WRI INDONESIA

Global Forest Watch: The Role of NGO's Managed Geospatial Information to Support Countries' Sustainable Development

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GEO SMART ASIA 2017

GEO Intelligence Asia Pacific Forum

Plenary 3: Geospatial Infrastructure and Policy Frameworks: Defining National Geospatial Strategy for Sustainable Development

GeoSmart Asia, 22-24 August 2017, Putra Jaya, Malaysia

Global Forest Watch … 70+ partners and collaborators

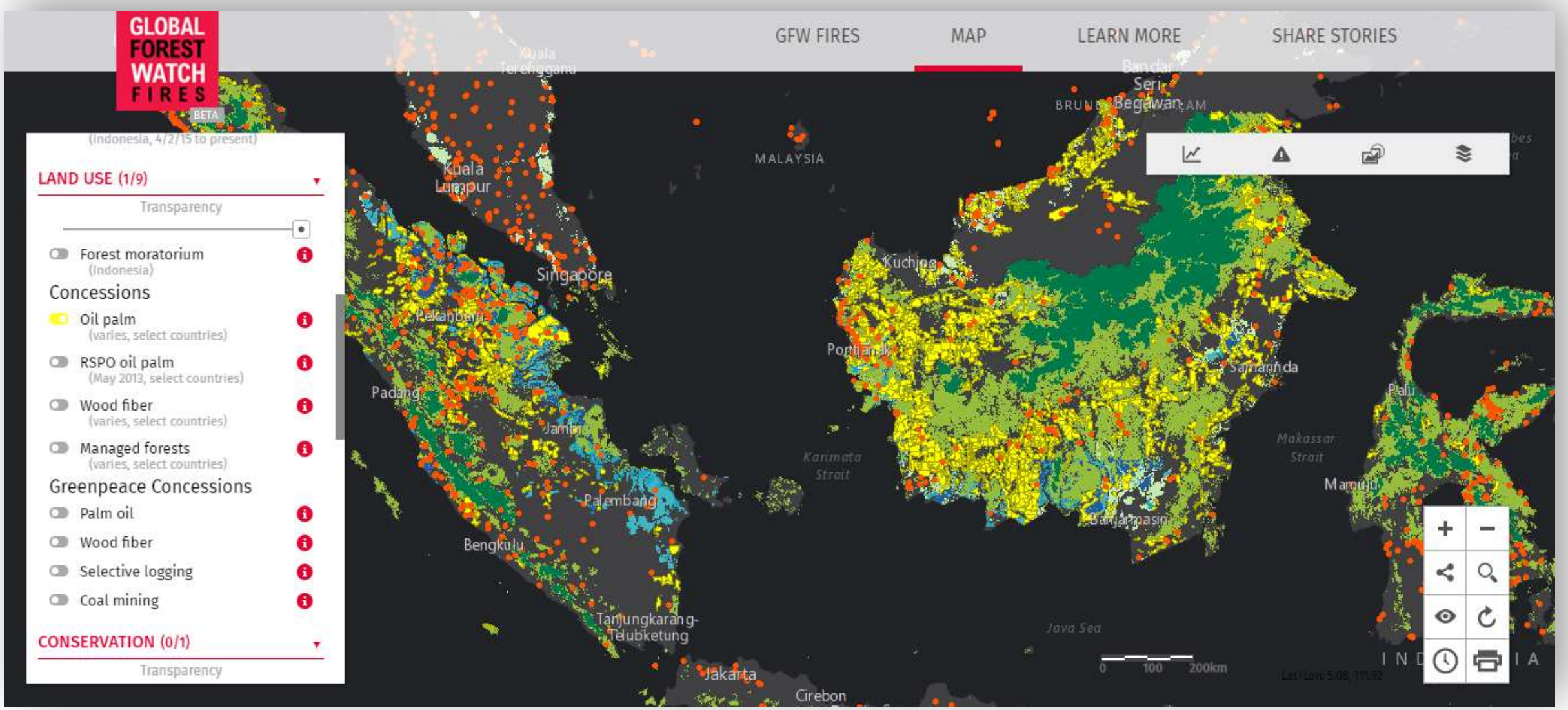
- Baker & McKinsey
- Blue Raster
- Bobolink Foundation
- Cargill
- CartoDB
- Center for Global Development
- CIAT, CGIAR
- Climate and Land Use Alliance
- Conservation International
- Danish International Development Agency
- Dept. for International Development UK
- Digital Globe
- Esri
- Food & Agriculture Org, UN
- FoodReg
- Global Environment Facility
- Global Forest Watch Canada
- Global WItness
- Google
- Gordon & Betty Moore Foundation
- Greenpeace
- Imazon
- IOI Loders Croklaan
- IUCN
- The Jane Goodall Institute
- Ministry of Foreign Affairs , The Netherlands
- Mongabay
- Muyissi
- NASA Ames Research Center
- NASA FIRMS
- NASA JPL
- Norway International Climate and Forests Initiative
- OSFAC
- OSINFOR
- Planet Labs
- Rainforest Foundation UK
- Reforestamos Mexico
- RESOLVE
- Roundtable on Sustainable Palm Oil
- SarVision
- ScanEx
- Swedish Intl. Development Cooperation Agency
- The Tilia Fund
- Transparent World
- UNEP / WCMC
- University of Maryland
- University of Minnesota
- Unilever
- United States Agency for International Development
- Vizzuality
- Winrock
- Woods Hole Research Center
- World Resources Institute
- Yayasan Puter Indonesia
- Zoological Society of London

Global Forest Watch does …

GLOBAL FOREST WATCH | GLOBAL FOREST WATCH CLIMATE | GLOBAL FOREST WATCH FIRES | GLOBAL FOREST WATCH COMMODITIES | GLOBAL FOREST WATCH WATER

Source: www.globalforestwatch.org

Global Forest Watch does … forest and peat fires analysis



Global Forest Watch does … useage of analytics and infographics in media

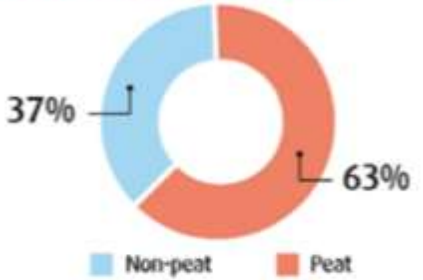
Haze crisis turns deadly

Jon Afrizal and Syofiardi Bachyul, The Jakarta Post, Jambi/Padang | Headlines | Mon, September 14 2015, 6:03 PM

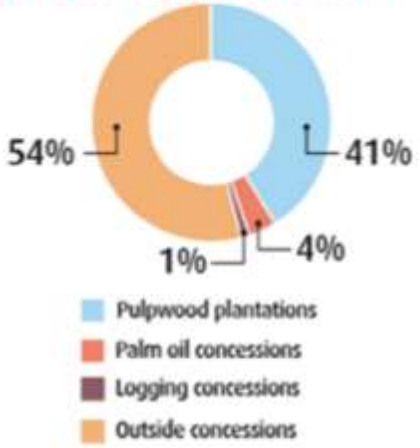
On the front line: Soldiers extinguish a peat fire in Rimbo Panjang, Kampar, Riuau, on Sunday. The government has deployed troops to assist in efforts to control fires in Sumatra that have caused dangerous levels of air pollution on the island of Sumatra and in neighboring Singapore and Malaysia.(Antara/Nova Wahyudi)

The Jakarta Post

Portion of fires occurring on peat land



Fire alerts by land use area



Concessions with highest number of suspected fires

Pulpwood

Firm	Hot spots
PT Rimba Hutani Mas	281
PT Bumi Andalas Permai	107
PT Musi Hutan Persada	59
PT Bumi Mekar Hijau	25
PT Sebangun Bumi Andalas Wood	17
PT Koperasi Wana Karya Lestari	16
PT Paramitra Mulia Langgeng	10
PT Wirakarya Sakti	8
PT Ciptamas Bumi Subur	5

Palm oil

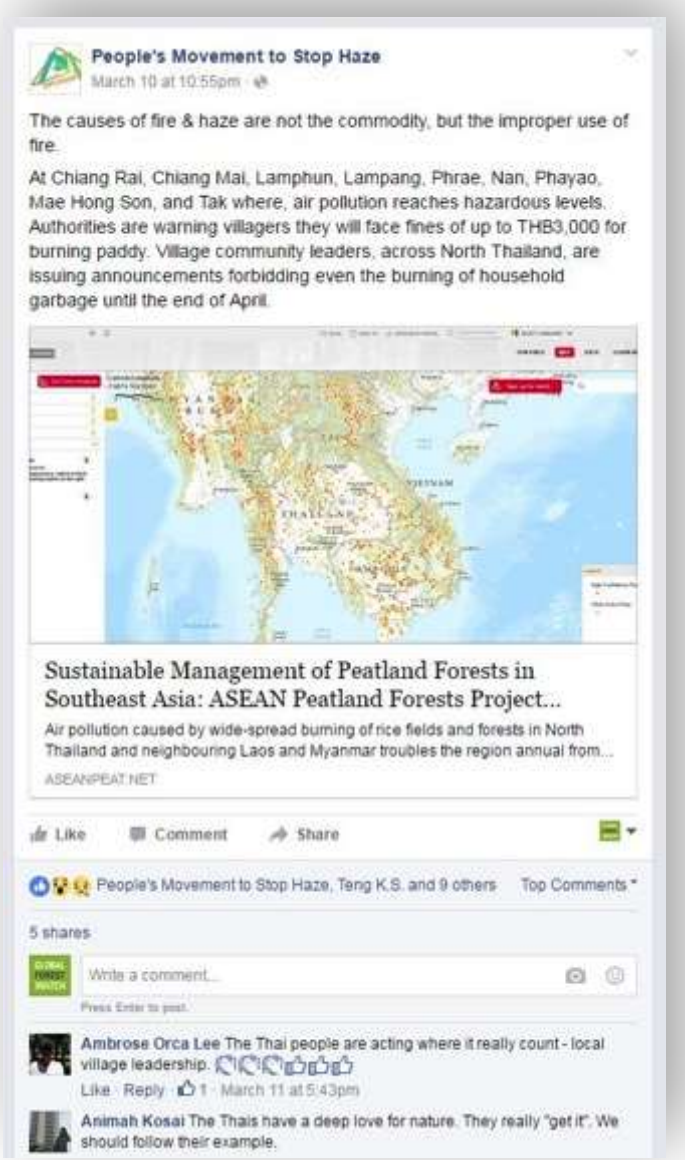
PT Eramitra Agro Lestari	10
PT Alam Sari Lestari	9
PT Bahari Gembira Ria	5
PT Kaswari Unggul	5
PT Roempoen Enam Bersaudara	4
PT Indolampung Perkasa	4
PT Tidar Kerinci Agung	3
PT Wachyuni Mandira	2
PT Langgam Inti Hibrindo	2

Logging

PT Bumi Pratama Usaha Jaya	8
PT Restorasi Ekosistem Indonesia	2
PT Putraduta Indah Wood	1

Source: Global Forest Watch (Sept. 5-12)

Global Forest Watch does … catalyzing civic engagement



Among the first steps towards sustainable development is forest and land governance improvement … One Map Policy is one of the Government of Indonesia's strategic paths.

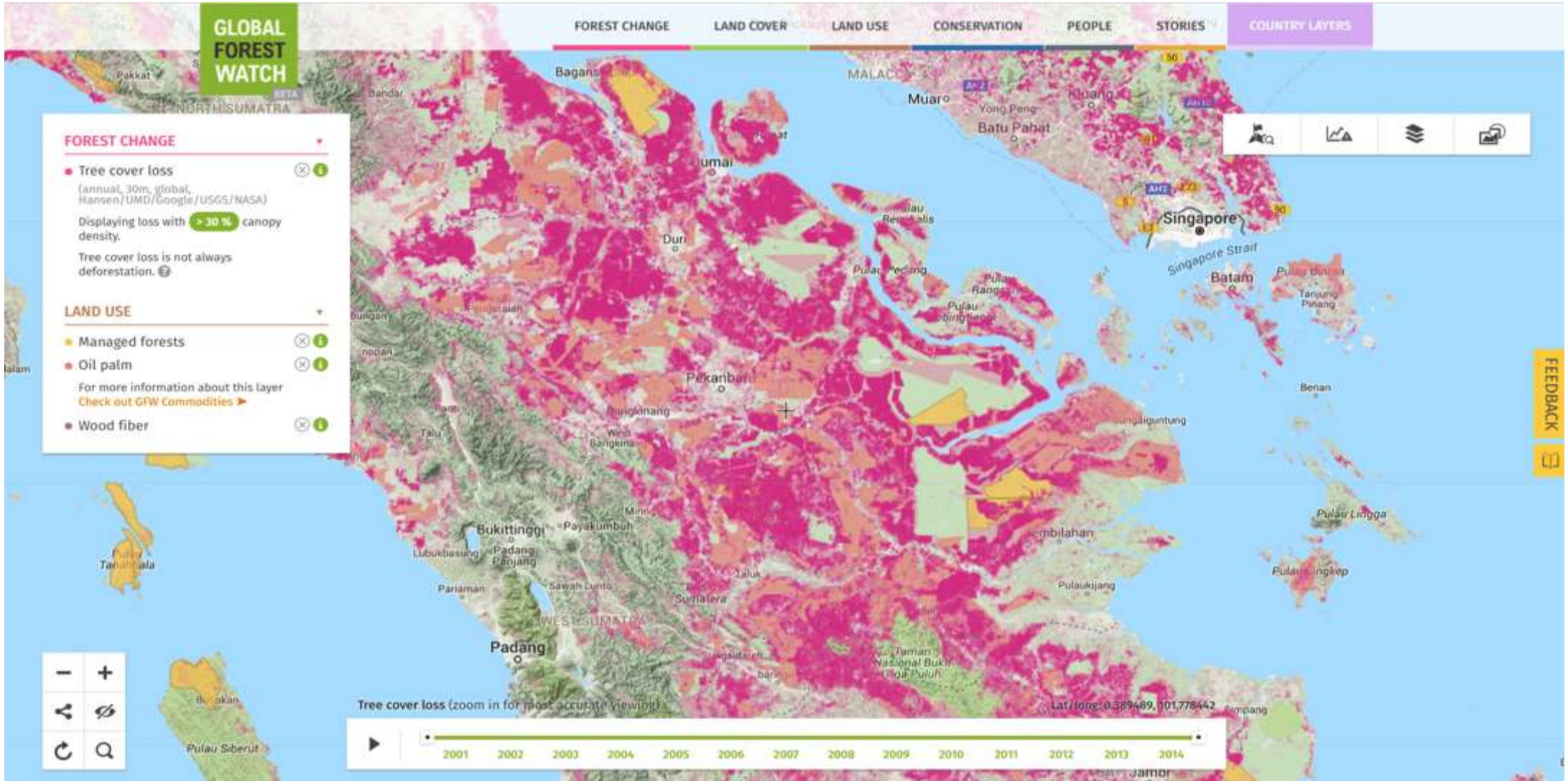
Forest and land governance improvement –in simplicity– hinges on single authoritative map –the One Map. It starts with synchronization of boundaries of all entities: forest estate, village administrative area, customary forest, company's concession, smallholder's parcel, local community settlement, and so forth.

In practice, the One Map Initiative at the sub-national level allows for direct support to sustainable development and sustainable land use on the ground.

Without this basic prerequisite, government will not be able to achieve public welfare by optimizing economic function of forest and land while protecting the environment.

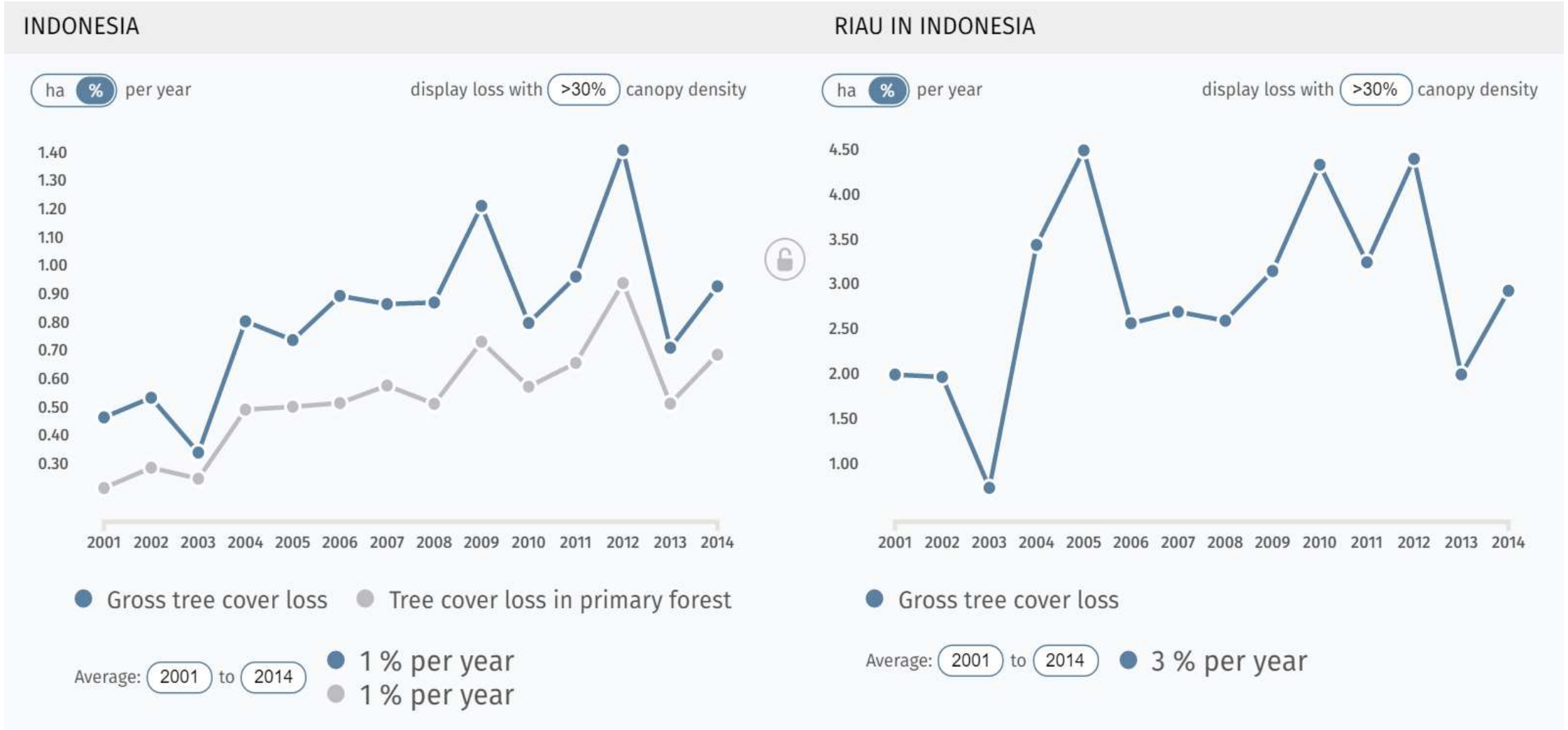
Why Riau ..?

1 Riau Province has been known as a jurisdiction which has many land use challenges; from land claim induced social conflict, environmental damage caused by illegal logging, frequent forest and peat fires to long overdue provincial spatial plan.



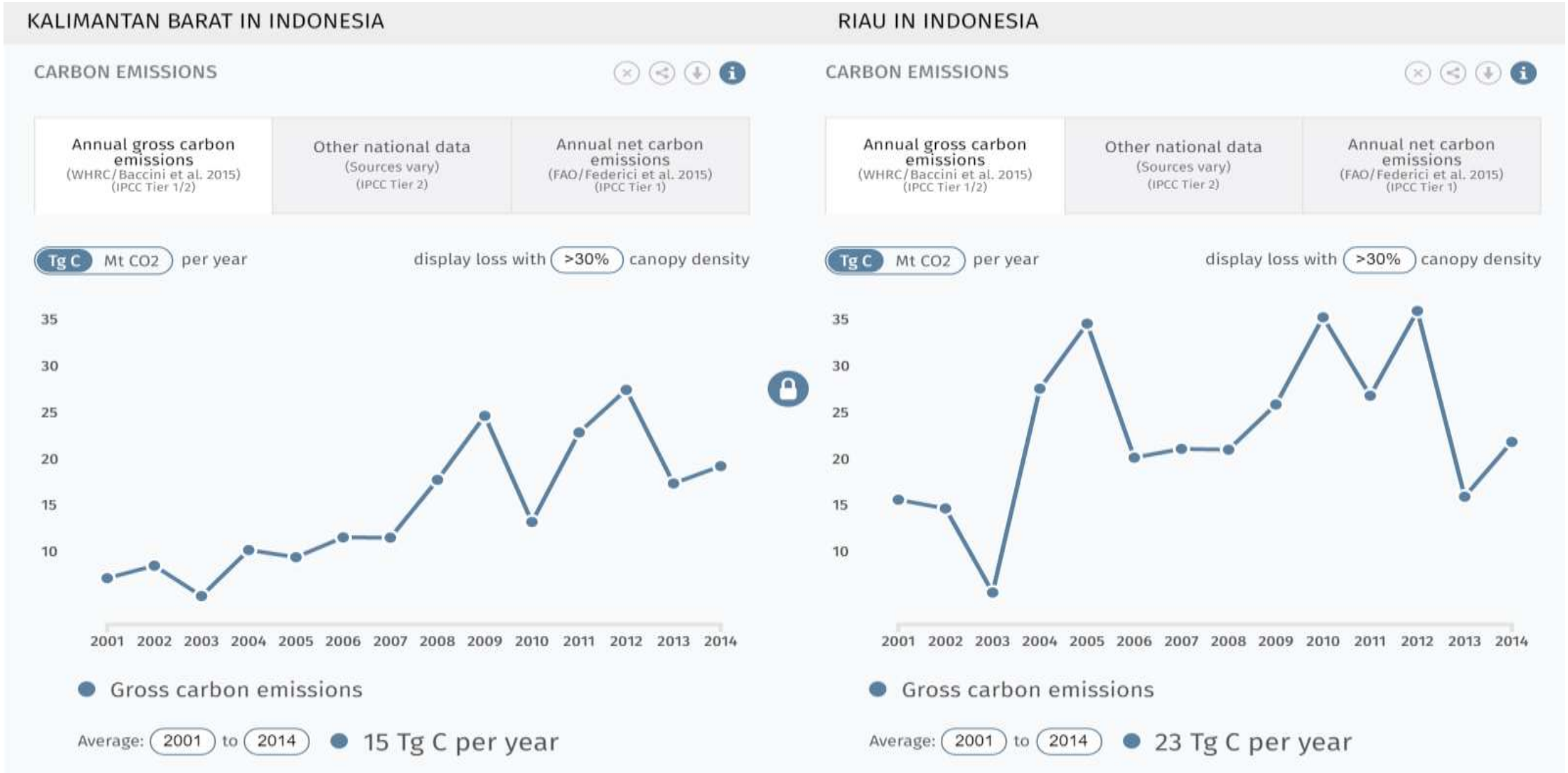
Why Riau ..?

2 Compared to the national average of tree cover loss, the graph below shows the percentage of tree cover loss in Riau was always above national average.



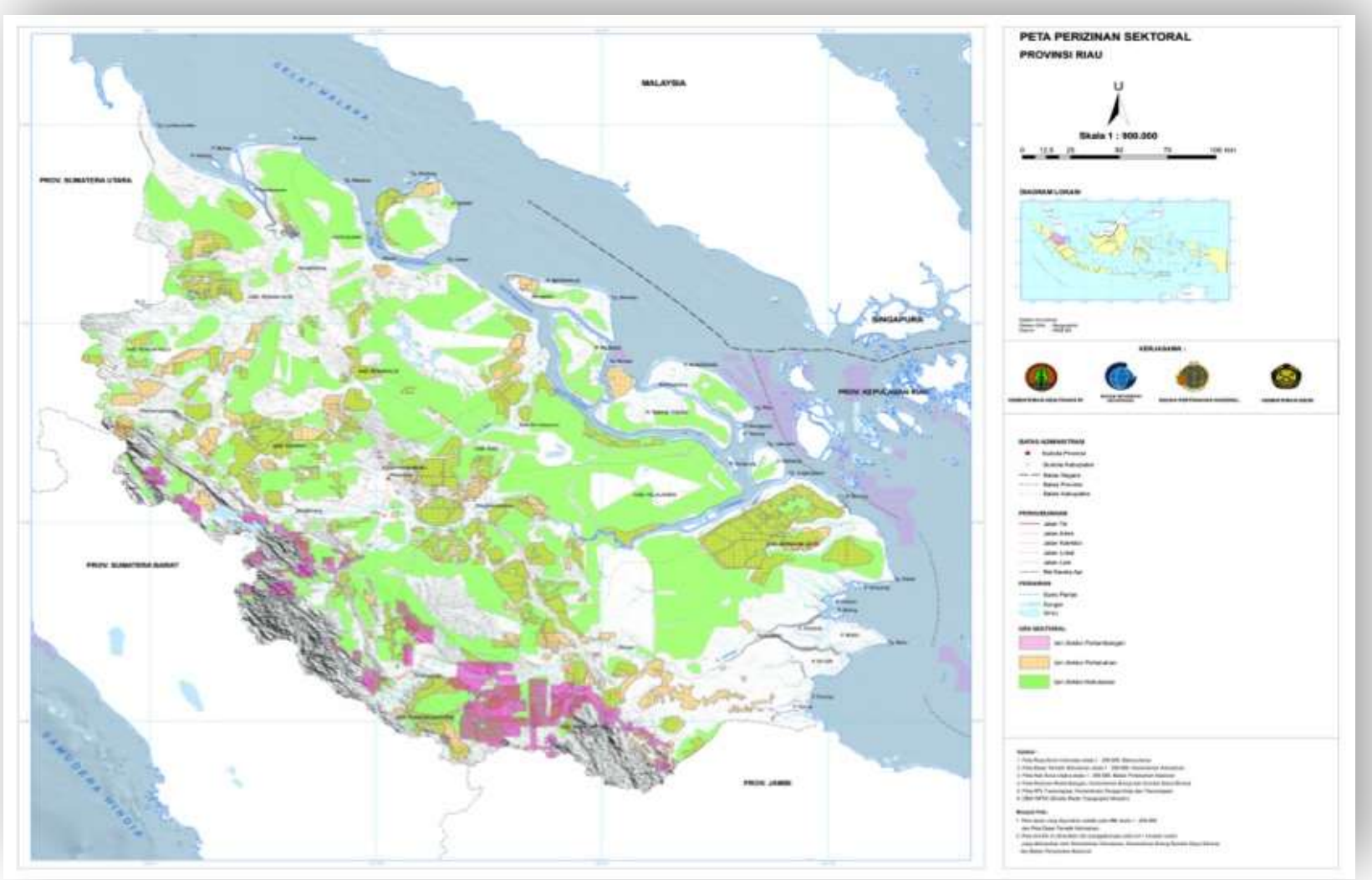
Why Riau ..?

3 With peatland covers 43% of the total land in Riau, forest and peat fires that happened every year at least for the past 18 years place Riau as among GHG emission biggest contributors for Indonesia.



Why Riau ..?

4 President's Delivery Unit, National REDD+ Taskforce, REDD+ Implementation Agency and Ministry of Forestry produced Riau Indicative One Map (2014-2015) which is a compilation of maps and other geospatial information of Riau Province.



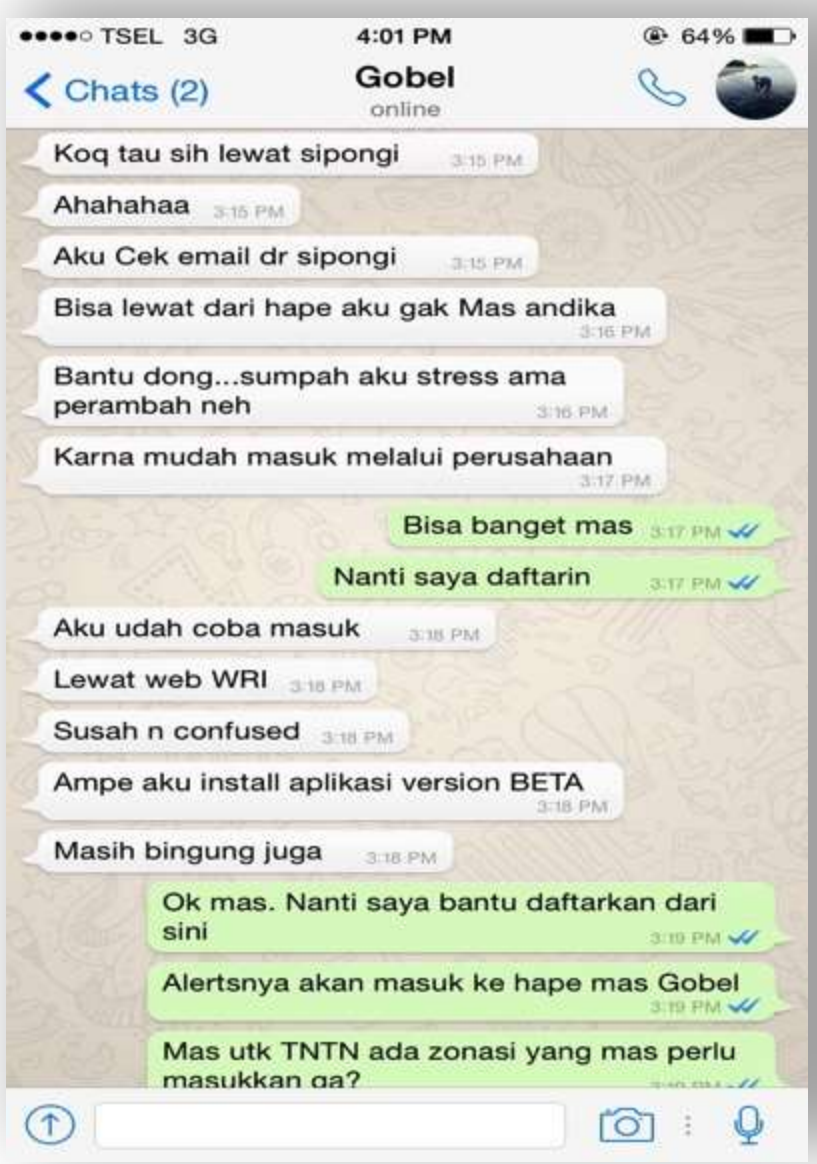
Riau Province
8.702.366 Ha

Total area with concessions 5.679.466 Hectares (65,2%)

Mining Concessions	380.586 Ha
Plantation Concessions	1.361.362 Ha
Forestry Concessions	3.937.518 Ha

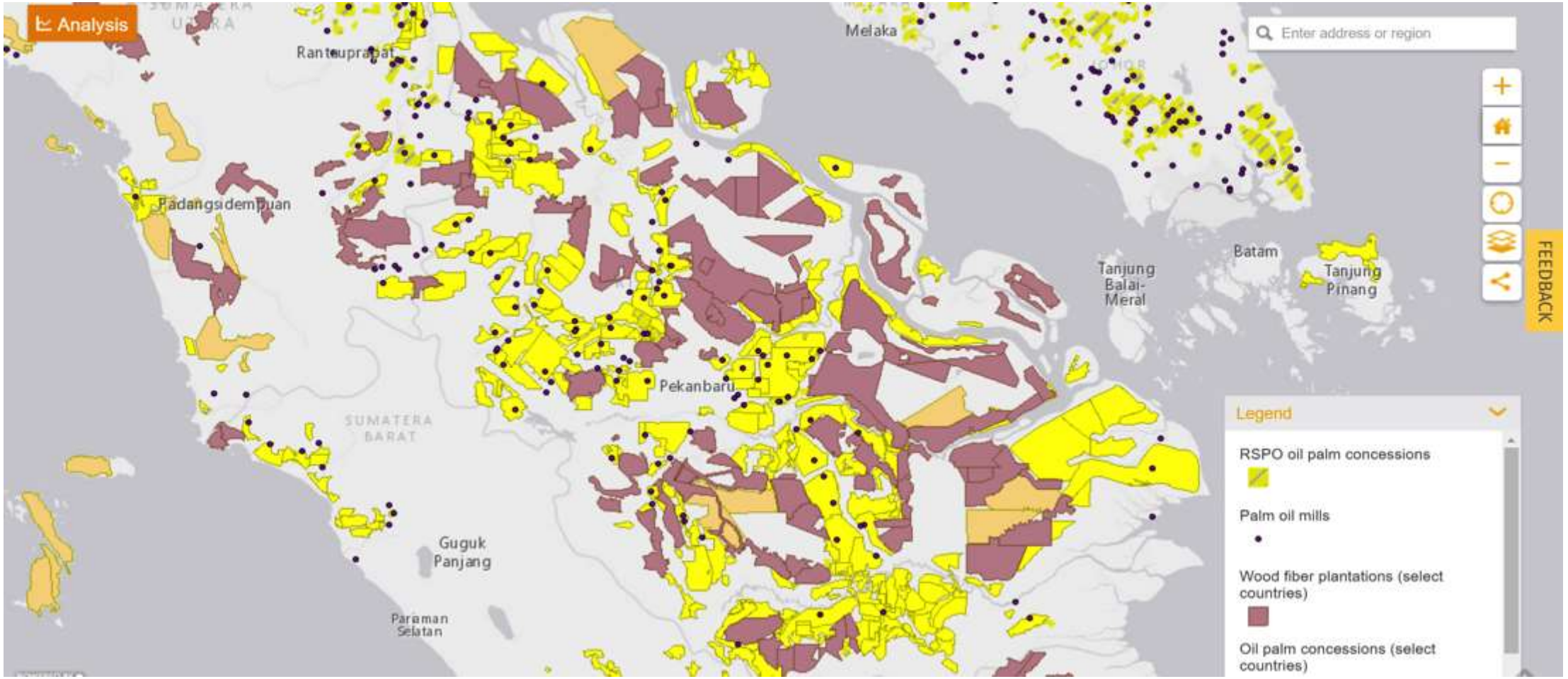
- Basic infrastructure for land use management need to be improved
- Legal certainty on land is weak
- Law enforcement on land use violation is weak
- Social issues and historical factors on land use are rarely touch or take into consideration

Tesso Nilo National Park, 5 July 2015, 0°7’49.87"S ; 101°45’0.04”E … in the heat of fires, GFW being used by a national park ranger



Riau One Map … one map initiative at the sub-national level

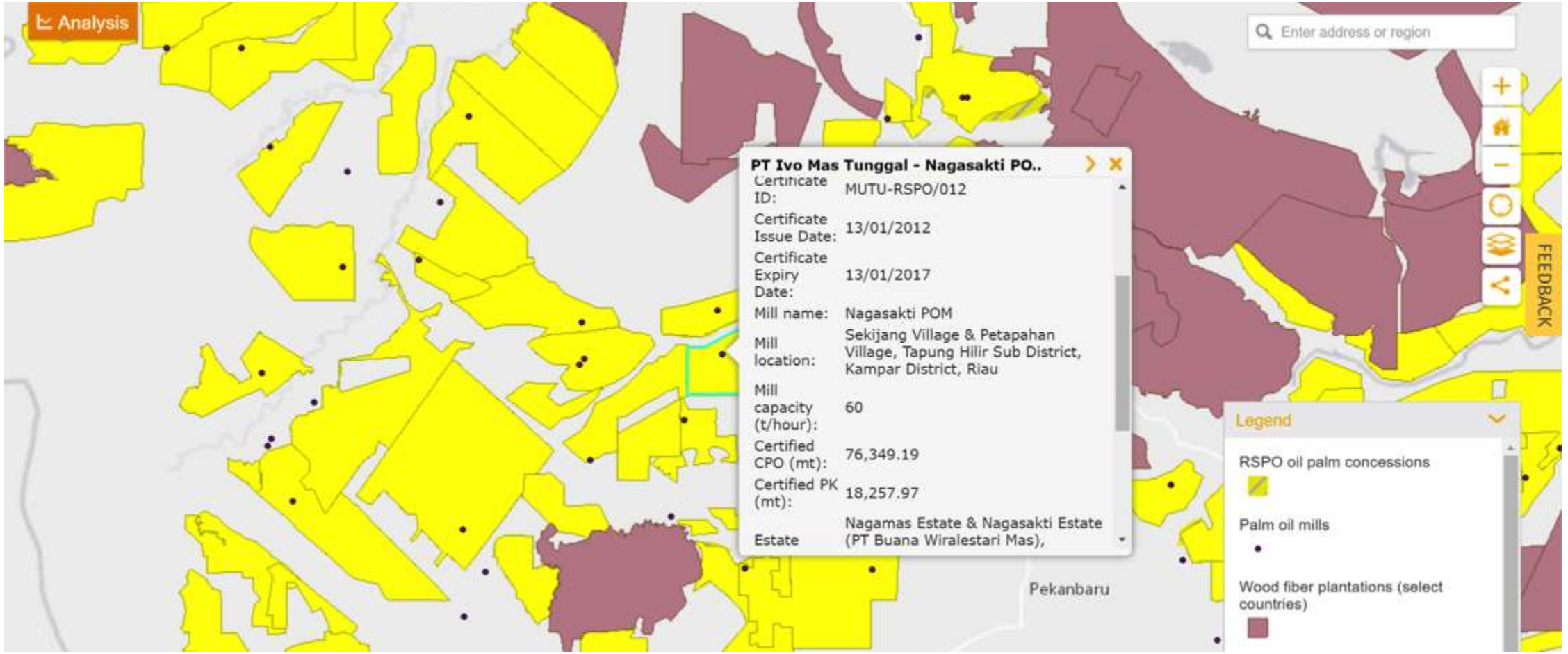
Creating and populating Riau One Map database through multi stakeholders forum to speed up the data collection process, to enlarge the coverage areas, to better coordinate similar efforts. The database will be the starting point to explore and formulate land use solutions for a better forest and land governance.



Oil palm concessions, pulp and paper concessions, and oil palm mill locations | Global Forest Watch Commodities

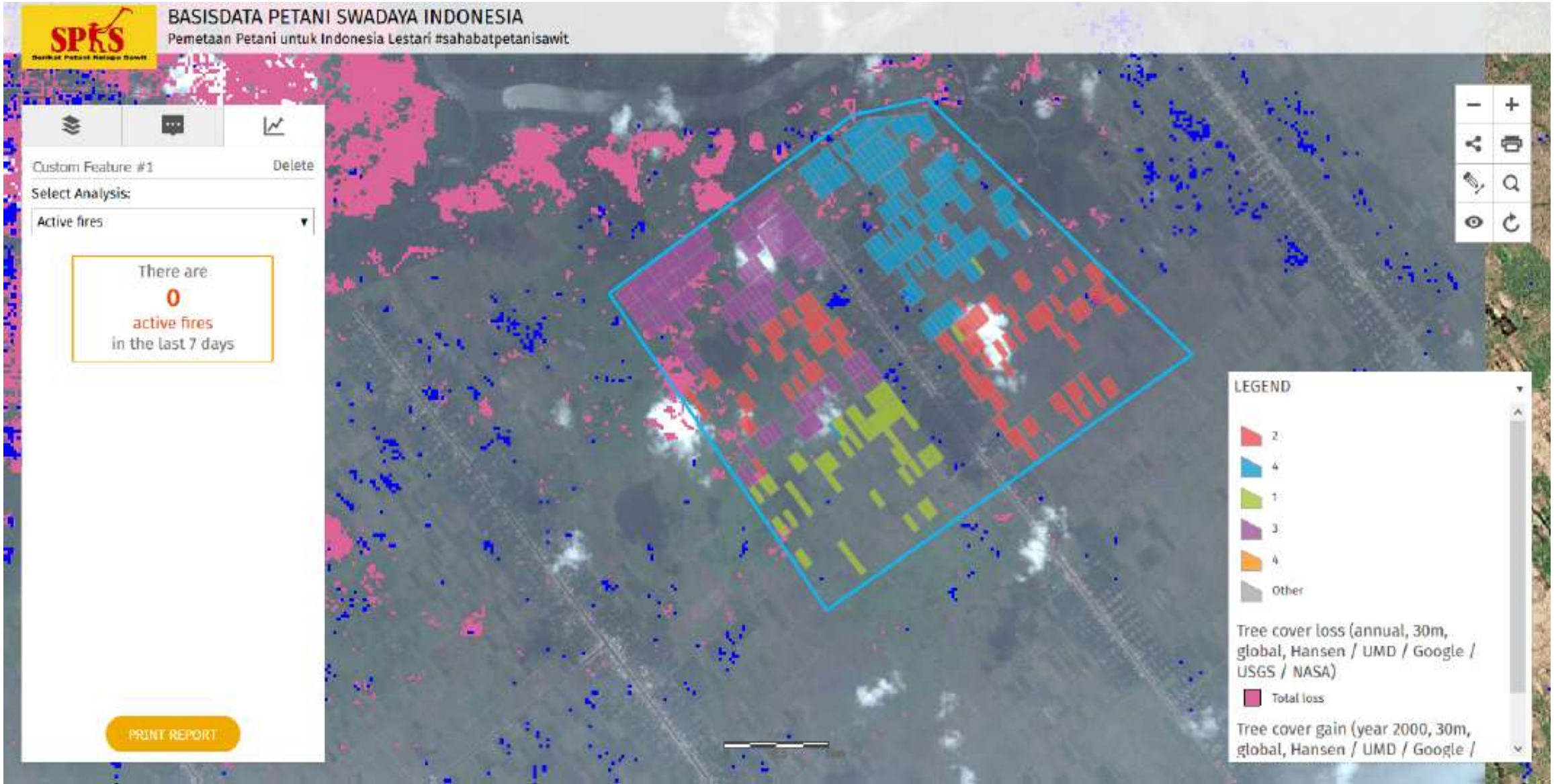
Riau One Map … one map initiative at the sub-national level

More detailed and granular data and collaboration with major producers (e.g on independent smallholders suppliers map), will enable stakeholders to comply with sustainability standard and achieve supply chain traceability for the most part of Riau. This will enable the government to monitor the land use development.

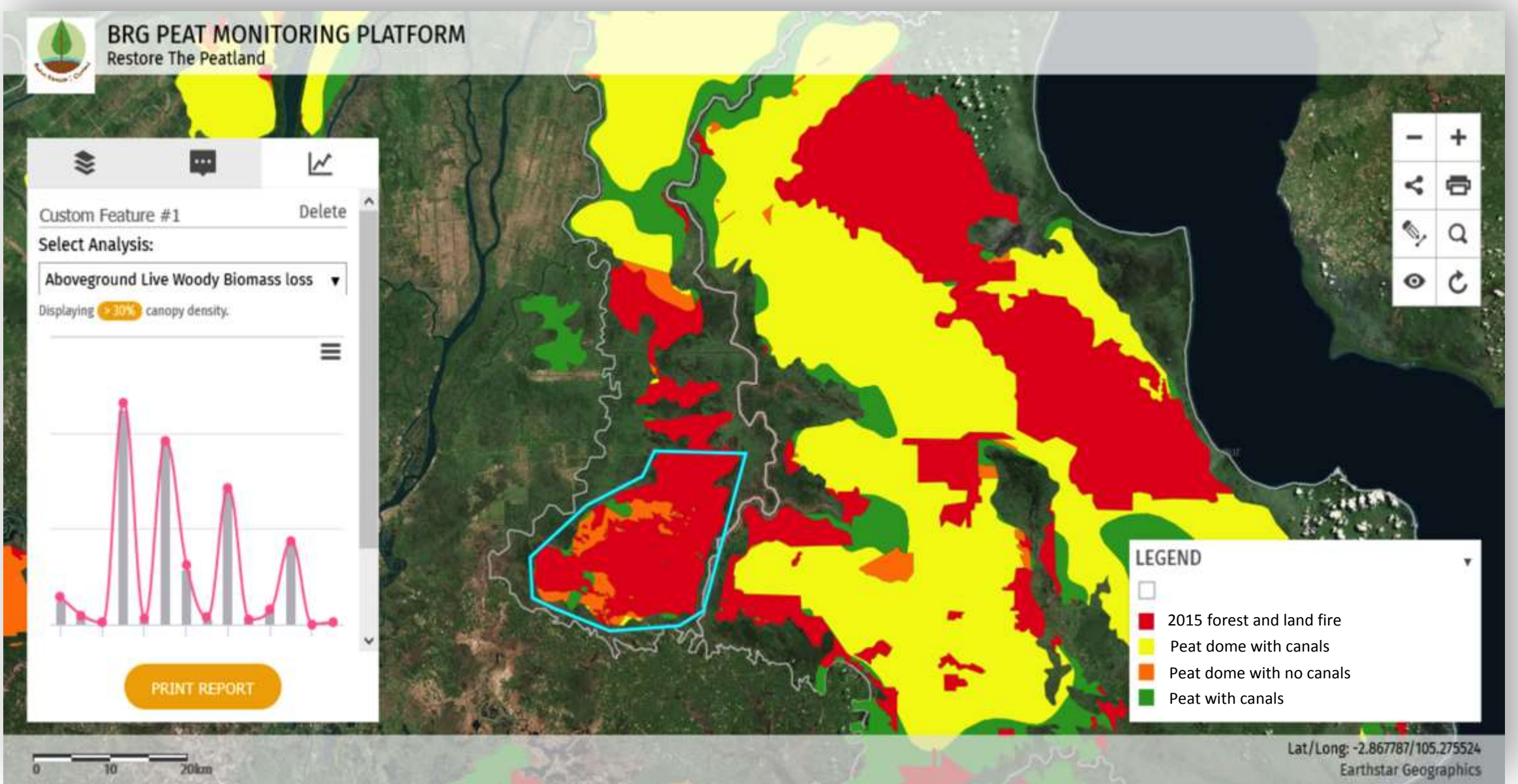


Oil palm concessions, pulp and paper concessions, and oil palm mill locations | Global Forest Watch Commodities

GFW Map Builder helps independent oil palm smallholders association build their database to support production of sustainable oil palm in Riau



GFW Map Builder supports peat restoration program in Riau and South Sumatera



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