

# **Prevention and Control Program for Electric Ants under the *Biosecurity Act 2014***

**National Electric Ant Eradication Program**

**2020**

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# 1 Biosecurity Program

## 1.1 Program name

The prevention and control program (biosecurity program) for electric ants will be known as the Prevention and Control Program for Electric Ants 2020 (the **Program**).

# 2 Requirement for a prevention and control program

## 2.1 Purpose and rationale

### Significant biosecurity risk

The *Biosecurity Act 2014* (the **Act**) provides for the establishment of prevention and control programs. Prevention and control programs are directed at any of the following—

- (a) preventing the entry, establishment or spread of biosecurity matter in an area that poses a significant biosecurity risk;
- (b) managing, reducing or eradicating any biosecurity matter in an area that could pose a significant biosecurity risk.

Electric ant was first detected in Smithfield, a northern suburb of Cairns in Far North Queensland, on 11 May 2006 in close proximity to World Heritage listed rainforest, and was the first record of an established incursion of this species in Australia.

Electric ant occur throughout most of the warmer parts of the world, however its continuous distribution ranging from central Argentina and Uruguay, through eastern Mexico to the southern parts of Texas suggests that, along with parts of the West Indies, this may be its native range (Wetterer 2013).

Electric ant is considered by the IUCN/SSC Invasive Species Specialist Group to be one of the world's worst invasive species (Global Invasive Species Database 2009).

Overseas experience has shown that the impact of electric ant on the environment can be devastating. Electric ant can cause a decline in diversity and abundance of invertebrates, vertebrates, and some plants due to predation by electric ant, and their impact on ecosystem function in affected areas can be severe.

Eradication activities delivered by the National Electric Ant Eradication Program have so far prevented the full impact of electric ant being realised on the environment of Far North Queensland, including in areas of World Heritage listed rainforest. As a signatory to the World Heritage Convention, under article 5 of the convention, Australia has an obligation to ensure the protection, conservation, presentation, rehabilitation, and transmission to future generations of the natural heritage of the area (UNESCO 1972).

The Wet Tropics is recognised as an area of 'outstanding universal values'. It contains Australia's greatest diversity of animals and plants, and a large number of endangered species including seven amphibians, three reptiles, seven mammals, six birds. It also contains 33 vertebrate species and one invertebrate species that are declared as vulnerable (WTMA 2012a). For example, the southern cassowary (*Casuarius casuarius johnsonii*) is an iconic Australian bird and a nationally listed endangered species that is already under considerable threat of extinction. It is possible that its ground nesting habits could make its young susceptible to electric ant infestation, placing the species under further stress. There are three specific areas in the Wet Tropics where cassowaries are known to frequent: the Daintree area, Mission Beach, and the Kuranda and Atherton Tablelands area. The infestation at Smithfield has already intruded on the Kuranda and Atherton Tableland Wet Tropics area, and is less than 100 km from the Daintree National Park. Infestation in Bingil Bay, if left unchecked, also has the potential to impinge on the Wet Tropics area at Mission Beach.

The cost of not eradicating an electric ant infestation was valued by Queensland's Department of Primary Industries and Fisheries (Antony 2006), now DAF, in the early stages of the National Electric

Ant Eradication Program. It is estimated that after 30 years of infestation, 350 000 houses will be infested and the annual cost to residents of treating their properties would amount to almost \$14 million. This figure assumes that there would be some residents that would not treat their properties. In this case, these residents would be likely to avoid outside areas, and would most probably see the infestation move into their house.

The National Electric Ant Eradication Program has been subject to reviews in 2008, 2010, 2014, and 2016 and has been assessed against the criteria contained in the National Environmental Biosecurity Response Agreement (NEBRA). Each review determined that eradication of electric ant is technically feasible, cost beneficial, and of national significance.

The National Electric Ant Eradication Program, run by the Queensland Government on behalf of national cost-share partners (including the Commonwealth, and Australian States and Territories), has been established with the ultimate aim of eradicating electric ants within Queensland and therefore preventing the spread and establishment of electric ants in other states and territories.

The National Electric Ant Eradication Program operates under a nationally agreed response plan which has been developed using the criteria set out in the National Environmental Biosecurity Response Agreement<sup>1</sup> (the NEBRA). The response plan was developed prior to the introduction of NEBRA and is referred to as NEBRA-like. The response plan establishes a framework to delimit, contain and eradicate of electric ants in Queensland.

Key eradication measures authorised by the Program include but are not limited to:

- Treatment to eradicate existing infestation and proactive/preventative treatment to prevent the establishment of the pest in high risk areas. Bait is predominantly distributed by foot and in some instances, aurally.
- Surveillance to check for the presence or absence of electric ants and to monitor the effectiveness of the treatment regime—either by luring or trapping undertaken by field teams or odour detection dogs.

Eradication activities are focused on areas within the electric ant biosecurity zone in areas of known infestation. Under the Program, the National Electric Ant Eradication Program has been able to treat and survey these areas quickly and effectively to prevent the establishment of the pest.

Monitoring compliance with movement controls is also an important aspect of the response to ensure the risk of human-assisted electric ant spread is minimised. This will be dealt with the establishment of a surveillance program in Far North Queensland local government areas including Cairns Regional Council, Mareeba Shire Council, Tablelands Regional Council, Cassowary Coast Regional Council, and the Douglas Shire Council.

The objectives of the Program are to:

- prevent the establishment or spread of electric ants in Queensland that pose a significant biosecurity risk; and
- manage, reduce or eradicate any electric ants in Queensland that could pose a significant biosecurity risk.

On commencement of the *Prevention and Control Program for Electric Ants 2020*, the *Prevention and Control Program for Electric Ants*, authorised on 2 June 2016, is repealed under section 235 of the *Biosecurity Act 2014* and section 24AA of the *Acts Interpretation Act 1954*.

The purpose of the amendment to the *Prevention and Control Program for Electric Ants*, authorised on 2 June 2016, is to authorise aerial control measures under the Program. The addition of aerial control measures will create efficiencies towards achieving the objectives of the Program.

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<sup>1</sup> The National Environmental Biosecurity Response Agreement (NEBRA) is the first deliverable of the Intergovernmental Agreement on Biosecurity, and sets out emergency response arrangements, including cost-sharing arrangements, for responding to biosecurity incidents that primarily impact the environment and/or social amenity and where the response is for the public good.

## 2.2 Measures that are required to achieve the purpose

The key activities undertaken by the Program include but are not limited to entry by authorised officers to carry out activities directed towards achieving the Program's objectives (see 3.4 below).

## 2.3 Powers of authorised officers

### Entry of place

The Act provides that under a prevention and control program officers appointed as authorised officers under the Act are permitted to enter a place to undertake activities to achieve the objectives of the prevention and control program. These activities must be done in a timely and efficient manner to ensure that the measures are as effective as possible. The Program will authorise entry into places to allow these measures to be undertaken.

In accordance with the Act a reasonable attempt will be made to locate an occupier<sup>2</sup> and obtain the occupier's consent to the entry prior to an authorised officer entering a place<sup>3</sup> to undertake activities under the Program. Nevertheless, an authorised officer may enter the place if after a reasonable attempt is made to locate the occupier or the occupier refuses to consent to the entry. If after entering a place an authorised officer finds an occupier present or the occupier refuses to consent to the entry—an authorised officer will make reasonable attempts to produce an identity card for inspection and inform the occupier of the reason for entering and the authorisation under the Act to enter without the permission of the occupier. An authorised officer under the Program must make a reasonable attempt to inform the occupier of any steps taken, or to be taken, and if steps have been taken or are to be taken, that it is an offence to do anything that interferes with a step taken or to be taken.

An authorised officer must leave a notice in a conspicuous position and in a reasonably secure way. This notice must state the date and time of entry and information addressing the reason for entry, authorisation to enter a place and the steps undertaken by the authorised officer after entry.

### Giving a direction under a prevention and control program

Section 237 of the Act provides that an authorised officer may, at a reasonable time and at a place within an area to which a prevention and control program applies:

- Direct an occupier to take reasonable steps, within a stated and reasonable timeframe, to remove or eradicate electric ants. These steps must be limited to what is reasonably necessary to achieve the purposes of this prevention and control program.
- Destroy electric ants or a carrier of electric ants, if the authorised officer believes on reasonable grounds that they pose a significant biosecurity risk.

### Failure to comply with a direction

Under s 238 of the Act, occupiers of a place are obligated to comply with an authorised officer's direction issued under s 237 of the Act, as outlined above.

### Power to carry out aerial controls measures

The power to carry out aerial control measures is authorised by a biosecurity program under the Act.<sup>4</sup> This means that an authorised officer may carry out, or direct another person to carry out, the aerial

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<sup>2</sup> The Act defines an *occupier* of a place, generally to include the person who apparently occupies the place (or, if more than 1 person apparently occupies the place, any of the persons); any person at the place who is apparently acting with the authority of a person who apparently occupies the place; or if no-one apparently occupies the place, any person who is an owner of the place.

<sup>3</sup> See section 270 (Entry of place under ss 261 and 262) of the Act.

<sup>4</sup> See section 294 (Power to carry out aerial control measures under biosecurity program) of the Act. Section 294(6) of the Act defines *aerial control measure*, for biosecurity matter, to mean an activity, done from the air by an airborne machine or a person in an aircraft, to achieve a purpose of a biosecurity program and includes the following—

- surveying and monitoring the biosecurity matter;
- distributing an agricultural chemical to control the biosecurity matter.

control measure for electric ants in relation to a place to which the Program relates. The aerial control measure may be undertaken by manned helicopter or unmanned aerial vehicle (UAV).

## **Obligations**

A person who is an occupier of a place may be obligated to take action as specified in the Authorisation in 3.6 below.

In addition to Program specific obligations in the Authorisation, under section 238 of the Act, occupiers of a place are obligated to comply with an authorised officer's direction issued under section 237 of the Act.

## **General powers of authorised officers**

Nothing in the Program or its associated authorisation limits the powers of authorised officers under Chapter 10 of the Act.

## **2.4 Consultation**

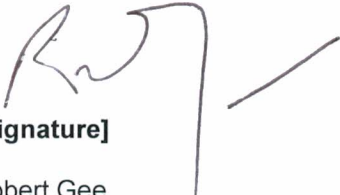
The local governments within the area to which the program relates have been consulted.

### 3 Authorisation of a prevention and control program in the State of Queensland

I, Robert Gee, the Director-General of the Department of Agriculture and Fisheries (the Department) acting pursuant to section 235 of the *Biosecurity Act 2014* (the Act), authorise the *Prevention and Control Program for Electric Ants 2020* (the Program) in Queensland, on the basis that:

- I am satisfied that electric ants are in Queensland and pose a significant biosecurity risk in Queensland<sup>5</sup> (as below);
- I am satisfied that measures are required to prevent the establishment or spread in Queensland of electric ants (biosecurity matter) that pose a significant biosecurity risk in Queensland (as below).

On commencement of the *Prevention and Control Program for Electric Ants 2020*, the *Prevention and Control Program for Electric Ants*, authorised on 2 June 2016, is repealed under section 235 of the *Biosecurity Act 2014* and section 24AA of the *Acts Interpretation Act 1954*.

  
[Signature]  
Robert Gee

Director-General, Department of Agriculture and Fisheries

Dated at Brisbane this 21<sup>st</sup> day of May 2021

#### 3.1 Biosecurity matter

The biosecurity matter to which the prevention and control program relates to is electric ant—*Wasmannia auropunctata* (Roger 1863).

#### 3.2 Purpose and scope of the Program

The purpose of the Program is to:

- prevent the establishment or spread of electric ants in Queensland that pose a significant biosecurity risk; and
- manage, reduce or eradicate any electric ants in Queensland that could pose a significant biosecurity risk.

#### 3.3 Area affected by the Program

The Program will apply in Far North Queensland local government areas including Cairns Regional Council, Mareeba Shire Council, Tablelands Regional Council, Cassowary Coast Regional Council, and the Douglas Shire Council.

#### 3.4 Powers of authorised officers

An authorised officer of the Program appointed under the Act, may enter a place—other than a residence<sup>6</sup>—without a warrant and without the occupier's consent within the State of Queensland

<sup>5</sup> Addresses s 235 (3)(b) of the Act

<sup>6</sup> The Act defines a **residence** to mean a premises or part of premises that is a residence with the meaning of section 259(2) and 259(3).



under the Program<sup>7</sup>. An authorised officer appointed under the Act will also have the power to enter a place under the Program<sup>8</sup>.

An authorised officer can exercise the powers of an authorised officer under the Act in relation to the Program, if the authorised officer is appointed by the chief executive<sup>9</sup>.

An authorised officer has general powers after entering a place to do any of the following:

General powers in the Act	Measures an authorised officer may take under the Program
Search any part of the place	<i>Undertaking preventative treatment and/or treatment<sup>10</sup> on places to destroy electric ants on the land or in electric ant carriers; or requiring an owner to destroy electric ants. Treatment is distributed by field teams on foot with fertiliser spreaders, aerially by helicopter or un-manned aerial vehicles (UAV), backpack blowers, blower trucks, all-terrain vehicles.</i>
Inspect, <sup>11</sup> examine <sup>12</sup> or film <sup>13</sup> any part of the place or anything at the place	
Take for examination a thing, or a sample of or from a thing, at the place	
Place an identifying mark in or on anything at the place	
Place a sign or notice at the place	
Produce an image or writing at the place from an electronic document or, to the extent it is not practicable, take a thing containing an electronic document to another place to produce an image or writing	<i>Destroying an electric ant carrier undertaken by an authorised officer or an owner if the authorised officer believes it poses a significant biosecurity risk.</i>
Take to, into or onto the place and use any person, detection animal, equipment and materials the authorised officer reasonably requires for exercising the authorised officer's powers under this division	<i>Searching a place to check for the presence or absence of electric ants, undertaken by odour detection dogs and/or authorised officers.</i>
Destroy biosecurity matter or a carrier if: <ul style="list-style-type: none"> <li>• The authorised officer believes on reasonable grounds the biosecurity matter or carrier poses a significant biosecurity risk</li> <li>• The owner of the biosecurity matter or carrier consents to its destruction.</li> </ul>	<i>Inspections, examinations and filming may be undertaken to assist with tracing of electric ant carriers to and from a place.</i>
Remain at the place for the time necessary to achieve the purpose of the entry	<i>Taking a sample of ants for analysis to determine whether the ants are electric ants.</i>
The authorised officer may take a necessary step to allow the exercise of a general power	<i>Placing a flag(s) in the ground on a place to identify an electric ant location.</i>
If the authorised officer takes a document from the place to copy it, the authorised officer must copy and return the document to the place as soon as practicable	<i>Taking an image of a location of electric ants and the general vicinity.</i>
If the authorised officer takes from the place an article or device reasonably capable of producing a document from an electronic document to produce the document, the authorised officer must produce the document and return the article or device to the place as soon as practicable.	<i>Taking GPS coordinates to ensure accuracy of location details of electric ants.</i>

<sup>7</sup> See section 259 (General powers to enter places) of the Act.

<sup>8</sup> See Section 261 (Power to enter a place under biosecurity program) of the Act.

<sup>9</sup> See section 255(3) (Powers of particular authorised officers limited) of the Act.

<sup>10</sup> The Program applies treatment for two reasons—destruction of colonies of electric ants (infestation) and as a preventative measure using a broadcast bait. The broadcast bait treatments applied by the Program consist of a crushed corn grit impregnated with soybean oil, and either a metabolic inhibitor, hydramethylnon, or an insect growth regulator, S-methoprene, as authorised for use under Australian Pesticides and Veterinary Medicines Authority (APVMA) permit, or other baits allowed for under APVMA permit.

<sup>11</sup> Section 296(5) defines *inspect*, a ting, to include open the thing and examine its contents.

<sup>12</sup> Section 296(5) defines *examine* to include analyse, test, account, measure, weigh, grade, gauge and identify.

<sup>13</sup> Section 296(5) defines *film* to include photograph, videotape and record an image in another way.

Pursuant to section 237 of the Act an authorised officer may also give a direction to an occupier of a place located in an area to which the Program applies to take reasonable steps to:

- remove or eradicate electric ants as reasonably necessary to achieve the purposes of the Program, or
- destroy electric ants or a carrier of electric ants, if that authorised officer believes on reasonable grounds that they pose a significant biosecurity risk.

A penalty applies for failing to comply with a direction issued under this section.

An authorised officer may carry out, or direct another person to carry out, the aerial control measure for electric ants in relation to a place to which the Program applies. Under the Program these measures may be undertaken by manned helicopter or un-manned aerial vehicle (UAV) to apply preventative bait treatment on un-infested properties and bait treatment on electric ants infested properties.

### **3.5 Obligations imposed on a person under the Program**

A person who is an occupier of a place to which the Program relates may be required to:

- refrain from disturbing or irrigating areas that have been treated by the National Electric Ant Eradication Program so as to maximise efficacy of the bait<sup>14</sup>;
- remove any thing on a place that would obstruct an authorised officer undertaking the activities as required to eradicate electric ants. This may include mowing/slashing an area prior to bait treatment being applied;
- help the authorised officer in the execution of their powers.

A person of whom a **help requirement** has been made must comply with the requirement unless the person has a reasonable excuse<sup>15</sup>.

### **3.6 Commencement and duration of the Program**

The Program will begin on 14 June 2021 and will continue to operate until the nationally agreed response plan for the eradication of electric ant expires or there are no National Electric Ant Eradication Programs operating in Queensland.

The duration of the Program is considered to be reasonably necessary to achieve the Program's purpose.

### **3.7 Consultation with relevant parties**

As required by the Act,<sup>16</sup> I, Robert Gee, the chief executive of the Department of Agriculture and Fisheries have consulted, prior to the authorisation of the Program, with Far North Queensland local government areas including Cairns Regional Council, Mareeba Shire Council, Tablelands Regional Council, Cassowary Coast Regional Council, and the Douglas Shire Council, which are the local governments for the areas to which the Program applies.

### **3.8 Notification of relevant parties of requirements**

As required by the Act<sup>17</sup>, I will give public notice of the Program 14 days before the Program starts by:

- giving the notice, by way of letter, to each government department or government owned corporation responsible for land in the area to which the Program relates;

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<sup>14</sup> The application of granular bait is more efficacious if the ground remains undisturbed for at least seven days after application to enable the ants to store and circulate the bait to the rest of the colony. An area that is being treated should not be irrigated 24 hours before or after the bait treatment being applied as it breaks down the bait, rendering it ineffective.

<sup>15</sup> See section 297 (Power to require reasonable help) of the Act.

<sup>16</sup> See section 239 (Consultation about proposed biosecurity program) of the Act.

<sup>17</sup> See section 240 (Notice of proposed biosecurity program) of the Act.

- publishing the notice on the Department's website; and

From the start of the Program, the Authorisation for the Program [and the Program] will be available for inspection or purchase at the Queensland Department of Agriculture and Fisheries head office at 41 George St, Brisbane and regional offices<sup>18</sup>. A copy of the Program is also available to view and print at no cost on the Department of Agriculture and Fisheries website at [www.daf.qld.gov.au](http://www.daf.qld.gov.au). A copy of the Program Authorisation will be provided on request by contacting the Department of Agriculture and Fisheries Customer Service Centre on 13 25 23.

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<sup>18</sup> See section 241 (Access to authorisation) of the Act.

## Appendix 1 – References

Antony, G 2006, '*Wasmannia auropunctata* (electric ant)—Draft Initial Economic Impact Assessment', report for the Department of Primary Industries and Fisheries, Economic and Statistical Analysis, 30 December 2006.

DAF (2016) Prevention and Control Program for Electric Ants under the *Biosecurity Act 2014*.  
<https://www.daf.qld.gov.au/business-priorities/biosecurity/programs/electric-ants-prevention-control>  
Accessed 28/10/2020

Global Invasive Species Database 2009. *Wasmannia auropunctata* (insect), viewed 13 November 2014, <<http://www.issg.org/database/species/ecology.asp?si=58&fr=1&sts=&lang=EN>>.

UNESCO 1972. 'Convention Concerning the Protection of the World Cultural and Natural Heritage', United Nations Educational, Scientific and Cultural Organisation, Adopted by the General Conference at its seventeenth session, Paris, 16 November 1972.

Wetterer, JK 2013, 'Worldwide spread of the little fire ant *Wasmannia auropunctata* (Hymenoptera: Formicidae)', *Terrestrial Arthropod Reviews*, vol. 6, pp. 173–184.

WTMA 2012a. Wet Tropics Management Authority, Cairns, viewed 13 November 2014, <<http://www.wettropics.gov.au/home>>.