

GOFC-GOLD

Global Observation of Forest Cover and Land Dynamics



Land Cover
Project Office



Global Forest Observations Initiative

Joint GFOI/GOFC-GOLD Expert Workshop on Approaches to Monitoring Forest Degradation for REDD+

Wageningen, October 1-3, 2014



Wageningen University and Research Center (WUR): introduction and profile

- Mission: 'To explore the potential of nature to improve the quality of life'
- 6.500 staff and 7.000 students (50/50 BSc/Msc) and 1500 Phds from over 100 countries
- Combination of fundamental and applied research; natural and social sciences:
 - Food and food production
 - Living environment
 - Health, lifestyle and livelihood

= > Much WUR Research is relevant for REDD+

- Center for Geoinformation (~100 people)

The REDD@WUR network



www.redd.wur.nl

- Around 50 researchers on REDD+
- Around 80 researchers part of network
- Research on wide range of topics (MRV, PES, forest management, co-benefits, governance, policy) in almost 30 countries

Aims REDD@WUR network



www.redd.wur.nl

- Build active interdisciplinary **network** at WUR
- Establish and strengthen **collaboration** with researchers and practitioners in partner countries
- Develop **interdisciplinary research programme** on REDD+

Day 1: Wednesday October 1, 2014

8.30 – 9.00 Registration (Meeting room: Gaia 1)

Introduction

Chair: Brice Mora (Wageningen University)

<p align="center">9.00 – 10.00 Room: Gaia 1</p>	Welcome and tour the table	
	Meeting objectives	<i>Ake Rosenqvist (soloEO), Martin Herold (GOFC-GOLD /WUR)</i>
	The GFOI R&D component	<i>Simon Eggleston (GFOI Office)</i>
	GFOI Review of Priority R&D Topics	<i>Anthea Mitchell (UNSW)</i>
	GOFC-GOLD	<i>Brice Mora (GOFC-GOLD /WUR)</i>
	CEOS SDCG for R&D	<i>Ake Rosenqvist (soloEO), Frank Martin Seifert (ESA)</i>

10.00 - 10.15 Coffee break

Requirements : Evolving needs for forest degradation monitoring

Chair: Martin Herold (Wageningen Uni)

<p align="center">10.15 - 11.35 Room: Gaia 1</p>	Forest degradation, IPCC Methods and the Climate Negotiations	<i>Jim Penman (UCL)</i>
	Lessons learned from forest degradation monitoring in developing countries in the context of REDD+ (FAO/UN-REDD)	<i>Erik Lindquist (FAO)</i>
	Previous guidance and requirements for forest degradation monitoring	<i>Martin Herold (GOFC-GOLD / WUR)</i>
	SilvaCarbon workshops on forest degradation – outcomes and recommendations	<i>Deborah Lawrence, (SilvaCarbon)</i>

Methodology session 1 - Monitoring selective logging/harvesting

Chair: Ake Rosenqvist (soloEO)

<p align="center">11.35 - 12.15 Room: Gaia 1</p>	<p>“INPE’s large scale yearly monitoring of evidences of forest logging activities and potential forest degradation areas in Brazilian Amazon” <i>Region/forest type:</i> Brazilian Amazon forest/tropical evergreen forest <i>Sensors:</i> Landsat-TM, ResourceSat-1 LISS-3, CBERS-2B CCD, DMC</p>	<i>Dalton Valeriano (INPE)</i>
	<p>“Forest carbon monitoring for REDD MRV with satellite 3D SAR” <i>Region/forest type:</i> Savannah forest, east Africa <i>Sensors:</i> TanDEM-X, TerraSAR-X, Cosmo-SkyMed</p>	<i>Svein Solberg (NFLI)</i>

Methodology session 2 - Monitoring subsistence land use: fuel-wood extraction, shifting cultivation		
Chair: Anthea Mitchell (UNSW)		
13.30 - 14.45 Room: Gaia 1	<p>"Assessing and monitoring of forest degradation using high resolution remote sensing"</p> <p><i>Region/forest type:</i> SE Asia</p> <p><i>Sensors:</i> Landsat, RapidEye, LiDAR, aerial imagery</p>	<i>Florian Siegert (RSS)</i>
	<p>"Monitoring shifting cultivation and illegal logging at tree level in Amazon forest, Brazil"</p> <p><i>Region/forest type:</i> Tropical rainforest, State of Para, Brazil</p> <p><i>Sensors:</i> ALOS PALSAR, TerraSAR-X</p>	<i>Dirk Hoekman (WUR)</i>
	<p>"Feasibility of Near-Real Time Forest disturbance monitoring in Central Africa"</p> <p><i>Region/forest type:</i> Central Africa, mostly Gabon and CAR</p> <p><i>Sensors:</i> Landsat, SPOT, RapidEye, ALOS PALSAR</p>	<i>Christophe Sannier (SIRS)</i>
14.45 – 15.00 Coffee break		
Working Group session		
15.00 – 17.00 Room: Gaia 1	<p>Synthesise progress and experiences for monitoring different degradation types</p> <ul style="list-style-type: none"> -Evaluate current approaches to forest degradation monitoring -Identify key gaps and obstacles to operational (widespread use) -How can existing guidance be updated? -What are the priority R&D and satellite data needs? 	
Recap of day 1 and close		
Chairs: Brice Mora, Ake Rosenqvist		
17.00 – 17.30 Room: Gaia 1		

Day 2: Thursday October 2, 2014		
Recap of day 1 and report back from working group session		
Chairs: Brice Mora, Frank Martin Seifert		
8.30 - 9.30		
Room: Gaia 1		
Methodology session 3 – Data integration approaches		
Chair: Martin Herold		
9.30 - 10.30 Room: Gaia 1	<p>"Characterising forest degradation in humid tropics using fusion of Polarimetric SAR and optical remote sensing data"</p> <p><i>Region/forest type:</i> Tropical forests in Kalimantan, and tropical peat forests in Sumatera, Indonesia</p> <p><i>Sensors:</i> ALOS PALSAR, Landsat TM/ETM, SPOT</p>	<i>Arief Wijaya (CIFOR)</i>
	<p>"Opportunities and difficulties in quantifying forest degradation"</p> <p><i>Region/forest type:</i> Australia, tropics</p> <p><i>Sensors:</i> Landsat, ALOS PALSAR</p>	<i>Richard Lucas (UNSW)</i>
	<p>"Satellite imagery to map degradation: techniques and challenges"</p> <p><i>Region/forest type:</i> Tropical forest with strong anthropogenic influence in Latin America, Africa and Asia</p> <p><i>Sensors:</i> RapidEye, Landsat, AVNIR, Quickbird, Worldview, Kompsat-2, PALSAR, ASAR, ERS, TerraSAR-X</p>	<i>Tuomas Haeme (VTT)</i>
10.30 – 10.50 Coffee break		
Methodology session 4 – Monitoring approaches		
Chair: Simon Eggleston		
10.50 – 11.50 Room: Gaia 1	"Forest degradation monitoring in Australia"	<i>Neil Sims (CSIRO)</i>
	<p>"Temporal aspects of ecological responses to forest degradation"</p> <p><i>Region/forest type:</i> Boreal and temperate</p> <p><i>Sensors:</i> Landsat, LiDAR</p>	<i>Ronald McRoberts (USDA-FS)</i>
	<p>"Using inventory data as a proxy to delimit forest degradation "</p> <p><i>Region/forest type:</i> Mexico</p> <p><i>Sensors:</i> NFI, UMD maps and other data sources</p>	<i>Ben de Jong (ECOSUR)</i>

Working Group session	
13.30 - 15.30 Room: Gaia 3.5	Synthesise progress and experiences for monitoring different degradation types -Evaluate current approaches to forest degradation monitoring -Identify key gaps and obstacles to operational (widespread use) -How can existing guidance be updated? -What are the priority R&D and satellite data needs?
15.30 - 16.00	Coffee break
Recap of day 2 and report back from working group session	
Chairs: Martin Herold, Anthea Mitchell	
16.00 - 17.00 Room: Gaia 3.5	
Open discussion and close	
Chair: Martin Herold, Frank Martin Seifert	
17.00 - 17.30 Room: Gaia 3.5	
19.00 - late Joint dinner (no-host)	

Day 3: Friday October 3, 2014	
Recap of days 1 and 2	
Chair: Martin Herold	
8.30 - 9.00 Room: Atlas 1	
Plenary discussion and development of action plan	
Chairs: Anthea Mitchell, Simon Eggleston	
9.00 - 10.30 Room: Atlas 1	Methods: Presentation of scientific synthesis paper and update guidance to countries (MGD and GOF-C-GOLD Sourcebook) R&D: List of priorities and next demonstration activities Funding: Potential funding sources and joint proposals
10.30 - 10.50 Coffee break	
Plenary discussion and development of action plan (continued)	
Chairs: Ake Rosenqvist, Frank Martin Seifert	
10.50 - 12.00 Room: Atlas 1	Data: Requirements to SDCG/space agencies List of degradation study sites
12.00 - 13.00 Lunch break	
Concluding discussions and meeting summary	
Chairs: Martin Herold, Ake Rosenqvist	
13.00 - 14.30 Room: Atlas 1	At the conclusion of the WS it is anticipated the following outcomes will be met: Identification of promising approaches/technologies to monitor forest degradation for REDD+ A action plan to progress these methods to pre-op/op status - and possible future inclusion in MGD Selected test sites and research partners for coordinated trials Input/recommendations to CEOS SDCG strategy for R&D
14.30 - Close of meeting	