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**CARBON SINKS ATLAS FOR SOUTH AFRICA**  
**Total Biomass Organic Carbon of Natural and Transformed  
areas (gC/m<sup>2</sup>)**

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**Metadata Date Stamp:**  
*25 October 2015*

**DATASET DESCRIPTION**

**File Names:**

**Data:**

*TotalBiomassOrganicCarbon\_Natural\_Transformed\_DEA\_CSIR\_1.1.9-2015-11-11*

**Metadata:**

*TBOC\_Natural\_and\_Transformed\_gC\_per\_sq.m\_OR\_2015\_Q4\_Metadata*

**Dataset Reference Date:**  
*2015/09/23*

**Data quality:**

*Good – data modelled in Carbon Stocks Model and accuracies of this layer is dependent on the accuracies of various base layers used in modelling*

**Dataset Responsible Party:**

*Department of Environmental Affairs / Director Enterprise Geospatial Information Management*

**Geographic Location of the Dataset: RSA**

*West 15.637661*

*East 33.655553*

*North -21.918463*

*South -35.027407*

**Keywords:**

*TBOC, Total Biomass Organic Carbon, organic carbon*

**Dataset Language:**

*English (SOUTH AFRICA)*

**Dataset Character Set:**

*utf8 - 8 bit UCS Transfer Format*

**Dataset Topic Category:**

*007 = Environment (ISO 19115 Topic category)*

**Dimensions:**

*X: 1406 Y:1207 Bands: 1*

**Spatial Resolution of the Dataset:**

*1189.318433 Meter*

**No Data Value:**

*-1*

**Data Type:**

*Float32 – Thirty two bit floating point*

**Raster Format:**

*GeoTiff*

**Data Release classification:**

Release classification	Description	Time frame	Example
OR	Official release	Quarter 4 30 November 2015	TBOC_natural_transformed_gC_per_sq.m_OR_2015_Q4

**Citation:****Citation Information:**

**Originator:** *Department of Environmental Affairs*

**Publication Date:** *May 2015*

**Title:** *South African National Terrestrial Carbon Sink Assessment*

**Location:** *Pretoria, South Africa*

**Geospatial Data Presentation Form:** *Raster digital data*

**Other Citation Details:** *Data of the South African National Terrestrial Carbon Sink Assessment is published on the SAEON shared platform. Link to detailed report:*

*[https://www.environment.gov.za/sites/default/files/docs/nationalterrestrial\\_carbon\\_sinksassessment\\_sect1.pdf](https://www.environment.gov.za/sites/default/files/docs/nationalterrestrial_carbon_sinksassessment_sect1.pdf)*

**Abstract:**

*The Total Biomass Organic Carbon of Natural and Transformed areas could simply be added together as they have each been corrected for fractional land cover. It therefore represents all the biomass organic carbon of natural vegetation, crops, urban areas and forestry plantations. For details see [Total Biomass Organic Carbon of Transformed areas and Total Biomass Organic Carbon of Natural Areas](#)*

**Purpose:**

*This data set is part of a series of output data layers generated by CSIR for DEA as part of the South African National Terrestrial Carbon Sink Assessment.*

*Link to detailed report:*

*[https://www.environment.gov.za/sites/default/files/docs/nationalterrestrial\\_carbonsinksassessment\\_sect1.pdf](https://www.environment.gov.za/sites/default/files/docs/nationalterrestrial_carbonsinksassessment_sect1.pdf)*

*Link to synopsis report:*

*[https://www.environment.gov.za/sites/default/files/reports/nationalterrestrial\\_carbonsinks\\_synopsisreport.pdf](https://www.environment.gov.za/sites/default/files/reports/nationalterrestrial_carbonsinks_synopsisreport.pdf)*

**Supplemental Information:**

*None*

**Lineage Statement:**

*The first version of the data was generated in 2013, but not released.*

*The data were released on-line for the first time in Nov 2015*

## ATTRIBUTE INFORMATION

### Attribute Description:

Field name	Alias Name	Data Type	Description	Example
Cell value	Cell value	32-bit Floating point	Total Biomass Organic Carbon of Natural and Transformed areas as measured in gC/m <sup>2</sup>	1244.18

## SUPPLEMENTARY INFORMATION

*None*

## DATA MAINTENANCE

### Dataset last updated:

*2015/10/06*

### Time Period of Content:

*Carbon stocks were calculated to represent the long-term mean conditions 2000-2010.*

### Maintenance and update frequency:

*No updates*

## DISTRIBUTION AND CONSTRAINTS

### On/line Resource:

*The Environment GIS (EGIS) Website*

<http://egis.environment.gov.za/>

*The Department of Environmental Affairs (DEA) must be acknowledged in the use of the data as per citation information.*

*The South African Environmental Observation Network (SAEON)*

<http://www.saeon.ac.za/>

### Distribution Format:

*GeoTIFF*

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**Acknowledgments:**

*The development of the online Carbon Sinks Atlas and website was funded by Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ). Visit <https://www.giz.de> for more information on GIZ.*

*The models for the National Terrestrial Carbon Sinks Assessment for South Africa and the online Carbon Sinks Atlas were developed by CSIR for the South African Department of Environmental Affairs (DEA).*

*The National Terrestrial Carbon Sink Assessment (2015) was conducted for and published by Department of Environmental Affairs, Pretoria, South Africa. Link to report: [https://www.environment.gov.za/sites/default/files/docs/nationalterrestrial\\_carbonsinksassessment\\_sect1.pdf](https://www.environment.gov.za/sites/default/files/docs/nationalterrestrial_carbonsinksassessment_sect1.pdf).*

*The National Terrestrial Carbon Sink Assessment for South Africa was funded by UK Department for International Development (DfID). Visit <https://www.gov.uk/government/organisations/departement-for-international-development> for more information on DfID*

## METADATA INFORMATION

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**Additional Extent information for the Dataset (Vertical & Temporal):**

*N/A*

**Spatial Representation Type:**

*Raster – Area*

**Spatial Reference:**

*Coordinate Reference: GCS\_WGS\_1984*  
*Projection - Albers\_Conic\_Equal\_Area*

**Projection:**

```
PROJCS["Albers_Equal_Area_Conic_South_Africa",  
  GEOGCS["GCS_WGS_1984",  
    DATUM["D_WGS_1984",  
      SPHEROID["WGS_1984",6378137,298.257223563]],  
    PRIMEM["Greenwich",0],  
    UNIT["Degree",0.0174532925199433]],  
  PROJECTION["Albers"],  
  PARAMETER["False_Easting",0],  
  PARAMETER["False_Northing",0],  
  PARAMETER["central_meridian",25],  
  PARAMETER["Standard_Parallel_1",-12],  
  PARAMETER["Standard_Parallel_2",-31],  
  PARAMETER["latitude_of_origin",0],
```

**Metadata File Identifier:**

*TBOC\_Natural\_and\_Transformed\_gC\_per\_sq.m\_OR\_2015\_Q4\_METADATA*

**Metadata Standard Name:**

*SANS 1878*

**Metadata Standard Version:**

*SANS 1878/1:2005*

**Metadata Language:**

*English*

**Metadata Character Set:**

*US/Ascii*