Fuel Substitution
Poverty Impacts on Biomass Fuel Suppliers
(Kenya, Uganda, Ethiopia)

DfID Knowledge and Research (KaR) Project

Livelihood Aspects of
Traditional Fuel Supply in Kampala

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PRODUCERS ➔ TRANSPORTERS ➔ WHOLESALERS ➔ RETAILERS ➔ CONSUMERS
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- Producers
  - All over the country
  - Traditional Commercial Charcoal Producing areas include Masindi, Nakasongola, Mukono-Kayunga,
  - New Production Areas include Mbarara, Masaka ranching areas
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• Transporters are categorised into:-
  Lorry-firewood 5%
  Lorry-charcoal 19%
  Pickup-firewood 3%
  Pickup-charcoal 62%
  Bicycle-charcoal 8%
  Wheelbarrow-char 3%
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• Wood fuel transportation is the reserve of men. Mean Age 33 years
• Highest level of educ. Secondary school but most upper primary
• the nature of wood fuel has changed more from a centralised vending at designated/gazetted markets to widely dispersed vending points in the residential areas i.e. Kiosks/roadside vending.
• Av. Period in business 6 years
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• Dedication is 50:50

• Firewood supply - The highest earner grossing 962,132/= per month and the others averaged 537,868/= per month; this would translate to 32,000/= and 17,929/= per day. By the local standard this is a reasonable level of earning.

• Among the charcoal dealers the average gross income stands at 397,500/= one grosses as much as 1,600,000/= per month. Altogether, the charcoal dealers earn half as much as the firewood dealers.
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• Vendors: Charcoal vending is a female dominated activity; with women constituting 75% of the group. The trade is generally considered a feminine-petty trade activity by the society and is despised by most men while women do not have any problem doing it
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Categories of Charcoal Vendors

- Kiosk vendor: 62%
- Market stall owner: 23%
- Deport owner: 13%
- Others: 2%
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• The daily **gross earnings** from the sales of fuel wood are range between shillings 250 and Shillings 86,000. The average for the entire group is Shillings 7,515. For comparison, a casual labourer works for between Shillings 800 and 1,500. Only 40% of the sample had other sources of income upon which they obtained income. This strengthens the argument that TF vending is a mainstay.
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• It was noted that the households’ in Kampala had multiple energy sources and these had a very direct impact on the relevance of charcoal in the household energy picture

• more than 70% of the households have access to more than one source of energy. Each energy-type is used for a specific cooking or heating purpose
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• The major changes in fuel type were most noticeable among the high and middle class households.
• The greatest change had occurred among the electricity users, where 64% of the households that had switched the energy-type had changed from electricity.
• The most significant impact associated with fuel-switching is household expense related. Only one household (middle-income) linked fuel switching impacts to health
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CONCLUSIONS AND RECOMMENDATIONS

There are over 3,630 dedicated charcoal vendors in and around the city; and

• 1,401 undedicated ones in Kampala;

• Total of 5,031 charcoal vendors.

• Total of 198 firewood vendors of whom 116 are dedicated and the rest (82) are undedicated.
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- Kampala wood inflow survey – Jan 2002
- 215 dedicated trucks all bearing a total of 3,070 m³ of firewood entered the city over a three-day period.
- Extrapolated over the year would amount to 373,517 m³ per annum or 149,407 tonnes of firewood.
- 340 dedicated carrying 42,864 sacs of charcoal (each 40-50 Kg) over a three-day period.
- This would add up to 714.4 tonnes of charcoal per day and annually 260,756 tonnes of charcoal consumed in Kampala city alone.
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• Further analysis indicate no increase in the quantity of wood fuel consumed in Kampala over the past years. According to the
• In 1994, estimates of charcoal consumption stood at 172,000 tonnes per annum; population stood at 935,244 (National Energy Balance 2002)
• Today the estimated annual consumption stands at 260,756 tonnes per annum while the population is estimated to be 1,547,825 persons.
• Over the past 6 years the population has grown by 165% which is comparable to the growth in charcoal consumption over the same period.