics. I would like to point out that in this paper I use more than one procedure in order to obtain more robust statistical results and, consequently, more relevant policy indication too.

References

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