Timber trade and the conservation of forests
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www.globaltimbertrackingnetwork.org
Illegal logging – global problem

- 15–30 per cent of global forest production
- Worth 30 to 100 billion US$ yearly
- IL has detrimental effects on environment (soil, water, air), livelihoods (subsistence, social agreements) and wider economy (taxes, undervaluing)
- Timber prices depressed by 16%
Leverage forest governance and law enforcement through trade

Main global trade flows of roundwood and sawnwood at high risk of illegality, 2014 (million USD)

See Figure 3.12 for details on intra-regional trade flows within Southeast Asia.

CHN = China; EU = European Union; IND = India; USA = United States of America.

(Source: Kleinschmit et al., 2016)
The objective of the Global Timber Tracking Network (GTTN) is to promote the operationalization of innovative approaches to verify trade claims of wood-based products.

GTTN brings together expertise and infrastructure to help stakeholders with the identification of wood species and its origin.
Two key user groups

- law enforcement agencies, customs, CITES authorities, judiciary; high throughput to case-work

- due diligence: economic operators’ own due diligence systems; SFM and CoC due diligence certifiers; national to concession level
Possible cases

Product type

Trade claim: origin and tree species

Inspection

Expert on-site

High throughput tool

Inspection result

“High accuracy assessment of species and origin is required” (e.g. in support of court case)
Find required expertise from GTTN Service Providers Directory (SPD)

- GTTN SPD will provide information on available scientific methods and tools (Genetics; Stable isotope analysis; Mass spectrometry; NIRS; Wood anatomy incl. machine vision; Dendrochronology)

- Lab query and selection based on wood product type, declaration/assumption of species and origin, lab proximity, analysis method, lab certification/acccreditation (a.o.)

- Result: list of service providers with contact options
Seeking a holistic approach to timber tracking

- Genetics
- Stable isotope analysis
- Mass spectrometry
- NIR
- Wood anatomy, machine vision
- Dendrochronology, radio carbon

• Product type and available expertise can impact method selection
• Combination of methods could cost-effectively increase accuracy
• We promote sampling for reference data creation to serve all methods
Development with, by and for stakeholders

Users
- Timber Operators
- Forest Certifiers

Providers
- Service Providers
- Scientific Stakeholders

Donors

Civil Society

Media
A growing global network

Experts and stakeholders for wood and origin identification

The network remains open for registrations: for developers, providers and users of timber tracking, and interested stakeholders.
GTNN work programme

- Service Providers Directory
- Reference database
- Networking events, advocacy
- Standardization, harmonization

**WHAT**

- Standardised protocols & guidelines
- Communication, policy & advocacy
- Use of timber tracking tools to curb illegal logging & trade
- Identify service providers per timber species and origin
- Assure validity and robustness of data

**Cross-cutting themes for method-specific working groups**

**Collaborative effort**
1. Standardization, Harmonization

Contribute to international standard setting on:

- Sampling
- Material storage and transport
- Material exchange
- Methods for tests on tree species and geographic origin of timber
- Organisation of ringtests, blind tests
- Applicable regulation
**Step 1**

Write a guideline on selecting and combining timber tracking methods (with flexible parts where needed to account for specific conditions, see next page)

- > for researchers (how optimize use of current tools)
- > for end-users (which method for which question)

**Step 2**

Try-out different ways to identify (i) taxon, or (ii) origin of timber

- > using a single or a combination of methods
- > combining data in a single analysis or combining results in a single interpretation

**Step 3**

Discuss the need for **sampling, data analysis and lab work guidelines** to allow and facilitate these combinations of timber tracking methods

**Step 4**

Develop with the method experts the required guidelines for (i) sampling, (ii) lab work and (iii) data analysis and interpretation:

- DNA
- Isotopes
- DART MS

**Step 5**

Compare the sampling guidelines and merge into 1 method-independent sampling guideline if possible

**Step 6**

Based on the guidelines set up in the previous steps, develop a list of quality indicators for the reference and expert database (f.ex. included via a colour code), per method:
2. GTTN information services
Reference Database

For participating laboratories:

- Query existing reference data
- For any wood-ID method
- Data holders define access condition

Data repository

- Metadata in one location
- Data in central or distributed databases
- Secure data entry and storage protocols
- Differentiated access levels

- Exploring cooperation with TreeGenes
- Fulfils design requirements – not only DNA!
- Treegenes systems architecture allows for a separate GTTN platform to be developed

https://treegenesdb.org
3. Advocacy

- Priority species list –revisited
- Memorandum of Understanding
- Protocols for reference data sharing (IPR, ABS)
- Research agenda development
- Assessing market for GTTN services
- Facilitating market access/development for GTTN services
- Advocate for funding and coordination between donors
  - e.g. Sampling campaigns, advanced database development etc.
Priority species list -revisited

GTNN phase I produced a priority species list
  • Conservation status (CITES, IUCN red list)
  • Species anatomically difficult to recognize

Issues:
  • CITES updated priority species
  • Look at infractions/e.g. Interpol prosecutions data
  • Lesser known timber species are being traded in increasing volumes
  • Markets changing due to legislation, demography, developing economies etc.
Promote the coordination of sampling campaigns

- Donors seeking to have complementary or mutually reinforcing interests
- Ref. FSC upscaling of sampling for geo-referencing
- Input requirements
  - Priority lists agreed
  - Mapping of what’s done or being done already -> links to reference dbase
- Meanwhile keep responsive to upcoming issues (ref. enforcement, EIA, Global Witness etc.)
4. Communication, networking, outreach

Effective communication truly relies on contributions from all partners in the network.

- GTTN on-line: [www.globaltimbertrackingnetwork.org](http://www.globaltimbertrackingnetwork.org)
- GTTN news, guidelines and other PR
- WG and regional meetings
- Promotion of GTTN Associated Event
Media Outreach

Articles in relevant media and specialized press

Do you have stories or information to share?
The objective of the Global Timber Tracking Network (GTTN) is to promote the operationalization of innovative tools for wood identification and origin determination, to assist the fight against illegal logging and related trade around the globe.

GTTN is an open alliance that cooperates along a joint vision and the network activities are financed through an open multi-donor approach. GTTN phase 2 coordination (2017-2019) is financed by the German Federal Ministry of Food and Agriculture (BMEL).

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