



DISEASE MANAGEMENT

case study

St George spring clean up!

In August 2014, St George cotton growers took part in their first 'Spring Clean' event, turning the difficult business of disease management into a fun, social day; uniting the community behind the common goal of destroying disease harbouring volunteer cotton plants.

Inspired by the success of the Clean Up Australia Day campaign, the 'Spring Clean' was an initiative of St George Cotton Growers' Association President, Scott Armstrong.

The day was organised by Sally Dickinson, CottonInfo Regional Development Officer for the Border Rivers, St George & Dirranbandi regions (pictured).

"The aim was for everyone in the St George cotton growing area to make a conscious effort to clean up off-farm volunteer cotton on roads and drains adjacent to their properties, and to make that extra effort on farm as well," said Sally.

Sally Dickinson and Scott Armstrong called on local growers to spend whatever time they had to spare on the designated day to chip or pull volunteer cotton.

"We also issued an invitation to a free afternoon BBQ for refreshments and a bit of fun, where everyone involved could report back on how much extra area was now 'clean'," said Sally.

Participants were asked to bring in samples of the volunteer plants they'd uprooted, with prizes awarded for the tallest plant, the ugliest plant, and numerous other categories designed to inject some humour into a widespread weeding campaign.

Crews of cotton growers and workers across the region

rallied to the cause in an atmosphere of fun and friendly competition, making the job of chipping and weeding far more entertaining than might otherwise have been the case.

"We wanted to get everyone involved in one combined day of action to get rid of cotton volunteers and to highlight the problems these plants could cause if left untouched," explained Sally.

"Our goal was to remove volunteer plants that provide a host for weeds and pests between cotton seasons, reducing the risk of these weeds, diseases and pests from surviving over the winter and affecting next season's crops.

"It was fantastic to see everyone involved getting in to the job with so much enthusiasm. Although most of the farms were tidy, there were some roads and drains which needed attention, so the Spring Clean was a very effective way of tackling that problem."



What are volunteers and ratoons, and why do we need to control them?

- **Volunteer cotton:** A volunteer cotton plant is cotton that has germinated, emerged and established unintentionally. Volunteers include cotton plants in field or external to the field (along roadsides, fence lines, drains, etc). The control of unwanted cotton in individual farming systems and across the broader landscape, is an essential part of good integrated pest and disease management.
- **Ratoon Cotton:** Also known as stub cotton, a ratoon is a cotton plant that has regrown from left over root stock from a previous season.

Getting rid of volunteers and ratoons helps to create a host free period to prevent the build up and carryover of diseases (such as Verticillium wilt, Fusarium wilt, black root rot, tobacco streak virus and alternaria leaf spot) from one season to the next.

A host free period is particularly important for the control of diseases such as cotton bunchy top that can only survive in living plants.

The collaborative community approach to disease management

Prior to the Spring Clean, the St George cotton community had already done some strategic planning working with other sectors of the community including the Balonne Shire Council, the local trucking industry, QLD Main Roads, and water authority Sunwater, as well as growers, agronomists, researchers and industry technical specialists.

During the strategic planning discussions it was recognised that an integrated community approach was needed to tackle the problem of volunteers and ratoons creating a host for pathogens and posing a serious disease threat to local crops.

“Creating an integrated community approach builds on the efforts already being implementing by various individuals and organisations,” said Sally.

“Shires are already spraying road sides, growers are working on removing volunteers and ratoons, and there is other work going on across the industry. We’ve taken this a step further by facilitating a collaborative approach – it’s an extra effort to tackle the issue of disease management.”

The St George Cotton Growers Assoc is encouraging growers in other cotton regions to jump on the Cotton Clean Up bandwagon and organise similar events on a date that suits their particular growing season.

“It’d be terrific to see the Cotton Clean Up idea spread across all cotton growing areas as a way of tackling the volunteer problem, and highlighting the importance of disease control efforts,” said Scott Armstrong.

“As farming communities we need to take ownership of the volunteer cotton problem. Through the St George Spring Clean Up we’ve been able to foster that ownership, where we as cotton growers embrace this issue whole heartedly, and really work at tackling it.”

The collaborative approach to volunteer control fostered by the Spring Clean, was also a proactive step towards preventing the spread of mealybugs, a cotton pest first detected in the St George region during the 2013-2014 summer.

“Mealybug won’t survive if they don’t have anything to inhabit over winter,” said Scott.



“If you let cotton volunteers go, they’ll fill up with bugs and pests that are going to give you grief during the season, so it’s important to get on top of the situation before the season begins.

“On the day of the Spring Clean Up participants removed cotton volunteers from approximately 300 km of roads and drains in the St George area, which is a fantastic effort.

“Plus there’s all the extra work that went on prompted by the day. Not everyone was able to come along to the official event to report on their activity, but we’re aware of many, many people who’d heard about the Spring Clean, and took the opportunity to do an extra clean up at home and on roads and areas adjacent to their farms,” he said.

For more:

For more information on the St George Spring Clean, contact:

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Or visit the CottonInfo website:

- Disease management page: www.cottoninfo.com.au/disease-management

Top tips for organising a cotton clean up day in your area:

- Make it social and fun. Organise food, drinks and prizes to create a celebratory atmosphere.
- Form a core group to plan and coordinate the event. Seek support and advice from local CottonInfo staff and other industry representatives who can assist.
- Highlight areas that need to be targeted.
- Organise a base to work from. In St George, the local AgNVet agency kindly allowed the Spring Clean team to use their premises as the site of the Clean Up Day barbecue.
- Businesses associated with the cotton industry in your area may be willing to help with sponsorship, catering and promotion.
- Draw up a plan to promote the event. Ask your local newspaper or radio station to help spread the word about the event, and also about why it’s important to clean up cotton volunteers to reduce the risk of disease outbreaks.

