Why Africa’s forests are important — for its people, for China, and the world

An infographic presentation for the China-Africa Forest Governance Learning Platform

October 2016
Author information

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About the China-Africa Forest Governance Learning Platform

The China-Africa Forest Governance Learning Platform was launched in 2013 and thus far brings together forest governance players, including heads of government forest departments, from eight African countries, representatives from the Chinese Academy of Forestry, the Global Environmental Institute, IIED, WWF and some other international organisations. By October 2016 the Platform has held three major international learning events – two in China, one in Cameroon. Participants have recognised its success to date in creating an open dialogue space for Chinese, African and the international community to come together.

The China-Africa Forest Governance project is a multi-country project that seeks to improve forest governance, by promoting sustainable and pro-poor Chinese trade and investment in Africa’s forest. Through research, dialogue and joint action with partners in China, Cameroon, Democratic Republic of Congo, Mozambique and Uganda, the project contributes towards improved policy and investment practice in China and Africa, in ways that foster good stewardship of forest resources and benefit local communities.

For more information visit www.iied.org/china-africa-forest-governance-project or contact: James Mayers, james.mayers@iied.org

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AFRICA'S FORESTS ARE CRITICAL FOR FIGHTING CLIMATE CHANGE

The world's forests store an estimated 296 Gt of carbon, which is 3/4 as much carbon as in the atmosphere.

Deforestation and forest degradation cause 10% of global GHG emissions.

17% of the world's forests are in Africa, covering 674 million ha. Africa's forests hold 20% of the global forest carbon stock (about 58 Gt), which is 5.5X China's 2014 emissions.

Western and Central African forests store some of the highest densities of carbon, about 120 tonnes/ha.

How to stay below 2°C: the role for Africa's forests

- 56 Gt: Median annual emissions levels predicted by 2030 with current pledges
- 42 Gt: Median annual emissions levels needed by 2030 to keep warming below 2°C
- 14 Gt: Gap between required and predicted levels
- 2.7 Gt: Proportion of the gap that could be closed by forest carbon sequestration in Africa alone

Africa's forests are critical for fighting climate change.

Data Sources:
- FAO (2016) Global Forest Resources Assessment 2015
- UCS (2013) Measuring the role of deforestation in global warming
- FO:AFWC/2016/3.1
- FAO (2016) Global Forest Resources Assessment 2015
- FAO (2016) Global Forest Resources Assessment 2015
Over 2/3 of Africa’s 600 million people rely on forests for their livelihoods.

70% of African households use wood as a primary energy source.

823 million people are expected to rely on wood energy by 2030.

Diverse forests = critical sources of livelihoods

Forests are multi-functional, supporting livelihoods in many ways. They...

- provide food, medicine and fuel
- resist pests
- nourish soils
- attract insects to fertilize crops
- regulate water flows
- provide alternative incomes through non-timber forest products

A 30-year civil war in Casamance, on Senegal’s southern border with Gambia, has turned its forests into battlegrounds.

Rebels illegally log and sell prized hardwoods to buy arms: an illegal timber trade fueled by demand from the world’s tropical hardwood market.

Deforestation has caused declines in rainfall, desertification, and conflict between rebels and communities that can no longer use the forests for sustainable livelihoods and must eke out an existence burning trees for charcoal.

In Koudioube village, community forest restoration has helped to overcome conflict. Illegal logging has stopped, fruits and wildlife are plentiful, locals are again able to sell forest products, livelihoods have been rejuvenated – and communities that previously fought each other now work together.

Data Sources: Hunt, L (5 May 2014) Community forestry is defusing Africa’s longest-running conflict. The Ecologist.
Wild coffee originated in the cloud rainforests of Ethiopia’s Kafa Biosphere Reserve a thousand years ago, and it is the only place where it still grows wild today.

Locals rely on the ecosystems of these cloud forests for food, fuel, housing, medicine, spices, fodder, wild honey, and of course coffee – plus to cool the local climate, supply water to agricultural areas, and feed Ethiopia’s rivers.

But deforestation is hurting the forest’s ability to function. Conservation programs have helped restore the forests, improving climate resilience, food security, and local livelihoods.
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AFRICA’S FORESTS ARE TREASURES OF BIODIVERSITY

- 40,000-60,000 number of plant species on the African mainland
- 12,000 of these plant species are held in tropical forests
- 7,500 species are endemic - they cannot be found anywhere else

West African forests hold more than 1/4 of Africa’s mammals

8 of the world’s 36 biodiversity hotspots are in Africa, along with:

- 1/4 of the world’s mammal species
- 1/5 of the world’s bird species

60% of all African biodiversity is in the Congo Basin forest alone - the last stronghold for the forest elephant, forest buffalo, gorilla, bongo, and okapi

Climate change and deforestation are serious threats

Africa could lose 30% of its animals & plants with a 1.5°C rise in global temperature. The risk is worse without forests as a buffer.

Deforestation threatens countless species, such as the recently discovered forest lion, the mandrill, the chimpanzee, and the pygmy hippopotamus – & several prized species of trees...

...Africa’s forests hold woods very valuable to China, particularly **rosewood**, **teak**, and **mahogany**.

**Rosewood imports** from Africa have increased 700% since 2000

**Rosewood** (*hongmu* species) is valued as the traditional material for antique furniture and decor.

It was traditionally found in Southeast Asia, but these forests have already been depleted. If Africa is next, **what will the next source of rosewood (**hongmu**) be?**

**There are many other African trees valuable to China and the world market...**

- **Moabi**
  - Oil, furniture
  - Extinct in parts of Cameroon due to harvesting for export

- **Mukula**
  - Exceptional hardwood
  - Native to Zambia. **Faces extinction**

- **Afromosia**
  - Construction, furniture

- **Wenge**
  - Drums, canes, paneling

- **Okoume**
  - Boats, guitars

- **Sapele**
  - Doors, musical instruments

- **Iroko**
  - Boats, furniture

**...but many are threatened or endangered by over-harvesting**

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**Data Sources:**
- Breeze FM (29 September 2015) Zambia’s Pterocarpus chrysothrix faces extinction.
- The Wood Database.

**Scientific names for trees:**
- Moabi/Baillonella toxisperma
- Mukula/Pterocarpus chrysothrix
- Okoume/Aucoumea klaineana
- Sapele/Entandrophragma cylindricum
- Iroko/Milicia spp./Chlorophora spp.
- Afromosia/Pericopsis elata
- Wenge/Milletia laurentii
Deforestation in Africa is

4X faster than the
global rate

Of the 10 countries with the highest annual forest area reduction in the world, 4 are African:

- **#4 Nigeria**
  - 4.5% of 2010 forest area
  - 410,000 ha / year

- **#7 Zimbabwe**
  - 2% of 2010 forest area
  - 312,000 ha / year

- **#5 Tanzania**
  - 0.8% of 2010 forest area
  - 372,000 ha / year

- **#8 DRC**
  - 0.2% of 2010 forest area
  - 311,000 ha / year

The Congo Basin and East Africa alone are each projected to lose 12 million ha between 2010 and 2030. Plantation development, the timber industry, and mining are all growing rapidly in influence.

Causes of forest loss and/or severe degradation

<table>
<thead>
<tr>
<th>Congo Basin</th>
<th>primary causes</th>
<th>important secondary causes</th>
<th>less important causes</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>charcoal &amp; firewood</td>
<td>infrastructure</td>
<td>livestock</td>
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<tr>
<td></td>
<td>small-scale agriculture &amp; colonization</td>
<td>mining</td>
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The construction projects include both old and ongoing (63%) and new (37%).

Data Sources:

In Gabon, Chinese logging concessions cover more than 50% of the forested area.

2012: More than 1/3 of African timber imported by China came from Central Africa.

2013: Mozambique exported ~90% of its timber to China.

2009: Timber was the 3rd largest commodity China imported from Africa, and 78% of Africa’s timber exports went to China.

Out of 301 infrastructure projects in Africa (total value $375 billion in 2015), Chinese companies were involved in the building of 42 (15%) contributed to the funding of 13 (4%) and owned 1.

3/4 of China's foreign investment in mining went to Africa in 2011.

It grew from $15 billion to $155 billion in 1 year.

CHINA HAS MAJOR INFLUENCE ON AFRICA’S SUSTAINABLE DEVELOPMENT

The diagram shows the extent of Chinese influence on African forestry and infrastructure projects.
The construction projects include both old and ongoing (63%) and new (37%).

Data Sources:
- Commodity Discovery Fund (2011) Chinese mining investments in Africa increased by $140 billion last year.

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13

1

1

1 2 3

CHINA HAS MAJOR INFLUENCE ON AFRICA’S SUSTAINABLE DEVELOPMENT

Irregular operations such as:

- tax avoidance
- illegal logging
- obtaining permits through loopholes

common among businesses operating in many African and other developing countries with poor governance

- overexploitation
- forest and biodiversity losses
- livelihood degradation

LINKED TO

Action 1: Invest in Africa’s value-added timber processing industry

The growth of a **value-added timber processing industry** is closely linked to **sustainability** and **livelihoods**, but massive investment is needed in Africa. Without this, the Africa-China timber trade will continue being dominated by raw logs, which will continue to hinder growth of the processing industry.

**Example** Chinese timber enterprises in Gabon are involved in both harvesting and processing, and take sustainable management and local laws very seriously.

China’s **advanced technology & efficient processing** capacity in the timber sector

**Opportunity** to help Africa’s timber sector **leapfrog in technology**

FORESTRY SECTOR: WHAT CAN CHINA DO?

China can:

Action 2: Promote legality through traceability, community forestry and certification

As the world’s biggest exporter of wood products, being unable to verify supply legality could cause market risk due to legality laws in destination markets plus reputational impacts from social conflicts. Enhancing traceability in Chinese supply chains as well as raw materials feeding those supply chains will be critical in reducing market risks.

Legality should not mean excluding locals...

In some African countries, 9 out of 10 people work in the informal sector

In countries where legislation is in place, promoting community forestry for commercial timber integrates the informal supply chain, simultaneously addressing its legal ambiguity and obtaining social license. Certification can also lower the cost of capital, support resilient local economies, and ensure long-term management quality.

Action 3: Work with communities

NGOs and development organizations usually have extensive local expertise and can facilitate community engagement and project initiation. Working with these organisations to promote legal timber also increases social license through improved local livelihoods and poverty alleviation – there may even be synergies with Chinese development assistance.

**LAND-USE SECTORS: WHAT CAN BUSINESSES AND GOVERNMENTS DO?**

**Investment Risk: understand land tenure complexity**
Rural land rights are often undocumented and customary. This often causes uncertainty of tenure and conflict – e.g. when concessions are granted without regard for customary rights. This can cause investment and reputational risk.

- **The Kenyan** government has been forcibly evicting the forest-dwelling Ogiek people from their ancestral homeland, the Mau Forest, for commercial interests such as logging and tea plantations. The Ogiek are suing the Kenyan government for violation and denial of land rights, and the African Court on Human and Peoples’ Rights has ordered the Kenyan government to **stop land transactions** until the case is resolved.

- In Mozambique, Chikweti Forests dispossessed farmers from their lands to create plantation forests – but failed to provide promised seeds for replanting, resulting in a risk of starvation for the community. The resulting conflict created a **major scandal** for Chikweti’s European and US investors, and villages are **pressing for damages**

Similar conflicts appear for mining, infrastructure, agriculture & other types of investment.

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**What can businesses, governments and NGOs do?**

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<thead>
<tr>
<th>Investor</th>
<th>Government</th>
<th>Trader</th>
<th>NGO</th>
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<tbody>
<tr>
<td>Conduct <strong>due diligence</strong> of supply chain, ensure sustainability and legality.</td>
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<tr>
<td>Collect comprehensive information on <strong>land use by community members</strong> and their <strong>traditional rights</strong>.</td>
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<tr>
<td>Engage community members in stakeholder consultation and <strong>respect traditional rights in land transactions and compensation</strong>.</td>
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<tr>
<td>Help communities <strong>secure modern commercial rights</strong> so that they can protect their resources against illegitimate land dealings.</td>
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</tbody>
</table>

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**Data Sources:**
- Survival International, Ogiek.
- Salira, M (6 December 2014) Africa: Kenya’s Ogiek community takes gov’t to African court over land rights. AllAfrica.
This set of infographics illustrates the importance of Africa’s forests for its people, for China, and the world. It shows the vital role of Africa’s forests for livelihoods, biodiversity conservation, climate change mitigation and the global timber trade. The infographics also indicate the key paths people in Africa, China and the global community should travel to help both stimulate thriving local economies and conserve Africa’s forests.