

Abstract

The **Grid Garage** Toolbox is designed to help you undertake the Geographic Information System (GIS) tasks required to process GIS data (geodata) into a standard, spatially aligned format. This format is required by most, grid or raster, spatial modelling tools such as the [Multi-criteria Analysis Shell for Spatial Decision Support \(MCAS-S\)](#). Grid Garage contains 36 tools designed to save you time by batch processing repetitive GIS tasks as well diagnosing problems with data and capturing a record of processing step and any errors encountered.

Grid Garage provides tools that function using a list based approach to batch processing where both inputs and outputs are specified in tables to enable selective batch processing and detailed result reporting. In many cases the tools simply extend the functionality of standard ArcGIS tools, providing some or all of the inputs required by these tools via the input table to enable batch processing on a 'per item' basis. This approach differs slightly from normal batch processing in ArcGIS, instead of manually selecting single items or a folder on which to apply a tool or model you provide a table listing target datasets. In summary the Grid Garage allows you to:

- List, describe and manage very large volumes of geodata.
- Batch process repetitive GIS tasks such as managing (renaming, describing etc.) or processing (clipping, resampling, reprojecting etc.) many geodata inputs such as time-series geodata derived from satellite imagery or climate models.
- Record any errors when batch processing and diagnose errors by interrogating the input geodata that failed.
- Develop your own models in ArcGIS ModelBuilder that allow you to automate any GIS workflow utilising one or more of the Grid Garage tools that can process an unlimited number of inputs.
- Automate the process of generating MCAS-S TIP metadata files for any number of input raster datasets.

The Grid Garage is intended for use by anyone with an understanding of GIS principles and an intermediate to advanced level of GIS skills. Using the Grid Garage tools in ArcGIS ModelBuilder requires skills in the use of the ArcGIS ModelBuilder tool.

Download Instructions: Create a new folder on your computer or network and then download and unzip the zip file from the GitHub Release page for each of the following items in the 'Data and Resources' section below. There is a folder in each zip file that contains all the files. See the [Grid Garage User Guide](#) for instructions on how to install and use the Grid Garage Toolbox with the sample data provided.

Resource locator

[Data Quality Statement](#)

Name: Data Quality Statement

Protocol: WWW:DOWNLOAD-1.0-http--download

Description:

Data quality statement for Grid Garage ArcGIS Toolbox

Function: download

[Grid Garage V3.1 User Guide](#)

Name: Grid Garage V3.1 User Guide

Protocol: WWW:DOWNLOAD-1.0-http--download

Description:

Grid Garage ArcGIS Toolbox User Guide. Also contains technical documentation for each of the 36 tools and tutorials.

Function: download

[Grid Garage V3.1 ArcGIS Toolbox](#)

Name: Grid Garage V3.1 ArcGIS Toolbox

Protocol: WWW:DOWNLOAD-1.0-http--download

Description:

Grid Garage V3.1 ArcGIS Toolbox. See instructions in the Grid Garage User Guide to install and use the toolbox in ArcGIS.

Function: download

[Grid Garage](#)

Name: Grid Garage Sample Data v1.0.2

[Sample Data v1.0.2](#)

Protocol: WWW:DOWNLOAD-1.0-http--download

Description:

Sample Data v1.0.2 for use with Grid Garage V3.1 ArcGIS Toolbox User Guide and tutorials.

Function: download

Unique resource identifier

Code 16f10f27-9506-4452-a317-31fa9df4dfba

Presentation form Document digital

Edition 3.1.2.1

Dataset language English

Metadata standard

Name ISO 19115

Edition 2016

Dataset URI <https://datasets.seed.nsw.gov.au/dataset/16f10f27-9506-4452-a317-31fa9df4dfba>

Purpose Manage and manipulate spatial data

Status Completed

Spatial representation type None

Spatial reference system

Code identifying the spatial reference system 4283

Topic category

Keyword set	
keyword value	software
Originating controlled vocabulary	
Title	ANZLIC Search Words
Reference date	2008-05-16
Geographic location	
West bounding longitude	-170.31096
East bounding longitude	180
North bounding latitude	-84.82788
South bounding latitude	84.4442
Vertical extent information	
Minimum value	-100
Maximum value	2228
Coordinate reference system	
Authority code	urn:ogc:def:cs:EPSG::
Code identifying the coordinate reference system	5711
Temporal extent	
Begin position	2017-03-06
End position	N/A
Dataset reference date	
Resource maintenance	
Maintenance and update frequency	Unknown
Contact info	
Contact position	Data Broker
Organisation name	NSW Department of Climate Change, Energy, the Environment and Water
Telephone number	131555
Email address	data.broker@environment.nsw.gov.au
Web address	https://www.nsw.gov.au/departments-and-agencies/dcceew
Responsible party role	pointOfContact
Limitations on public access	

Responsible party

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Metadata date 2024-02-26T13:08:07.778947

Metadata language