

BMP adoption delivering outcomes at Tully

THE SINGH FAMILY GROW CANE AND BANANAS ON JUST OVER 830 HECTARES SOUTH OF TULLY. THEY HAVE FOUND THE ADOPTION OF SMARTCANE BMP HAS ADDED TO THEIR PROFITABILITY AND SUSTAINABILITY.

Tully grower David Singh was already experienced with record keeping through growing bananas alongside his sugarcane.

So when he started his transition to improved farming practices over the last two decades (well before the Smartcane BMP program was initiated) he found that it was a relatively easy transition toward Smartcane Best Management Practice (BMP) accreditation.

He had seen the economic benefit and importance of improving farm practices that aligned with BMP, so he said the record keeping was just the extra step that he needed to become BMP accredited.

He said that, for him, BMP adoption wasn't just about profitability, but also setting the record straight about the industry's commitment to sustainable farming.

"Whatever type of business you are in, things are changing all the time," David said. "BMP is a way of staying a step ahead of things. Demonstrating our commitment to sustainability may be more important in the future with sugar marketing as well, and also for maintaining the industry's social licence."

The Singh family farm just over 750 hectares of sugarcane in the Kennedy area (830ha total), south of Tully. Changes to the farming system have included shifting from 1.58 metre to 1.8 metre row spacings, GPS guidance, reduced tillage, substantial improvements to drainage, reducing the use of some chemicals (while maintaining weed control) and using a variable rate spray controller.

They use mill mud, follow the SIX EASY STEPS nutrient management guidelines and also vary their lime rate between fallow blocks. Fallow ranges between 10 percent to about 18 percent of their area, depending on the year and conditions.

They are also planning to start their own harvesting in 2019.

The Singh family's transition towards Smartcane BMP has been the subject of an economic analysis by the Queensland Department of Agriculture and Fisheries, as part of an SRA-funded project called *Measuring the profitability and environmental implications when growers transition to Best Management Practice*. The project looked at six very different farming businesses across the Herbert and Far North Queensland, several of

which you may have already read about in previous issues of CaneConnection.

For the Singh family, the analysis found that the cost of the improved practices within the study was \$967/hectare, which included, in particular, gradual laser levelling and earthworks as blocks moved through the crop cycle.

The analysis assumed that yield stayed the same over the production cycle and, even in that scenario, it indicated that the farm's operating return increased by \$107/ha/year, mostly through reduced labour and input costs.

David said, however, that he felt that the returns were even higher than this, because of the improved yield over the crop cycle that came with adopting practices in line with BMP and the modern farming system.

An environmental analysis, completed with the help of an organisation called Lifecycles, shows that the changes have also resulted in:

- 370kg less pesticide active ingredients (52 percent decrease) and 434kg less eutrophying substances (nitrogen and phosphorous)



potentially being lost to waterways annually

- Annual fossil fuel use reduced by 10 percent (or 35 tonnes of oil equivalent over the crop cycle)
- Greenhouse gas emissions reduced by 7 percent annually (equivalent to taking 56 cars off the road each year).

Lower operating costs through BMP adoption included fertiliser and ameliorant, fuel, oil and labour, herbicide and insecticide costs. This was partially offset by higher capital goods costs, laser levelling and drainage maintenance (David undertook earthworks and installed underground pipes and spoon drains).

David added that improved farming practices, along with careful variety selection, was also helping getting more ratoons in the crop cycle, which was adding to overall profitability.

“We’re averaging about five ratoons now, whereas before the average was closer to three and a half. A big part of that has been with the controlled traffic,” he said.

His main varieties are Q208^ϕ and Q200^ϕ, but he said newer varieties that are working well for him included Q253^ϕ and Q252^ϕ (in some conditions). He is also starting out with the new variety SRA7^ϕ to see how it performs.

This year – like most parts of the industry – has seen excellent harvesting conditions, but dry weather for trying to establish next year’s crop. He said the higher CCS in 2018 would go a small way to helping with the pressure being applied via the low sugar price. ■

DAF’s Farm Economic Analysis Tool (FEAT) is a free online tool to help growers consider the economics of their farming business. To access FEAT and explanatory resources, visit www.daf.qld.gov.au/plants/field-crops-and-pastures/sugar/farm-economic-analysis-tool.

The six project case studies can be downloaded from www.publications.qld.gov.au/dataset/sugarcane-economics

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(Over page) Tully grower David Singh. (Above left) David Singh and Tully Sugar Cane Productivity and Development Manager, Greg Shannon, checking one of the variety plots on David’s farm. The plot contributes to the work of the Tully Sugar-led Tully Variety Management Group. (Above right) Talking varieties and BMP adoption on-farm.