

Earthquake

Appendix 1: Useful information and resources

An earthquake is the shaking and vibration at the surface of the earth caused by underground movement along a fault plate, or by volcanic activity.

There is no accepted method to predict earthquakes; however, some regions are more prone to earthquakes than others due to their location in proximity to earthquake faults. While Australia does not lie in close proximity to a tectonic plate where large earthquakes can occur, communities can still experience damaging and deadly earthquakes.

The effects of an earthquake depend on many factors, such as the distance from the epicentre (the point of the earth's surface directly above where the earthquake originated within the earth) and the local ground conditions. Generally, for locations near the epicentre, the following effects may be observed.

Magnitude	Description of effects
Less than 3.4	Usually felt by only a few people near the epicentre
3.5 – 4.2	Felt by people who are indoors and some outdoors; vibrations similar to a passing truck
4.3 – 4.8	Felt by many people; windows rattle, dishes shake, standing cars rock
4.9 – 5.4	Felt by everyone; dishes break and doors swing, unstable objects overturn
5.5 – 6.1	Some damage to buildings; plaster cracks, bricks fall, chimneys become damaged
6.2 – 6.9	Much building damage; houses move on their foundations, chimneys fall, furniture moves
7.0 – 7.3	Serious damage to buildings; bridges twist, walls fracture, many buildings collapse
7.4 – 7.9	Causes significant damage; most buildings collapse
8.0 and over	Causes extensive damage; waves seen on the ground's surface, objects thrown in the air

Source: Victorian State Emergency Service

When an earthquake occurs, Geoscience Australia and the Victorian State Emergency Service will work together to notify the community.

For useful information on being ready for an earthquake refer to:

Bureau of Meteorology

<www.bom.gov.au>

Geoscience

<www.ga.gov.au/earthquakes>

State Emergency Service – QuakeSafe

<www.ses.vic.gov.au/prepare/quakesafe>

Victoria Online

<www.vic.gov.au/emergencies-safety>