



Survey on Controlling Infestations of Red Imported Fire Ants in Brisbane and South East Queensland

Screening Questions

QS 1: What suburb do you live in ? _____ postcode: _____

QS2 Are you Male 1 Female 2

QS3. What is your age? _____

Screening questions and quotas

I have a list of 221 Brisbane suburbs and postcodes that are in the RIFA restricted areas – for each version of the survey, half the sample will need to be from one of these areas and half from outside the restricted area.

Where possible the rest of the sample characteristics should match those of the general community

The following quotas should apply where possible for each version or at least for the overall sample.

Gender: 50/50 split

age:

age	categories	%
	18-29	24%
	30-45	31%
	46-65	30%
	66-89	16%

Insert Information sheet

(SECTION 1)

Information about Red Imported Fire Ants

The Red Imported Fire Ant is a highly invasive and destructive pest which originates from South America. It was first detected in Brisbane in February 2001, with infestations found around the port facilities at Fisherman Islands and in the south-western suburbs around Richlands.

Red Imported Fire Ants are regarded as the worst of the five ant species that are rated in the top '100' of invasive species in the world. The key risks to urban areas are:

- **Human Health** – the ants produce painful stings, which can induce allergic reactions. People have to avoid outdoors areas where the ants might live.
- **Recreation impacts** – the ants interfere with outdoor recreation activities, and affect the use of:
 - Backyards
 - Parks
 - Golf courses and other sporting facilities
 - School playground and sporting fields
- **Impacts on native bushland and wildlife** – Fire ants are very aggressive and out-compete native species. Heavy infestations are expected to reduce native ant species by up to 90%, as well as impacting on insects, spiders, lizards, frogs, birds and some small mammals.

Red imported fire ants can also have some impacts on **agriculture and infrastructure** (the latter by nesting in electrical equipment). These impacts are being assessed separately, and are not included in this survey.

The Queensland and Australian Governments have devoted significant resources to controlling Red Imported Fire Ants since they were found in Brisbane. While they have been containing outbreaks, they have not yet been able to eradicate the pest in all areas.

More information about fire ants can be found on the Queensland Government website:

http://www.dpi.qld.gov.au/cps/rde/dpi/hs.xsl/4790_4538_ENA_HTML.htm

(link)

Q4. We are interested in what you think about introduced (non-native) pest and weed species that are an issue in Brisbane and south-east Queensland.

Please list up to three main pest species that you think have caused the most impact and indicate your level of concern about them.

Pest and Weed Species	Indicate your level of concern <i>from 1 = not concerned</i> <i>to 5 = very concerned</i>
1.	
2.	
3.	

Q5. In the past few years, have you been aware of outbreaks of Red Imported Fire Ants in Brisbane?

- Yes, very aware ☐
- Yes, somewhat aware ☐
- Not sure – might have ☐
- Not aware at all ☐

Q6. How concerned are you about the impacts of Red Imported Fire Ants on yourself and on the wider community? Please indicate your level of concern from

1 = Not concerned to 5 = Very concerned:

Not concerned

Very concerned

1 2 3 4 5

Q7. Do you think your suburb is in the area where there is a risk of Red Imported Fire Ants occurring?

- Yes ☐
- No ☐
- Not sure ☐

The map below shows the restricted areas for red imported fire ant control in south-east Queensland, as at May 2009.

INSERT MAP HERE

Q8. Do you think the restricted areas on the map?

Match closely with what you expected

☐

Is **more** than I expected

☐

Is **less** than I expected

☐

Q9. Which potential impacts of Red Imported Fire Ants would be of most concern to you and your family? Please give each of the following potential impacts a rating from 1 to 5, where **1 = Not concerned**, and **5 = Very concerned**:

Issue	Rating
Risk of painful stings	
Loss of recreation use of own back yard	
Loss of recreation use of public parks and gardens	
Impact on golf courses and sporting fields	
Impacts on school play grounds and sporting fields	
Impacts on bushland in Brisbane and south-east Queensland	
Damage to buildings and electrical equipment	

Q10. In your opinion how likely is that Red Imported Fire Ants will be eradicated in Brisbane and south-east Queensland in the next five years (**tick one**):

Full eradication is very unlikely (less than 10% probability)	
Full eradication is unlikely (10-33% probability)	
Full eradication is medium likely (34-66% probability)	
Full eradication is likely (67-90% probability)	
Full eradication is very likely (more than 90% probability)	
Don't know	

Q11. The Government has some different options for how it finds and treats infestations of Red Fire Ants. Please indicate for each pair of statements the one that you most agree with.

Choose A or B:

A. We should rely on voluntary inspections and reporting ☐

or

B. There should be a program of mandatory inspections in areas at risk ☐

Choose A or B:

A. Chemical baiting should only be used in areas where Red Imported Fire Ants are found ☐

Or

B. Chemical baiting should be used in all public areas as a preventative measure ☐

Choose A or B:

A. Chemical baiting should be used as the most effective control measure ☐

Or

B. Non-chemical controls should be used, even if they are less effective ☐

In the next few questions, we present you some different options for controlling outbreaks of Red Imported Fire Ants.

In each question we are going to give you three options and ask you to choose one of them. The first option describes the potential impacts in ten years time (2020) if no further control measures are taken.

The other two options describe the potential impacts if further control measures are taken.

These impacts are described in terms of three main factors:

Private areas



Homes
affected by 2020

This indicates the expected spread of the pest.

It identifies the likelihood that people will be affected in their own home.

Public areas

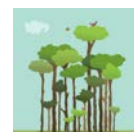


Recreational, sporting and school areas
affected by 2020

This indicates the expected level of impact on important public spaces.

One-third of this area involves school playgrounds and sports fields.

Bushland




Protected areas
affected by 2020

This shows the likely size of protected areas such as national parks and state forest in South East Queensland that will be impacted

Q12. Please indicate which factors you think the government should focus on by ranking them from MOST (1) to LEAST (3) important in terms of control of fire ants.

- ☐ Protection for private areas
- ☐ Protection for public areas
- ☐ Protection for bushland

Each of the three options will also include a **cost factor**.

Private areas	Public areas	Bushland	Cost
Icons as above	Icons as above	Icons as above	
Homes affected by 2020	Recreational, sporting and school areas affected by 2020	Protected areas affected by 2020	How much you pay each year (to 2020)
This indicates the expected spread of the pest.	This indicates the expected level of impact on important public spaces.	This shows the likely amount of protected areas that will be affected	This indicates the potential costs per household of government and private efforts to control the pest. This cost can be expected to be paid by householders in Brisbane until 2020.

There are 10 similar choice tasks in the following pages. The options for helping to control red imported fire ants involve some level of household payment.

When making your choices please consider that:

- Control of Red Imported Fire Ants is not the only government priority that may require more money
- There are other important issues that you may wish to support
- You should consider your income and other expenses
- Costs can include different combinations of private control costs, and rates, fees and taxes paid to government to cover public costs of control
- The scenarios are hypothetical, but are based on current scientific knowledge about what might happen
- Please make your choices as if they were real
- There are no right or wrong answers – we are just interested in your point of view

SECTION 2A







The choice tasks on the following pages will look like this

In each choice task there are 3 options

The first option is the *No Control* option. It remains the same in each task and has no cost.

Options A and B show improvements from some control measures, described in terms of reductions in homes and affected areas, plus a cost.

The impact and cost levels vary in each option

Fire Ants in Brisbane by 2020					
	Private areas	Public areas	Bushland	Cost	Your choice
					
<i>No Control</i>	homes (%)	ha (%)	ha (%)	\$0	<input type="text"/>
<i>Option A</i>	homes (%)	ha (%)	ha (%)	\$	<input type="text"/>
<i>Option B</i>	homes (%)	ha (%)	ha (%)	\$	<input type="text"/>







SECTION 2B

The choice tasks on the following pages will look like this

In each choice task there are 3 options

The first option is the *No Control* option. It remains the same in each task and has no cost.

Options A and B show improvements from an **eradication** control strategy and a **containment** control strategy. Improvements are described in terms of reductions in homes and affected areas, plus a cost. The impact and cost levels vary in each option

Fire Ants in Brisbane by 2020					
	Private areas	Public areas	Bushland	Cost	Your choice
					
<i>No Control</i>	homes (%)	ha (%)	ha (%)	\$0	<input type="text"/>
<i>Option A</i> Eradication strategy <i>Larger control effort</i>	homes (%)	ha (%)	ha (%)	\$	<input type="text"/>
<i>Option B</i> Containment strategy <i>Smaller control effort</i>	homes (%)	ha (%)	ha (%)	\$	<input type="text"/>

SECTION 2C

The choice tasks on the following pages will look like this







In each choice task there are 3 options

The first option is the *No Control* option. It remains the same in each task and has no cost.

Options A and B show improvements from some control measures, described in terms of reductions in homes and affected areas, plus a cost.







In Option A the predictions have a **high** level of **certainty** and in Option B there is a **low** level of **certainty**.

The impact and cost levels vary in each option

Fire Ants in Brisbane by 2020					
	Private areas	Public areas	Bushland	Cost	Your choice
					
<i>No Control</i>	homes (%)	ha (%)	ha (%)	\$0	<input type="text"/>
<i>Option A</i> High Certainty <i>predictions are correct</i>	homes (%)	ha (%)	ha (%)	\$	<input type="text"/>
<i>Option B</i> Low Certainty <i>predictions are correct</i>	homes (%)	ha (%)	ha (%)	\$	<input type="text"/>




Question 13A: Carefully consider each of the following three options. Suppose these options were the only options available, which would you choose? [link each att description to info in table above](#) and [link fire ant to DPI website](#)

SECTION 1 pg 1

Fire Ants in Brisbane by 2020					
 Fire ant	Private areas	Public areas	Bushland	Cost	Your choice
	 Homes affected by 2020	 Recreational, sporting and school areas affected by 2020	 Protected areas affected by 2020	 How much you pay each year to 2020	 Select one option only
No control	500,000 homes (30%)	7,500 ha (30%)	73,000 ha (30%)	\$0	<input type="checkbox"/>
Option A	3,000 homes (2%)	260 ha (2%)	12000 ha (5%)	\$20	<input type="checkbox"/>
Option B	167,000 homes (10%)	670 ha (5%)	12000 ha (5%)	\$50	<input type="checkbox"/>




Choice task 1 out 10

Question 13B: Carefully consider each of the following three options. Suppose these options were the only options available, which would you choose? ? link each att description to info in table above and link fire ant to SECN 1 pg 1

Fire Ants in Brisbane by 2020					
 Fire ant	Private areas	Public areas	Bushland	Cost	Your choice
	Icons as above	Icons as above	Icons as above		
	Homes affected by 2020	Recreational, sporting and school areas affected by 2020	Protected areas affected by 2020	How much you pay each year to 2020	Select one option only
No control	500,000 homes (30%)	7,500 ha (30%)	73,000 ha (30%)	\$0	<input type="checkbox"/>
Option A Eradication strategy Larger control effort	3,000 homes (2%)	260 ha (2%)	12000 ha (5%)	\$20	<input type="checkbox"/>
Option B Containment strategy Smaller control effort	167,000 homes (10%)	670 ha (5%)	12000 ha (5%)	\$50	<input type="checkbox"/>

Choice task 1 out 10

Question 13C: Carefully consider each of the following three options. Suppose these options were the only options available, which would you choose? ? link each att description to info in table above and link fire ant to SECTION 1 pg 1

Fire Ants in Brisbane by 2020					
 Fire ant	Private areas	Public areas	Bushland	Cost	Your choice
	Icons as above	Icons as above	Icons as above		
	Homes affected by 2020	Recreational, sporting and school areas affected by 2020	Protected areas affected by 2020	How much you pay each year to 2020	Select one option only
No Control	500,000 homes (30%)	7,500 ha (30%)	73,000 ha (30%)	\$0	<input type="checkbox"/>
Option A High Certainty 60-90% chance predictions are correct	80,000 homes (5%)	1,250 ha (5%)	24000 ha (10%)	\$200	<input type="checkbox"/>
Option A Low Certainty 20-50% chance predictions are correct	3,000 homes (2%)	500 ha (2%)	36,500 ha (15%)	\$50	<input type="checkbox"/>

Choice task 1 out 10

SECTION 3:

Q14. For the choices you have just made, please state whether you agree or disagree with the following statements:

	Strongly agree	Agree	Neither agree nor disagree	Disagree	Strongly disagree
I am confident that I made the correct choices	1	2	3	4	5
I understood the information in the questionnaire	1	2	3	4	5
I needed more information than was provided	1	2	3	4	5
I found the choice options to be credible	1	2	3	4	5
I found the choice options confusing	1	2	3	4	5
I have good knowledge of the issues in the survey	1	2	3	4	5

Q15. As well as controlling existing pests and weeds, governments also try through quarantine measures to stop new pests and weeds from entering Australia. What do you think is the greater priority?

- Controlling outbreaks once they reach Australia ☐
- Preventing pests and weeds from entering Australia ☐
- Don't know ☐

Q16. Foreign diseases and pests that have entered Queensland in the past 10 years include:

- Equine Influenza (horse flu) – major outbreak in 2008
- Papaya fruitfly – first detected in 1995; eradicated in 1998
- Sugarcane smut – first detected in 2006; outbreak not fully eradicated
- Red imported fire ants – first detected in 2001; outbreak not fully eradicated
- Citrus Canker – first detected 2004; eradicated in 2009
- Black Sigatoka (banana disease) – first detected 2001; now eradicated

Increasing quarantine inspections and surveillance could reduce the rate of new disease and pest imports to about half the current rate. If it cost an additional \$260 per household per year, would you be willing to participate? This would be \$260 **each year** for the next **10 years** to avoid approximately 3 serious foreign pests and diseases entering into Queensland.

Please answer this question bearing in mind how much you are able to pay (after taking into account all your other commitments) (please tick one)

☐ Yes ☐ No ☐ Not sure

Personal Background

We would like to ask you some questions about yourself. These questions will help us to understand how people in different circumstances feel about the topics

Q17. How long have you lived in Brisbane?

Less than 2 years	1
2 years to less than 5years	2
5 -10 years	3
11 - 15 years	4
over 15 years	5

Q18. How long do you think you will continue to live in Brisbane?

- (a) rest of my life _____ 1
(b) another 11 – 20 years _____ 2
(c) another 5 – 10 years _____ 3
(d) another 2 – 4 years _____ 4
(e) less than 2 years _____ 5
(f) uncertain _____ 6

Q19. Please indicate the type of home that you currently live in:

- House ☐
Unit, flat or duplex ☐
Other (please indicate) _____

Q20. Currently is your home:

- Rented ☐
Owned by you ☐

Q21. Do you have a garden or yard that you can use?

- Yes ☐
No ☐

Q22. If yes : how often do you or members of your family use it

- Very often ☐
Often ☐
Sometimes ☐
Rarely ☐
Never ☐

Q23. How many children live in your household?

- (a) None ☐
- (b) Younger than primary school age _____
- (c) Primary school age _____
- (d) Secondary school age _____

Q24. What is the highest level of education you have obtained or are obtaining?

- ☐ Primary only
- ☐ Junior/Year 10
- ☐ Secondary/Year 12
- ☐ Diploma or trade certificate
- ☐ Tertiary degree
- ☐ Other (please specify)
- _____

Q25. To the best of your knowledge please indicate the total **weekly** income (**before taxes**) that you and your spouse (if applicable) currently earn.

- ☐ less than \$499 per week (\$25,999 per year)
- ☐ \$500 – \$799 per week (\$26,000 – \$41,599 per year)
- ☐ \$800 – \$1199 per week (\$41,600 – \$62,399 per year)
- ☐ \$1200 – \$1999 per week (\$62,400 – \$103,999 per year)
- ☐ \$2000 or more per week (\$104,000 per year)

That is the end of the questionnaire.

Thank you for participating in this survey.
We really appreciate your cooperation and effort!

Q. Would you like to receive a copy of the summary of research results when available?
(If yes) – provide email address.