

FLOOD

Many parts of Western Australia are prone to flooding at different times of year. Floods can cause significant disruption to road, rail, and communications and damage to community infrastructure.

Torrential rain in the monsoonal wet season in the Kimberley and other northern areas of the State can cause the flooding of vast areas. The wet season also may bring rivers down in flood, threatening life, livestock and property.

FESA is the Hazard Management Agency for flood in Western Australia with responsibilities in relation to preparedness, response and recovery. FESA's Operational Services are responsible for development of the [State Flood Emergency Management Plan](#).

State Emergency Service (SES) units and Volunteer Emergency Service (VES) units undertake the primary response roles.

PREPAREDNESS

PREPARING FOR THE WET SEASON

The aim of the [Wet Season](#) Campaign is to decrease the risk to human life and property as a result of hazards associated with the Wet Season during November to April; including flood, cyclone, storm surge and severe storms.

An important component of this program is to engage our SES staff and volunteers as well as selected target groups in the broader community. We aim to identify the individual needs of local communities and the volunteers who assist them through the wet season in terms of prevention, preparation, response and recovery. Our ultimate goal is to build capacity within the communities in the North West so should they be threatened by any of the hazards associated with the wet season they will have greater resilience.

Awareness activities commenced with a tour of coastal areas in the Mid West Gascoyne, Pilbara and Kimberley regions in October 2006. Bureau of Meteorology and FESA staff addressed local and district emergency management committees, community members and media outlets in these areas.

FLOOD PLAIN MAPPING FOR PERTH RIVERS

As part of a joint initiative with the Department of Water, a project was established to upgrade the Swan Avon Catchment Flood Warning System. This involves the replacement of existing rain and river gauges with elevated real time monitors based on radio telemetry using radio repeaters. The project will greatly enhance the availability of real time data as the reliability of the radio telemetry system is significantly improved compared to the landline system which is susceptible to breakdowns during extreme weather.

Project funding of \$140,000 was allocated in 2006-07 through the [Natural Disaster Mitigation program](#). It is anticipated that the project will take six years to complete and it is dependent on ongoing funding.

The Metropolitan Flood Management Plan and Local Flood Arrangements are currently being reviewed to ensure that data is used effectively. As part of this review, community consultation has occurred between FESA and key local government stakeholders to discuss a common approach to community awareness/safety campaigns through safety publications and key messages. Other improvements to date include improved digital mapping by the Department of Water showing 10, 25, 50 and 100 year Average Recurrence Interval floodplain mapping of the Swan and Avon Rivers.

RESPONSE

The Bureau of Meteorology reported one major flood event in 2006-07. In January 2007, the Great Southern region, particularly Esperance and Ravensthorpe, experienced the full impact of the storm fronts associated with the tropical low originally named Isobel. Storms and flood threats also occurred throughout the metropolitan area, Midlands, South West and Goldfields regions when this system interacted with another remarkably deep mid-latitude trough.

Tropical cyclones George and Jacob also caused flooding in the Pilbara.

In 2006-07 SES volunteers committed more than 1,120 hours to responding to flood incidents.

NOTABLE INCIDENTS

ESPERANCE FLOODS – 3 - 8 JANUARY 2007

Remnants of seasonal, tropical low Isobel merged with a strong low pressure trough in the Goldfields to creating significant storm activity. Winds gusted at speeds of 110 kilometres per hour as 155mm of rain fell on the town of Esperance in 24 hours.

Major damage was sustained to Bandy Creek boat harbour, the Esperance town and rural properties.

FLASH FLOOD MULLEWA – 3 JANUARY 2007

Unprecedented heavy rains fell on Mullewa by night causing rapidly rising streams, creeks and rivulets. On urgent call by the Western Australia Police and local government, three SES Units were activated to protect nine homes from impending flood inundation. Despite travelling 120 kilometres to arrive at the scene, the SES units diverted the floodwaters with sandbag and plastic levees and by placing pumps in readiness to combat overflows. The local government estimates that \$450,000 value of property was saved thanks to the rapid response and expedient SES actions on site.

ARRINO-MINGENEW FLOOD – 24 FEBRUARY 2007

Heavy rainfall in the Midwest area of the State resulted in extensive flooding. The rainfall began to the east of Binnu and intensified as it traveled in a south easterly direction. The heaviest rainfall occurred between Mingenev and Three Springs. SES volunteers provided assistance in preparation and recovery activities.

RECOVERY

ESPERANCE

As a result of widespread flooding, the State Government declared a natural disaster for the Esperance area on 8 January 2007.

In partnership with the Department for Community Development and the Department of Agriculture and Food, FESA managed the provision of [WANDRA](#) assistance to individuals and families, primary producers and local governments affected by the floods. \$2.4 million was provided to assist with clean up costs and restoration of public assets.

ARRINO-MINGENEW FLOOD

This flood event was declared a natural disaster event under [WANDRA](#). \$418,000 was provided to assist recovery operations following this flood event. The funding was used to restore essential public assets.