



District Information Pack

Central Coast

The Central Coast District is located on the coast of New South Wales, north of Sydney and south of Newcastle. Covering an area of 243,800 hectares (2,438km²), the District incorporates the Local Government Areas (LGA) of Central Coast and Lake Macquarie. The District extends along the coast and hinterland from the southern edge of Newcastle to the Hawkesbury River and inland to the Sugarloaf Range, Watagan Range and Great Northern Rd.

The M1 Pacific Motorway intersects the District from north to south with predominantly urban land use to the east and rural land use and forestry to the west of the motorway. There are agricultural areas and a range of National Parks and Forestry areas throughout the District predominantly on the western and southern sides.

The District has a population of approximately 560,441 (2021 census) with the majority living on the coastal strip around the three large inland waterways of Lake Macquarie, Tuggerah Lake and Brisbane Water. Gosford, Wyong and Warners Bay and their associated suburbs are the main population centres in the District along with a number of coastal settlements, outlying rural villages and rural residential areas and isolated homesteads. There are numerous peri-urban areas and industrial estates intermingled with bushland throughout the District.

Central Coast and Lake Macquarie LGAs contain natural bushland surrounds, State Forests and National Parks. The area contains key significant economic infrastructure such as electricity power stations and transmission lines, gas pipe lines, telecommunication towers, agriculture, coal mines, and industrial spanning across the area. The area contains key State and Federal transport infrastructure including the M1 Pacific Motorway (127km) and northern rail line corridor, used primarily as a transport route from Sydney to Brisbane. Population growth has driven migration patterns and residential expansion into the region due to demand from metropolitan Sydney and housing affordability. Tourism is an increasing contributor to the area, with visitors seeking recreational activities at local beaches, lakes, parklands and National Parks.

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The Central Coast District averages 2,474 incidents per year, of which 540 are bush and grass fire incidents. The main sources of ignition in the Central Coast are:

- Illegal burning activity
- Escapes from legal burning
- Arson & Incendiarism
- Ignition of abandoned/stolen motor vehicles
- Lightning
- Arching electrical power lines

The primary Incident Control Centre and Emergency Operations Centre is located within the Charmhaven Fire Control Centre (105 Arizona Rd Charmhaven) with a secondary Incident Control Centre and Emergency Operations Centre located within the Kariong Fire Control Centre (155 Woy Woy Rd Kariong). The Lake Macquarie Emergency Operations Centre is located at 1A George Booth Dr Cameron Park.

1.1. Contact Information

District Office Address:	105 Arizona Road Charmhaven NSW 2263
District Office Phone:	02 4394 3100
After Hours Contact:	Via State Operations on 02 8741 5400
A PSN Radio Channel:	105 CENCO A – Primary Dispatch Channel
B PSN Radio Channel:	205 CENCO B
PMR Channel:	2205 CENCO P
ESO Conversion Chart:	Please see file in folder for relevant conversion information
Fire Weather Forecast Area:	The Central Coast LGA falls within the Greater Sydney Fire Weather District, Lake Macquarie LGA falls within the Greater Hunter Fire Weather District
Local Government Area:	Central Coast, Lake Macquarie

1.2. Topography

The dominant landscape pattern in the north of the District is one of low but often steep-sided hills, separated by flat valleys, with the land rising along the western boundary to the rugged escarpment of the Watagans and Sugarloaf ranges. The eastern side is dominated by Lake Macquarie and the Pacific Ocean separated by urban areas as well as low-lying dunes and swamplands.

The terrain in the south-eastern part of the District varies from open flats, open woodlands, and rocky mountainous terrain with heath vegetation (particularly on the coastal strip). The Brisbane Waters and Bouddi National Parks dominate the far south / southeast of the area. The South Western area of the District includes the vast wilderness of the Dharug National Park, Macpherson State Forest and the Mangrove Creek catchment area. The area is bounded by the Hawkesbury River to the south of the District which includes a number of water access only river communities.

1.3. Vegetation

The vegetation in the Central Coast Rural Fire District is classified by Keith (2004). Dominant vegetation types are: dry sclerophyll forest (shrubby), dry sclerophyll forest (shrub/grass), wet sclerophyll forest (shrubby), wet sclerophyll forest (grassy), with pockets of rainforest, heathlands, forested and saline wetlands. There are three general vegetation areas throughout the District:

- The coastal flat areas where higher density settlement exists with significant urban interfaces. Vegetation tends to be coastal heath with a significant amount of low-lying swampland. Fires in

these areas move quickly (10-20km/h) and pose a high threat when the weather conditions are conducive to fire.

- The valley areas where there is cleared farming land along major rivers and creeks, the majority of which is cattle grazing/dairy properties which open to wider areas in the middle of the catchments. These areas tend to become more undulating with native grasses with high volatility in dryer periods.
- Heavily forested, steep terrain areas. The vegetation on higher elevations tends to be dry sclerophyll with wet sclerophyll and patches of rainforest in gullies. Fires in these areas tend to be inaccessible requiring a slower campaign fire approach.

1.4. Climate

The typical / average climate in the Central Coast area is divided into the eastern coastal strip (approx. 10-12km wide to the M1 Pacific motorway), and the western areas extending to the dividing range. The climate overall is cool temperate with predominately summer rainfall. The coastal strip is dominated by local coastal weather patterns (predominant coastal winds) and the western areas can be slightly warmer, drier and less humid, often influenced by wider wind systems. The bush fire season generally runs from August to March.

Prevailing weather conditions associated with the bush fire season in the Central Coast area are associated with coastal conditions, and more generally north-westerly winds accompanied by high daytime temperatures and low relative humidity. There are also occasional dry lightning storms occurring during the bush fire season.

1.5. Average Weather Data

Summary of major climate statistics for Mangrove Mountain recorded by the BoM (last updated 4 July 2024)

Element (Mean)	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
Max Temp (°C)	23.0	24.5	26.4	27.5	26.7	24.9	22.0	18.9	16.1	15.8	17.6	20.8
Min Temp (°C)	11.4	13.6	15.4	16.9	16.8	15.3	12.0	8.9	7.0	5.9	6.5	9.1
Rainfall (mm)	80.5	95.2	87.1	104.7	146.0	151.8	85.8	78.3	103.6	62.9	61.0	65.5
3pm Temp (°C)	20.7	22.2	24.3	25.4	24.9	23.2	20.4	17.3	14.9	14.3	16.9	19.0
3pm wind (km/h)	16.3	16.8	17.1	16.5	15.0	13.6	12.3	11.2	11.6	12.3	14.0	15.8
3pm RH (%)	53	58	57	61	64	62	62	64	64	58	49	49

Summary of major climate statistics recorded at Cooranbong (Lake Macquarie AWS) recorded by the BoM (last updated 4 July 2024)

Element (Mean)	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
Max Temp (°C)	24.3	25.9	27.4	28.8	28.0	26.8	24.3	21.3	18.5	18.7	19.9	22.7
Min Temp (°C)	11.0	14.0	16.0	18.0	17.4	16.0	12.0	8.0	8.6	5.0	5.1	8.0
Rainfall (mm)	89.8	103.6	88.2	109.6	138.4	157.5	105.6	56.6	94.8	71.7	48.7	57.4
3pm Temp (°C)	No Data Available											
3pm wind (km/h)												
3pm RH (%)												

1.6. Known Radio Comms Blackspots

- Any area west of the M1 has good communications on ridge tops and patchy in valley systems
- River communities of Spencer, Gunderman and Wendoree have very poor coverage
- Catherine Hill Bay along Flowers Dr
- Frazer Beach, Munmorah State Conservation Area

1.7. Hazards

1.7.1. Road Transport

The M1 Pacific Motorway is the main transportation route with a two-to-three lane dual carriageway running north to south through the centre of the District. This motorway is the main thoroughfare between Sydney, Newcastle, Regional NSW and Brisbane - carrying a mix of commuter traffic, road freight transport, hazardous materials, holiday traffic and recreational travellers. Disruption by bushfire and other incidents is a risk with significant impacts. The M1 does not have reticulated water supply and requires a bulk water response to any incident requiring significant water application.

Other key roads within the District include the Pacific Hwy and Central Coast Hwy which are intersected by regional roads and local arterial roads connecting major population centres.

1.7.2. Rail Transport

The Main North Rail Line linking Sydney and Newcastle with Brisbane runs through the District in a north south direction. The intercity passenger network operates on the electrified section of the Main North Line between Sydney and the Newcastle Interchange as well as regional and interstate passenger services and freight and commodities movement.

1.7.3. Air Transport

There are airfields at Warnervale and Lake Macquarie. Major north-south air routes between Sydney and Queensland pass over the District. Due to the presence of the Royal Australian Air Force facility at Williamstown, areas of the Hunter are regularly over flown by military aircraft (both fixed and rotary wing). There is a small airfield for gliders located at Mangrove Mountain.

1.7.4. Marine Access

Marine fires and other incidents, including vessel fires and the protection of remote river communities, are unique risk within the District. There are a number of remote river settlements on the north shore of the Hawkesbury River, where the only access is by water. The NSWRFs provides fire coverage and/or support to a number of coastal and lake marine berths.

1.7.5. Mining

There are extensive coal resources within the Lake Macquarie LGA with underground mining operations located at Mannering Park, Mandalong, Killingworth, Wangi Wangi and Teralba. There are a number of other mine sites under care and maintenance. Mine sites will typically include complex haul road, rail and conveyor networks, underground ventilation infrastructure and other operational hazards.

1.7.6. Energy Infrastructure

There is significant energy infrastructure in the District. Power stations are located at Eraring (Origin) and Vales Point (Delta). High voltage transmission networks, managed by Transgrid, connect these power stations with the rest of the state. The local distribution network is managed by Ausgrid. A major gas pipeline runs along the M1 Pacific Motorway alignment.

1.7.7. Agriculture & Forestry

There are significant areas of farming land, largely on the western side of the M1 Pacific Motorway but also in pockets of land east of the motorway, which host productive grazing and horticultural industries. The leading horticultural sectors in the area are nurseries and cut flowers, turf farms and orchards. The District has a significant poultry industry inclusive of farms and processing facilities. There are high value hardwood forestry assets within the Watagan, Olney and Heaton State Forests.

1.7.8. Water Supply

Water storage for the community is located at Mangrove Creek Dam, Mardi Dam and Mooney Mooney Dam. There is significant water supply infrastructure connecting these storages and connecting the Central Coast to the Hunter Water network.

1.7.9. Explosion Research Facility

Orica's explosion research and testing facilities producing large quantities of Ammonium Nitrate are located on George Booth Drive, Richmond Vale (near Seahampton).

1.7.10. Special Fire Protection Facilities

There are three (3) acute hospitals and several public health facilities and private hospitals throughout the District and a large number of aged care facilities.

There are a large number of educational facilities within the District. Each suburb and village typically has a primary school and a number of childcare centres. Secondary schools are located throughout the District with TAFE colleges, private colleges and a university campus.

1.8. Land Management Authorities

Central Coast

Land Manager	% of Area
National Parks & Wildlife Service	25
Forestry Corporation NSW	17
Department of Lands	3
Local Government	5
Private	47
All other	3

Lake Macquarie

Land Manager	% of Area
National Parks & Wildlife Service	10
Forestry Corporation NSW	5
Department of Lands	5
Local Government	3
Private	60
Lake Macquarie Waterway	17

For more specific data on the Central Coast District, please follow the link to the Central Coast Bush Fire Risk Management Plan [here](#).

Note: This link will only work with internet coverage.

For further information regarding the Central Coast District Information pack, please contact the Operational Improvement team via **email at** operational.improvement@rfs.nsw.gov.au

