Documentation – Land Use Classification of the Rur Catchment 2009

Content	
files:	data
	Lu2009.tif
	Lu2009.tfw
	Lu2009.aux
	Lu2009.rrd
	Lu2009.tif.xml
	Lu2009.tif.vat.dbf
	Lu2009_ascii.txt [land use dataset as ascii file]
	documentation
	this file
	Read_Me.txt
	Lu2009_Legend.txt
data size:	7 MB (105 MB unzipped)
extend:	Rur Catchment
provider:	Z1 (G. Waldhoff)
language:	english
date of publication:	02/2010
date of purchase:	/
Description	
description:	This data set contains the land use classification of 2009 for the study area of the CRC/Transregio 32: "Patterns in Soil-Vegetation-Atmosphere Systems: monitoring, modelling and data assimilation", which is the catchment of the river Rur. The study area is mainly situated in the western part of North Rhine-Westphalia (Germany) and parts of the Netherlands and Belgium, covering an area of approximately 2365 square kilometres. The land use classification is derived from a supervised, multi temporal remote sensing data analysis using 'Advanced Spaceborne Thermal Emission and Reflection Radiometer' (ASTER) and RapidEye data. ASTER is a multispectral satellite sensor, which has three bands in the visible and near infrared (VNIR) with 15 m spatial resolution, six bands in the shortwave infrared (SWIR) with 30 m, and five bands in the thermal infrared (TIR) with 90 m. For the land use classification the VNIR data

	acquired on July 27, 2009 were used. Each sensor of the RapidEye earth observation satellite system has five multispectral bands in the visible to near infrared wavelength region with a spatial resolution of 6.5 m. The incorporated data set was acquired on May 24, 2009. To enhance the information content of the land use data the Multi-Data Approach was used to combine the remote sensing data with additional data sets like the 'Authorative Topographic-Cartographic Information System' (ATKIS Basic-DLM). The classification is provided in GeoTIFF and in ASCII format. Spatial resolution: 15 m; projection: WGS84, UTM Zone 32N.
abbreviations used in data:	/
	<u>**Note:**</u> **By downloading this dataset you accept adequate reference in case this data will be discussed or used in any publication or presentation. In this case please use the following citation:** **Waldhoff, Guido (2010): Land use classification of 2009 for the Rur catchment. DOI: 10.1594/GFZ.TR32.1.**

Example
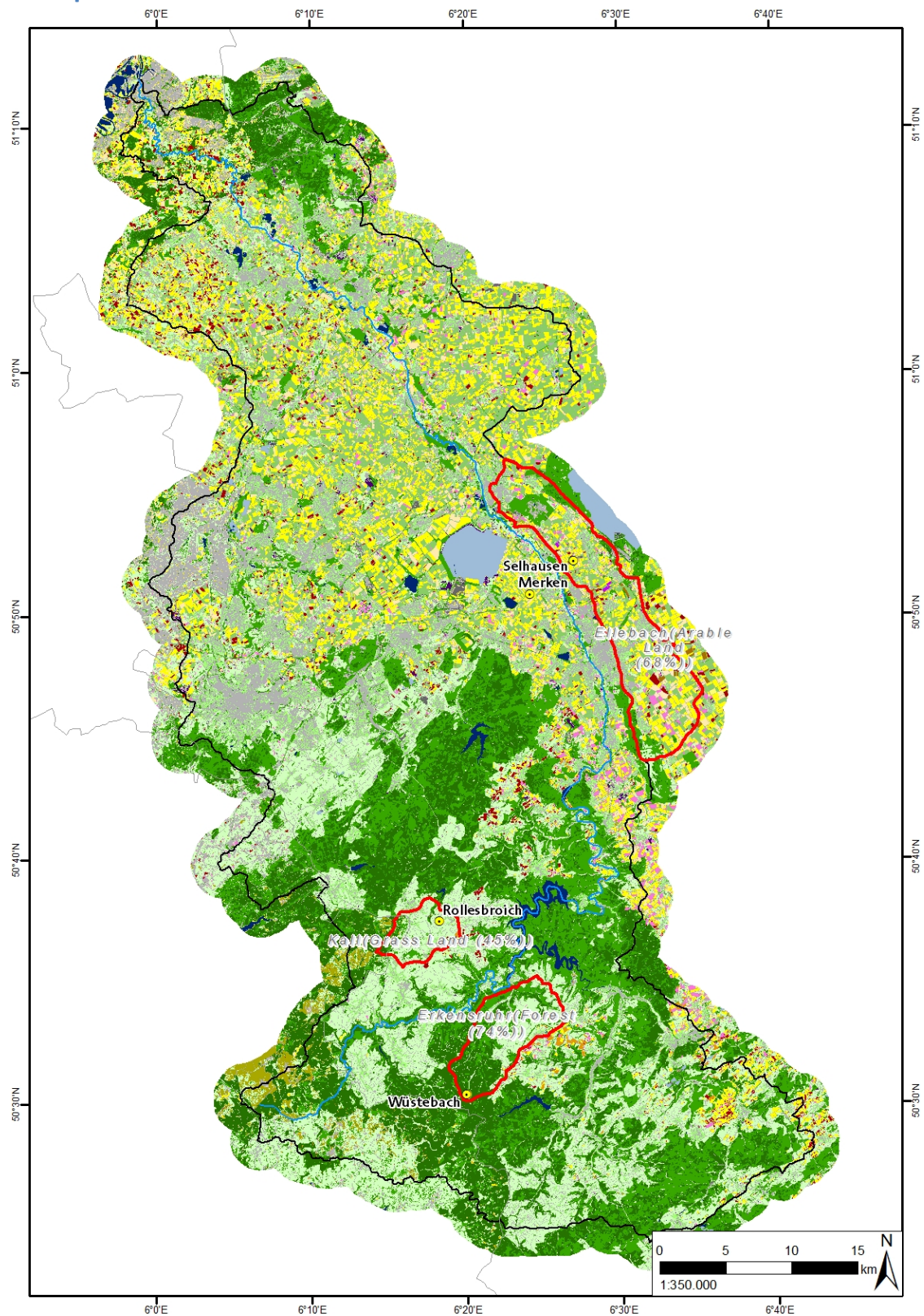
Coverage of the Land Use Classification 2009

Author

G. Waldhoff (Z1)