ANNEXURE
Information from Households

Topic

AN ECONOMIC ANALYSIS OF RENEWABLE ENERGY
RESOURCE MANAGEMENT IN KARNATAKA

Hello, My name is SAVITHA C

Thank you for agreeing to participate in this survey. I am Research Scholar in the department of Economics and Co-operation, university of Mysore, Mysore. My research work title is “An Economic Analysis of Renewable Energy Resources Management in Karnataka” and this work is a requirement for the successful completion of the programme, working under the guidance of Dr. S. Mahendra Kumar, University of Mysore.

The aim of the survey is to collect information about the perceptions and attitudes of solar system consumption, energy saving, cost and benefit amongst energy conscious citizen, demand and supply in Mysore city.

Part I - Personal Information from Households

Respondent No.: _____
Name of the Respondent: _____________________
Date: ___________
Area: _________________________
Block: ________________________
Gender: (a) Male (1)
(b) Female (2)
Age of the Respondent: (a) 18 to 25 years (1)
(b) 26 to 35 years (2)
(c) 36 to 45 years (3)
(d) 46 to 55 years (4)
(e) 56 to 65 years (5)
Mobile/Ph no. ______________________________

Part II – General Information

Background information of Respondent Socio-Economic Status

1. Occupation
(a) Self employment (1)
(b) Private Employ (2)
(c) Govt. official (3)
(d) Others( please specify) (4)
2. Average Monthly Income
   (a) Up to Rs. 10,000 (1)
   (b) Rs. 10,001 to Rs. 20,000 (2)
   (c) Rs. 20,001 to Rs. 30,000 (3)
   (d) More than 30,000 (4)

3. Family Type
   (a) Nuclear (1)
   (b) Joint (2)

4. Family Size
   (a) Only 3 members (1)
   (b) 4 to 6 members (2)
   (c) Above 6 members (3)

5. Education Qualification of the respondent
   (a) SSLC (1)
   (b) PUC (2)
   (c) Under Graduate (3)
   (d) PG (4)
   (e) Any other (5)

6. Type of House
   (a) LIG(20*30) <30 (1)
   (b) MIG(40*60) <60 (2)
   (c) HIG(60*80)<80 (3)

7. How much amount do you spend for water consumption?
   (a) Less than Rs. 200 (1)
   (b) Rs. 201 to Rs. 300 (2)
   (c) More than Rs.300 (3)

8. Which type of water supply your home?
   (a) Soft water (1)
   (b) Bore water (2)
   (c) Both (3)

Part III – Information on Renewable Energy

9. Have you installed renewable energy in your home
   (a) Yes (1)
   (b) No (2)

10. Which renewable energy sources are using in your house?
    (a) Solar energy system (1)
    (b) Wind Hybrid system (2)
    (c) Bio- energy (3)
    (d) Others(Please specify) (4)
11. What type of solar energy system have you installed?
   (a) Solar water heater system                           (1)
   (b) Solar lantern system                                (2)
   (c) Solar Lighting system                               (3)
   (d) Battery operated vehicles(Please specify)          (4)

Part IV – Information on Solar Water Heater

12. What is the capacity of solar water heater?
   (a) 100 liters                                                                 (1)
   (b) 200 liters                   (2)
   (c) 250 liters                                                                 (3)
   (d) 300 liters                   (4)
   (e) 500 liters                                                                 (5)

13. Since, how long are you using solar water heater? Switch on year_________
   (a) 1995 to 2000                                                    (1)
   (b) 2001 to 2005                                                            (2)
   (c) 2006 to 2010                                                             (3)
   (d)2011 to 2013                                                    (4)

14. Which type of solar water heater system have you installed?
   (a) Flat plate solar water heater                                      (1)
   (b) Evacuated tube of system (ECT)                              (2)

15. This system quality is
   (a) Excellent                                                                     (1)
   (b)Good                                                                            (2)
   (c) Poor                                                                             (3)

16. How important is it for you to have solar hot water at home
   (a) Very important
   (b) Important
   (c) Not important

Part V - Information on Demand and Supply Side Management

17. Which company SWHs have you used? _________________________

18. Why did you buy this company system?
   (a) Best brand
   (b) Durability
   (c) Cost effectiveness
   (d) Others (plz specify)

19. Who influenced you choice for purchasing your solar water heater?
   (a) Government
   (b) Suppliers
   (c) Pamphlets
   (d) Friends
   (e) Others
20. For what purpose do you use solar water heater?
   (a) Bathing (1)
   (b) Washing cloth (2)
   (c) Both (3)

21. When, does this require SWH is more useful?
   (a) Morning (1)
   (b) Afternoon (2)
   (c) Evening time (3)

22. Which season did you require hot water? (Seasonal Demand)
   (a) Winter (1)
   (b) Summer (2)
   (c) Monsoon (3)

23. Have you taken the any subsidy to installed the solar water heater
   (a) Yes (1)
   (b) No (2)

24. Do you getting rebate Rs.50 subsidy from your electricity bill?
   (a) Yes (1)
   (b) No (2)

25. Why did you install solar water heater system?
   (a) To saving electricity Cost (bill) (1)
   (b) Rebate scheme (2)
   (c) Govt. Mandatory (3)
   (d) Time save and Problem of wood (4)
   (e) To save Environment (5)

Part VI - Information on Subsidies and Rebate

Part VII - Information Electricity Cost

26. After installation SWHs, how much electricity bill reduced every month
   (now)?
   (a) Up to Rs.300 (1)
   (b) Rs. 301 to Rs.500 (2)
   (c) More than Rs.500 (3)

27. How much electricity bill have you paid every month (earlier)?
   (a) Up to Rs.500 (1)
   (b) Rs. 501 to Rs.1000 (2)
   (c) More than Rs.1000 (3)

28. How much electricity bill have you paid every month now?
   (a) Up to Rs.500 (1)
   (b) Rs. 501 to Rs.1200 (2)
   (c) More than Rs.1200 (3)
Part VIII - Information on Energy Consumption

29. After installation of SWHs, How much Energy (electricity) unit reduced?
   Consumption per month (now)___________
   (a) Up to 100units       (1)
   (b) 101 to 200units       (2)
   (c) More than 200units      (3)

30 How much Energy (electricity) unit of consumption per month
   (Earlier)_________
   (a) Up to 200units       (1)
   (b) 201 to 500units       (2)
   (c) More than 500units      (3)

Part IX - Information on Solar Water Heater Cost

31. If, did you buy installment,
   (a) How many months did you paid? ________________              (1)
   (b) How much money did you paid per month. Rs._________       (2)

32. How much Initial/Capital Cost of the solar water heater system did you pay?
   Rs.__________

33. How much Installation Cost of the solar water heater system did you pay?
   Rs.__________

34. How much Maintenance Cost of the solar water heater system did you pay?
   Rs.__________

35. Would you like to minimize the cost of solar water heater system?
   (a) Yes                                                                               (1)
   (b) No                                                                                (2)

36. What is your opinion about initial cost of solar water heater installation?
   a. Worthy                                                                            (1)
   b. Loss                                                                               (2)
   c. Cost effective                                                                  (3)
   d. Most benefited                                                                (4)
   e. Others                                                                              (5)

37. Do you face repairing solar water heater system?
   (a)Yes                                                                                        (1)
   (b) No                                                                                         (2)

38. How much Cost Paid to Repairing the solar water heater system at once a time  Rs.______________
39. Cost Comparison of different fuels used for water heating (Earlier/Before using SWHs)

<table>
<thead>
<tr>
<th>Fuel Used</th>
<th>Units</th>
<th>Fuel Req.</th>
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</tr>
</thead>
<tbody>
<tr>
<td>Fuel wood</td>
<td>Kg/per month</td>
<td></td>
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</tr>
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40. If you used Electricity (Geyser),

<table>
<thead>
<tr>
<th>Initial/Capital Cost</th>
<th>Installation Cost</th>
<th>Maintenance Cost</th>
<th>Electricity bill/Month</th>
</tr>
</thead>
</table>

41. Which brand did you used Geyser/boiler? ______________

42. How many geyser did you used in your home? ____________

43. Type of Geyser
   (a) Electric geyser/boiler (1)
   (b) Gas geyser (2)
   (c) Other (3)

44. Geyser capacity
   (a) 10
   (b) 20
   (c) 30
   (d) 40

**Seasonal Cost**

45. Do you solar water heater provide sufficient hot water during raining or winter season?
   (a) Yes (1)
   (b) No (2)

46. If ‘No’, what are the alternative sources used for water heating?
   (a) Fire wood (1)
   (b) Electric power (2)
   (c) Others (please specify) (3)

47. How much **Cost** (Money) did you pay during raining or winter season?
   (a) Less than Rs. 300 (1)
   (b) Rs.301 to Rs. 800 (2)
**Information on HEALTH**

48. Have you faced any health problems before using the solar water heater?
   (a) Yes (1)
   (b) No (2)

49. If YES, Mention the health problems did you faced?

**Information of BENEFITS**

50. Are you benefited by solar water heater system?
   (a) Yes (1)
   (b) No (2)

51. If ‘YES’, mention the benefits in this system?

Please, give me any suggestion:
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Part I - Personal Information from Institutional and Commercial

Mention : Hostel/ Hospital/Hotel
Name of the Hostel/ Hospital/Hotel: _______________
Name of the Respondent: _____________________
Date: ___________
Area: _________________________
Gender: (a) Male (1)
(b) Female (2)

Part II – General Information

Background information of Respondent Socio-Economic Status

1. If , hospital or hostel, mention the below
   (a) Government
   (b) Private

2. If hostel, mention the number of students
   (a) 20 to 60
   (b) 61 to 100
   (c) 101 to 250
   (d) 251 to 500
   (e) More than 500
3. If hospital, mention the number of patient per month
   (a) 25 to 50
   (b) 51 to 100
   (c) 101 to 150

4. Respondents position in Institution
   (a) Warden
   (b) Warden assistant
   (c) Incharger
   (d) Nurse
   (e) Doctor

5. If Commercial, respondent position
   (a) Manager
   (b) Receptionist
   (c) Incharger

6. If Commercial, number of paying guest per month
   (a) 10 to 30
   (b) 31 to 50
   (c) 51 to 70

Part III – Information on SWHs and Energy

7. What is the capacity of solar water heater?
   (a) 500lit
   (b) 1000lit

8. How many panels are installed your institutional center?
   (a) 4 to 49
   (b) 50 to 75

9. If commercial, how many panels are installed?
   (a) Less than 10
   (b) More than 10

10. Which type of solar water heater system have you installed?
    (a) Flat Plate solar water heater
        (b) Evacuated Tube of system (ECT)

11. Since, how long are you using solar water heater? Switch on
    year ______________
    (a) 2000 to 2005
    (b) 2006 to 2013

12. Reason for installation of SWHs
    (a) Required hot water
    (b) Energy bill saving
    (c) Problems of fire wood
13. Have you satisfaction of SHWs
   (a) Yes
   (b) No

14. Have you save electricity bill after installation of SWHs
   (a) Yes
   (b) No

15. Have you used other fuels to hot water? If yes,
   (a) Geyser
   (b) Fire wood plant

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   c. Cost effectiveness
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   (b) 20
   (c) 30
   (d) 40

**Seasonal effect**
29. Do you solar water heater provide sufficient hot water during raining or winter season?
   (a) Yes
   (b) No

30. If ‘No’, what are the alternative sources used for water heating?
   (a) Fire wood
   (b) Electric power
   (c) Others (please specify)

31. How much **Cost** (Money) did you pay during raining or winter season?
   (a) Less than Rs. 2000
   (b) Rs.2001 to Rs. 4000

32. How much electricity bill have you paid every month now?
   (a) Up to Rs.500
   (b) Rs. 501 to Rs.1200
   (c) More than Rs.1200

Please, give me any suggestion: