Title Fire Extent and Severity Mapping (FESM) 2020/21 **Alternative** FESMv3 title(s) **Abstract** Fire severity is a metric of the loss of biomass caused by fire. In collaboration with the NSW Rural Fire Service, DPE Remote Sensing & Regulatory Mapping team has developed a semi-automated approach to mapping fire extent and severity through a machine learning framework based on sentinel 2 satellite imagery. The statewide severity map has standardised classes to allow comparison of different fires across the landscape. The FESM severity classes include: unburnt, low severity (burnt understory, unburnt canopy), moderate severity (partial canopy scorch), high severity (complete canopy scorch, partial canopy consumption), extreme (full canopy consumption). This dataset represents the 2020/21 fire year including all wildfires >10ha with a fire start date between July 2020 and June 2021. Resource locator Show on SEED Name: Show on SEED Web Map Web Map Protocol: WWW:DOWNLOAD-1.0-http--download Description: Display dataset on SEED's map Function: download **Data Quality** Name: Data Quality Statement **Statement** Protocol: WWW:DOWNLOAD-1.0-http--download Description: Data quality statement for Fire Extent and Severity Mapping (FESM) 2020/21 Function: download **NSW Fire Extent** Name: NSW Fire Extent and Severity Mapping (FESMv3) Factsheet and Severity **Mapping** Protocol: WWW:DOWNLOAD-1.0-http--download (FESMv3) Function: download Factsheet **Data Download** Name: Data Download Package Package Protocol: WWW:DOWNLOAD-1.0-http--download Description: FESM v3 - data in ESRI GRID format + ESRI Layer file Function: download Name: Data Download Package **Data Download Package** Protocol: WWW:DOWNLOAD-1.0-http--download Description: FESM v3 - data in IMG and TIFF format Function: download WMS - Web Map Name: WMS - Web Map Service **Service** Protocol: WWW:DOWNLOAD-1.0-http--download Description: Web Map Service (WMS) is a standard protocol for serving georeferenced map images over the internet that are generated by a map server using data from a GIS Database (NSW Government - Spatial Web Services Register June 2015). WMS allows

a user to spatially visualise the dataset, but not query its features. This service is

aimed at advanced geographical information users, and will require access to geographical information system (GIS) software such as QGIS and ArcGIS/ArcMap

Function: download

ArcGIS REST Service

Name: ArcGIS REST Service

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

Description:

An ArcGIS Server web service represents a GIS resource—such as a map, locator, or image—that is located on an ArcGIS Server site and is made available to client applications. Depending on the layers enabled, this web service allows a user to query its features and/or visualise the dataset. This service is aimed at advanced geographical information users, and will require access to geographical information

system (GIS) software such as ArcGIS/ArcMap.

Function: download

Unique resource identifier

Code 71e2d6bb-136a-4046-aba4-2bbe77086392

Presentation

form

Map digital

Edition FESMv3

Dataset language

English

Metadata standard

Name ISO 19115

Edition 2016

Dataset URI https://datasets.seed.nsw.gov.au/dataset/71e2d6bb-136a-4046-aba4-2bbe77086392

Purpose Bushfire response planning and analysis by land and environmental managers

Status Completed

Spatial

representation

grid

type

Spatial reference system

Code identifying

the spatial

4283

reference system

Spatial resolution

10 m

Topic category

Keyword set	
keyword value	HAZARDS-Fire
	ECOLOGY-Ecosystem
	ECOLOGY-Habitat
	VEGETATION
Originating controlled vocabulary	
Title	ANZLIC Search Words
Reference date	2008-05-16
Geographic location	
West bounding longitude	140.273438
East bounding longitude	155.083008
North bounding latitude	-36.354774
South bounding latitude	-27.999058
NSW Place Name	NSW
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	2019-01-01
End position	N/A
Dataset reference date	
Resource maintenance	
Maintenance and update frequency	Not planned
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

Lineage

Layer was developed with a semi-automated approach to mapping fire extent and severity through a machine learning framework based on sentinel 2 satellite imagery. The severity maps have standardised classes to allow comparison of different fires across the landscape.

Originally the layer was produced as an Lamberts Conic Conformal projection IMG TIFF file (but converted to a 10m Esri GRID in in line with internal EES spatial convention for storage on P and SDE).

Limitations on public access

Responsible party

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

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Metadata date 2024-02-26T13:32:26.694944

Metadata language