Date: 14/07/2010



EUROPEAN COMMISSION

JOINT RESEARCH CENTRE
Institute for Environment and Sustainability
Land Management Natural Hazard Unit
FOREST Action

Pan-European Forest/Non-Forest Map 2006

Beta version 1.0

Technical Specifications

Forest/Non-Forest Map			
Specification 2006	Map Classes	1 – Forest RGB=51,153,85 2 – Non-Forest RGB=252,251,212	
		250 - area not covered RGB=240,240,240	
	Thematic Accuracy Format	251 – sea mask RGB=207,235,252 255 – clouds&snow RGB=255,255,255 > 80% (estimated, to be confirmed) GeoTIFF 8-bit LZW compressed.	
Data Basis	Satellite Imagery	Image2006 Spot4 (HRVIR) Spot5 (HRG) IRS-P6 (LISS-III)	
	Spatial Resolution	resampled to 25m	
	Geometric Accuracy	< 1 pixel	
	Map Projection	ETRS89 Lambert Azimuthal Equal Area (ETRS-LAEA)	
	Acquisition date	target year 2006	
	Ancillary data	CORINE Land Cover 2006 (2000 for UK and GR) Neighboring country information for CH	
	Coverage	EU27 plus BA, HR, MK, LI, RS, ME, AL, NO, CH, TR	
	Validation data	work in progress	

Forest

Class Description

The forest class should be considered as a *forest cover* class rather than *forest use* class. Those areas are defined as *"forest"* which are occupied by forest and woodlands with a vegetation pattern composed of native or exotic *coniferous* and/or *broad-leaved* trees

this heading excludes:

- clearcuts
- forest roads
- forest nurseries and regeneration (with canopy closure less than 30%)
- burnt areas
- woodlands with trees smaller than 5 m height

this heading includes:

broad-leaved:

- broad-leaved forest with more than 30% crown cover
- plantations of e.g. eucalyptus, poplars
- evergreen broad-leaved woodlands composed of sclerophyllous trees (mainly *Quercus ilex, Quercus Suber, Quercus Rotondifolia*)
- arborescent mattoral with sclerophyllous species
- olive-carob forests dominated by *Olea europaea sylvestris, Ceratonia siliqua*
- palm groves woodlands, tamarix woodlands, holly woodlands
- broad-leaved wooded dunes
- sub-arctic broad-leaved forests not reaching the 5 m height
- transitional woodland areas when the canopy closure of trees cover more than 50% of the area and if their average breast height diameter is at least 10 cm

coniferous:

- coniferous forest with more than 30% crown cover
- non-evergreen coniferous trees woodland composed of larix species
- arborescent matteral with dominating juniperus oxycedrus/phoenica
- Christmas trees plantations
- coniferous wooded dunes
- sub-arctic coniferous forest, not reaching the 5 m height

mixed:

- mixed forest, the share of coniferous or broad-leaved does not exceed 25% in the canopy closure
- mixed wooded dunes

due to the *similarity of spectral signatures*, following land classes are difficult to separate and may in certain cases also be classified as forest in the **forest layer** dependent on the tree density and background reflectance:

- wooded parks
- parts of olive groves
- fruit tree plantations (e.g. orchards of apple trees)
- agro-forestry areas
- transitional woodlands

Coordinate	Projection_name	ETRS-LAEA
Reference	Projection	Lambert Azimuthal Equal Area
System	GEOGCS	
	Datum	ETRS89
	Spheroid	GRS80
	semi-major axis	6378137
	inverse flattening	298.2572221
	Parameters Parameters	
	False easting	4321000.0
	False northing	3210000
	Central_Meridian	0.0
	Latitude_of_origin	52N
	Longitude_of_origin	10E
	Unit	"Meter",1.0
	epsg code	<3035>

Reference

Annoni, A., C. Luzet, et al. (2003). Map Projections for Europe, A joint initiantive of Eurogeographics and the Institute for Environment and Stability. Workshop 14-15 December 2000, Marne-La Vallée, Proceedings and Recommendations; European Commission EUR 20120 EN

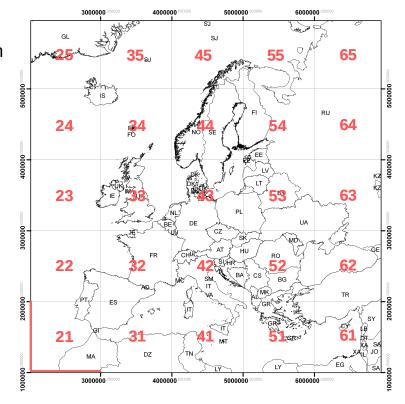
European Grid Tiling System

Grid space:

1000km x 1000km

Cell origin:

Lower Left Corner



Reference

P. Kempeneers, F. Sedano, L. Seebach, J. San-Miguel-Ayanz. Data fusion of High and Medium Resolution Remote Sensing images applied to forest type mapping. *Transactions on Geoscience and Remote Sensing* (submitted in 2010).

Contact

FOREST Action
JOINT RESEARCH CENTRE
Institute for Environment and Sustainability
Land Management Natural Hazard Unit
I-21027 Ispra (VA), Italy

website: http://forest.jrc.ec.europa.eu/mail: forest-map@jrc.ec.europa.eu