

# FIVE MYTHS ABOUT WOOD FUEL IN AFRICA



Most of sub-Saharan Africa remains off-the-grid. As such, wood fuel is the main source of energy for cooking for over 60 percent of families<sup>1</sup>, who rely on charcoal or firewood to prepare their meals and meet their nutritional needs.

However, prevailing unsustainable practices make of wood fuel a major driver of forest degradation across the continent, calling for innovative solutions to mitigate environmental impacts.

In this infographic, the Center for International Forestry Research (CIFOR) debunks the most common misconceptions about wood fuel production, trade and consumption in Sub-Saharan Africa.

## 1 WOOD FUEL CAN'T BE PRODUCED SUSTAINABLY

From the tree to the kitchen, there are options to mitigate the negative environmental effects of unsustainable wood fuel harvesting and minimize its contributions to forest degradation. These improved practices are: assisted natural regeneration and agroforestry systems, use of invasive species or sawmill waste, by improved carbonization practices, and more efficient end-use technologies. Combined with appropriate policy solutions and incentives, these options transform the sector to ensure **positive contributions** to livelihoods, by increasing both families' income and supplying much-needed cooking fuel.



In **Kenya**, World Agroforestry (ICRAF) and CIFOR are testing the use of *Prosopis juliflora*, an invasive tree species, to produce sustainable charcoal.



In **DRC**, CIFOR is promoting agroforestry systems to give farmers a sustainable source of wood fuel and increase their incomes.



In **Cameroon**, CIFOR and the University of Douala are developing more effective fish-smoking technologies to reduce consumption of mangrove wood.

## 2 WOOD FUEL CONTRIBUTES LITTLE TO NATIONAL ECONOMIES

The sector provides **income to millions of people**, including small-scale producers and collectors, traders, transporters and sellers, who rely on wood fuel revenues for their livelihoods. It also provides seasonal or ad hoc revenues to subsistence farmers, who use the extra cash to pay for basic needs such as food, health care or education, or to buy necessary farming supplies such as seeds, fertilizers and tools.

Despite its socioeconomic importance, wood fuel production and trade remain mostly an informal sector that is not officially organized, has weak or inadequate legal frameworks that are often not enforced, provides limited revenues to governments, and lacks much-needed reinvestments.



**195** million people<sup>2</sup> are involved in wood fuel sector in Africa.



**63%** of Africa's population uses wood fuel as **primary energy source**.<sup>3</sup>



**90%** of the continent's wood extraction is **used for wood fuel**.<sup>4</sup>

## 3 THIS IS A MALE-DOMINATED SECTOR

While women are often recognized as the main gatherers of firewood in rural areas, conventional wisdom still holds that charcoal is a business for men. Yet in reality, **women are present throughout the value chain** - from production to transport, sale and retail- and their involvement plays a vital role in sustaining rural livelihoods, especially in times of duress. While gender analyses of charcoal value chains are scarce, existing studies suggest that women's participation and benefits are often influenced by gender differences and inequalities, which in turn often intersect with other aspects such as wealth and social class, marital status and age.



Women's participation in charcoal value chains is generally highest in retail, but they do also take part in production and transportation activities, with important differences existing between different geographic and sociocultural contexts.<sup>5</sup>



Women tend to get involved in charcoal production in the absence of alternative livelihood opportunities. However, due to unequal gender roles and relations, women often don't compete on equal footing with men.<sup>6</sup>

## 5 THIS IS ONLY A DOMESTIC ISSUE

A country's domestic policies have an impact on other countries in the region. When governments prohibit production, trade or consumption of wood fuel but do not offer viable alternatives, there is a risk that the problem will simply be transferred to neighboring countries. Porous borders enable cross-border movement of wood fuel, particularly of charcoal as it is easier to transport.



In **Zambia** charcoal exports are not allowed, yet regional **cross-border movements** have been observed including on borders with DRC, Tanzania, and Zimbabwe.<sup>9</sup> CIFOR and partners are engaging with stakeholders at a regional level to discuss a common approach on sustainable woodfuel and trade.



## 4 WOOD FUEL WILL SOON BE REPLACED BY OTHER ENERGY SOURCES

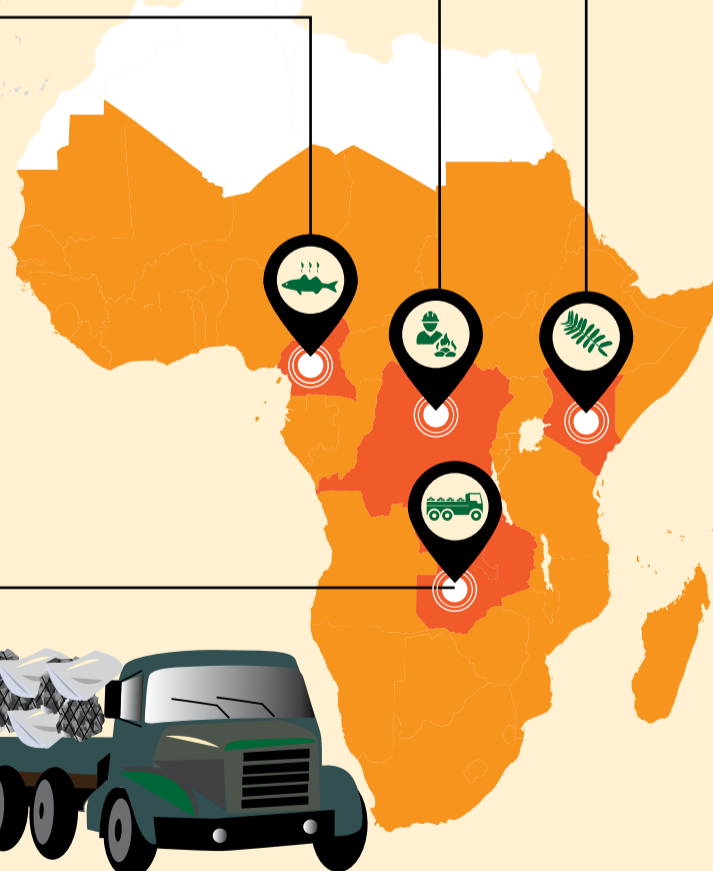
Africa's population is rapidly growing and becoming more urban, a phenomenon likely to further drive a **soaring demand** for wood fuel in the upcoming years, particularly for charcoal. In absence of other reliable or affordable energy sources, wood fuel supplies an affordable and much-needed energy source for cooking to millions of households and businesses.



The share of bioenergy, mainly in form of wood fuel, in Sub-Saharan Africa's energy mix has barely changed over the last 25 years.<sup>7</sup>



Currently **44.6%** of Sub-Saharan Africa's population has access to electricity.<sup>8</sup>



### SOURCES:

<sup>1</sup>FAO (2014). State of the World's Forests.

<sup>2</sup>Idem.

<sup>3</sup>Idem.

<sup>4</sup>FAO (2010). Forestry Production and Trade. FAOSTAT data 2018.

<sup>5</sup>Ihalainen, M., Schure, J., & Sola, P. (2020). Where are the women? A review and conceptual framework for addressing gender equity in charcoal value chains in Sub-Saharan Africa. *Energy for Sustainable Development*, 55, 1-12.

<sup>6</sup>Idem.

<sup>7</sup>IEA (2020). Africa Energy Outlook 2019.

<sup>8</sup>The World Bank (2020). The World Bank Data, 'access to electricity', 2017 figure.

<sup>9</sup>Gumbo, D. J., Moombe, K. B., Kandulu, M. M., Kabwe, G., Ojanen, M., Ndhlovu, E., & Sunderland, T. C. (2013). Dynamics of the charcoal and indigenous timber trade in Zambia: A scoping study in Eastern, Northern and Northwestern provinces (Vol. 86). CIFOR.