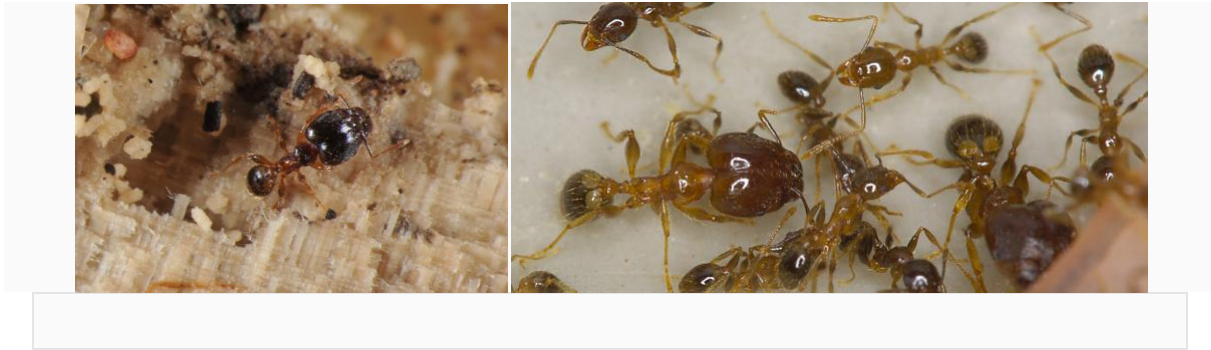




## Coastal Brown Ant



Pest Stats		<a href="#">inShare</a>	
<b>Colour:</b>	Golden brown to brown	<b>Legs:</b>	6
<b>Shape:</b>		<b>Size:</b>	1.5 – 2.5 mm
<b>Antennae:</b>	2	<b>Region:</b>	

### Brief:

Coastal brown ants, *Pheidole megacephala*, also known as big-headed ants is a very successful invasive species and is considered a danger to native ants in Australia and other places. It has been nominated as one of the hundred 'World's Worst' invaders.

There are two types of worker ant, the major or soldier ant and the minor worker. The common name of bigheaded ant derives from the soldier's disproportionately large head. This has large mandibles, which is commonly used to crush seeds or other small items. The soldiers are about four millimetres in length, twice as long as the minor workers. The colour of both types varies from yellowish-brown or reddish-brown to nearly black. The rear half of the head is smooth and glossy and the front half sculptured. The twelve-segmented antennae are curved and have club-like tips. The waist or petiole is two-segmented with the node immediately behind conspicuously swollen. There is a pair of short, upward-facing spines on the waist. The body has sparse, long hairs.

### Habits

Fats and oils primarily and proteins as secondary

Bigheaded ants nest in colonies underground. Colonies can have several queens and super-colonies can be formed by budding; when a queen and workers leave the original nest and set up a new colony nearby without swarming. In America, for example, nuptial flights of winged ants take place during the winter and spring and afterwards, fertilized queens shed their wings and find a suitable site to create a new colony where they start laying eggs. Each queen lays up to 290 eggs per month. The eggs hatch after two to four weeks and the legless white larvae, which are fed by the workers, pupate about a month later. The adult workers emerge ten to 20 days after that.

The bigheaded ants feed on dead insects, small invertebrates and honeydew excreted by insects such as aphids, soft scale insects, mealybugs, whiteflies and planthoppers. These sap-sucking bugs thrive in the presence of bigheaded ants, being more abundant on plants patrolled by ants than on those not so patrolled. Green scale, *Coccus viridis*, numbers peaked when coastal brown ants protected their food source by removing predators such as lady beetle larvae and lepidopteran larvae. The minor workers are much more numerous than the soldiers. Trails of ants lead up trunks, along branches and into the canopies of trees and debris-covered foraging tunnels with numerous entrances are created on the surface of the ground. These may be confused with similar tubes built by subterranean termites. Foraging ants will alert others to new food sources. Honeydew is ingested whilst both major and minor workers who may transfer items of food between themselves carry other foodstuffs back to the nest. Anything too big to be moved may be dissected before being brought back to the nest.

## Habitat

The coastal brown ant can be found nesting in disturbed soils, lawns, flowerbeds, under objects, such as bricks, cement slabs, or flower pots, around trees or water pipes, along the base of structures, and walkways, where displaced soil is usually observed from the action of ants digging below the surface. Well cared for lawns may have coastal brown ant infestations that are less noticeable, except along the edges where lawns meet walkways where piles of soil are often deposited. Coastal brown ant populations expand into neighbouring areas by following along these lawn-walkway edges or roadways. Population movements into new areas to establish nests and subsequent displacement of other ant populations can be rapid.

## Threats

The coastal brown ant does not sting or cause any structural damage, and usually does not bite unless the nest is disturbed, and even then, the bite is not painful. This ant is sometimes confused with subterranean termites because it may create debris-covered foraging tubes that are somewhat similar, albeit much more fragile, than termite tubes. More often these ants leave piles of loose sandy soil. Homeowners are often annoyed by these 'dirt piles' and by ants foraging in bathrooms, kitchens, around doors, and windows, as well as on exterior paved or brick walkways or driveways. Their attraction to food also causes annoyance within populated areas.

## Prevention

The most effective treatment is to use oil-based baits containing the active ingredient hydramethylnon. The ants collect the small particles and take them back to their numerous nests where complete control of the colony can be achieved.

These baits must be broadcast over the infested areas. The baits should never be heaped around ant mounds as this not only increases the risk to non-target organisms but also is far less effective in the control of coastal brown ants. The entire area should be treated as infestations exist in lawns and garden beds and can quickly re-invade treated areas if only a small area of obvious infestation has been treated. If the entire property is treated it may take two to three months or longer before it is re-colonised from untreated neighbouring areas.

Exopest can offer another option is to use a registered ant spray and apply heavily to the soil area prior to laying the turf at the prescribed rate. A follow up maybe required after turf has been laid with another application to grass surface, and then a 6 monthly application to ensure nests from neighbouring properties do not invade. Contact our office for estimate of cost.

*Some photos and information are provided by Bayer*