

INTERNATIONAL PARTNERSHIPS STRENGTHEN AUSTRALIAN CANE INDUSTRY

SRA PRINCIPAL RESEARCHER, DISEASE MANAGEMENT, DR NICOLE THOMPSON, RECENTLY ATTENDED THE 30TH INTERNATIONAL SOCIETY OF SUGAR CANE TECHNOLOGISTS (ISSCT) CONGRESS IN TUCUMAN, ARGENTINA. THE ISSCT IS AN ASSOCIATION OF SCIENTISTS, TECHNOLOGISTS, MANAGERS, INSTITUTIONS AND COMPANIES CONCERNED WITH THE TECHNICAL ADVANCEMENT OF THE SUGARCANE INDUSTRY AND ITS CO-PRODUCTS.

The ISSCT congress is held every three years and is an opportunity for members from all sectors of the ISSCT to present research, updates, and for cross-sectoral collaborations. The 30th ISSCT congress was from 2 to 5 September 2019 and was attended by 700 delegates from 45 countries.

I attended the congress as well as the pre- and post-congress agricultural tours. This allowed me to connect with international colleagues who I usually only meet over email, including colleagues from plant breeding and entomology, as well as reconnect with pathologists to get up-to-date information about their respective situations overseas. These international partnerships are vital for assisting the Australian industry with key initiatives at SRA such as variety exchange and also biosecurity work to ensure that the Australian industry is vigilant with potential exotic disease risks.

The two-day pre-congress tour visited research facilities and fields around Tucuman, including the Universidad San Pablo Tucuman campus, the Los Balcanes cane fields, the EEAOC (Obispo Colombres Agroindustrial Experimental Station), INTA (National Institute of Agricultural Technology) and the San Genaro farm. The three-day post-congress tour travelled to the Jujuy area in more remote northern Argentina

and visited the Ledesma company farm, research and milling areas, and the CHACRA experimental station.

The highlight of the pre-congress tour was the visit to the EEAOC to meet with sugarcane pathologists, familiarise myself with the common diseases and pests of Argentina, and to talk about their clean-seed and tissue culture distribution systems. I had met Romina Bertani and Claudia Funes from EEAOC at previous workshops, and it was great to visit them at their own research stations and see the work they are doing.

The highlight of the post-congress tour was the Ledesma farm tour and the visit to CHACRA experimental facility. In CHACRA I was able to meet with Dr German Sarino and see the quarantine facilities: including some SRA/Q varieties we have exchanged in previous years.

During the congress I presented a paper on the development of diagnostic tests for sugarcane streak mosaic virus (SCSMV) which was a result of previous ACIAR-funded research. In my role as a member of the ISSCT pathology committee I helped chair sessions, judge the posters, and facilitated discussion as required. I have also been nominated for, and accepted, the role of chair of the ISSCT Pathology Committee and my term runs from 2019-2022.

The highlight papers of the congress for me were: the sequencing of the sugarcane genome (presented by Angelique d'Hont, CIRAD); enhancing the use of endophytes for control of moth borers in South Africa (presented by Stuart Rutherford, SASRI); Ramu stunt virus variation in PNG (presented by Dimitre Mollov, USDA-ARS); the effect of climate on production of sugar and ethanol in South Africa (presented by Abraham Singels, SASRI); and the release of the first commercial GM variety (Brazil). A plenary session highlight was one that compared sugar beet to sugarcane from multiple perspectives including plant breeding (presented by Phil Jackson), farming (presented by Keith Jaggard), and milling (presented by Boris Morgenroth). This was a very interesting comparison and provoked much discussion from all sectors of the industry. Further information about the congress and the ISSCT can be obtained from issct.org.

Nicole was awarded an SRA Travel and Learning Award (STLA) to attend this congress. ■

(Top left) Damage done by Diatraea saccharalis. (Top right) Clean seed demonstration plot at EEAOC. (Bottom left) Dr Nicole Thompson and CSIRO scientists Karen Aitken and Maria de la Paz Vilas at the pre-congress tour. (Far right) Soil structure and marginal soils in Argentina.

