

SASTA Congress 2023 Programme

*This programme is subject to change - please check the congress website (<http://sastacongress.org.za/programme/>) for updates

DAY 1: TUESDAY, 15 AUGUST 2023

07:30 – 18:30	Registration	Registration Foyer
07:30 – 09:00	Arrival Tea / Coffee	Exhibition Hall
09:00 – 10:10	Opening Session Chairperson: Dr Muhammad Kadwa Venue: Dube Agrilab Hall 4C & 5D	
09:00 – 09:20	Welcome	SASTA President: Dr Muhammad Kadwa
09:20 – 10:05	Keynote address	Wandile Sihlobo
10:05 – 10:10	Vote of thanks	Dr Muhammad Kadwa
10:10 – 10:45	Tea / Coffee break, Exhibition Hall	
10:45 – 12:50	Plenary Session Chairperson: Dr Sandy Snyman Venue: Dube AgriLab Hall 4C & 5D	
10:45 – 11:10	A Review of South African Sugarcane Production in the 2022/2023 Season: Production, Climate and Economics	Sithole P , Nicholson RJ and Stranack RA
11:10 – 11:30	Biosecurity: An Overview of the 2021/2022 Season	Basdew IH , McFarlane SA and Stranack RA
11:30 – 11:55	Ninety-Eighth Annual Review of the Milling Season in Southern Africa (2022/2023)	Padayachee N , Davis SB and Bhyrodeyal L
11:55 – 12:00	Leg stretch	
12:00 – 12:20	Demonstration of Chemical Ripening Best Practice and Economic Benefit to South African Small-Scale Sugarcane Growers	van Heerden PDR , Ramusandiwa TR, Chonco B, Shelembe WL, Hlela SN, Gillespie WA, Mkhabela NE, Buthelezi ME and Masondo RT
12:20 – 12:30	A Time-Series and Sensitivity Analysis of the 'c' and 'd' Factors in the Recoverable Value Cane Payment System – 2000/01 to 2022/23	Kadwa M
12:30 – 12:50	An Economic Analysis of CPI Related Notional Price Increases Coupled with Above CPI Inflation Input Cost Increases in the 2022/23 Season: From a Grower's Perspective	Nicholson R
12:50 – 14:00	Lunch Break, Exhibition Hall	
14:00 – 15:35	Agriculture Session 1: Extension and Agronomy Chairperson: Rowan Stranack Venue: Dube AgriLab Hall 4C & 5D	14:00 – 15:35 Factory Session 1: Front End Chairperson: Sean Hulley Venue: Hall 4D

14:00 – 14:20	A Farm Level Economic Impact Analysis of the Carry-Over Cane Crisis for the KwaZulu-Natal Coastal and Midlands Mill Areas: 2021/22 & 2022/23 Seasons	Nicholson R	14:00 – 14:25	A Review of Chemical and Microbial Losses of Sucrose in Diffusers	Davis SB and Nel S
14:20 – 14:45	Sugarcane (<i>Saccharum officinarum</i> L.): Challenges and Opportunities in Production and Improvements: A Review	Mugehu E , Shimelish H and Impofu LTM	14:25 – 14:50	Review of Devices for Monitoring Juice Flow in Diffusers	Loubser RC
14:45 – 14:55	The Economics of Seedcane Production	Theunissen P , De Beer E, Stock K, Visser W, Adendorff M, Wilkinson D, Foxon J, Radzilani T, Nkala J, Govender P, Stranack R, Khomo B and McFarlane S	14:50 – 15:10	Old Conventional Power Drive Technology versus New Decentralized Power Drive Technology	O'Reilly C and De Souza C
14:55 – 15:15	Small-Scale Grower Contractors: The Adoption of a Code of Conduct	Msimango S and Nicholson RJ			
15:15 – 15:35	Success Story of Mbetseni Farmers: Growing Sugarcane Under Rainfed Conditions in a Fully Irrigated Region of Malkerns, Eswatini	Mkhaliphi P and Mabuza J			
15:35	Meet and Greet, Exhibition Hall				

DAY 2: WEDNESDAY, 16 AUGUST 2023

07:30 – 17:00	Registration		Registration Foyer		
07:30 – 08:00	Arrival Tea / Coffee		Exhibition Hall		
08:00 – 08:30	Plenary Presentation Chairperson: Andy Church Venue: Dube AgriLab Hall 4C & 5D Dr Kitty Foxon: Lessons from Investigating Sugarcane Product Diversification Opportunities				
08:35 – 10:00	Agriculture Session 2: Irrigation, Water Management Chairperson: Dirk McElligott Venue: Dube AgriLab Hall 4C & 5D		08:35 – 10:10	Factory Session 2: Back-End Chairperson: Natisha Padayachee Venue: Hall 4D	
08:35 – 08:55	Sugarcane Ratoon Yield Decline Under Three Irrigation Systems: A Case of Ubombo Sugar	Tfwala C and Dlamini M	08:35 – 09:00	Rotary Vacuum Filter Operation in Rainy Conditions at Simunye.	Lung Kit HN , Myeni P and Dlamini H
08:55 – 09:20	The Impact of Electrical Load-Shedding on Irrigated Sugarcane Farms in South Africa – Part 1: A Situational Analysis Exploring Farmers' Experiences and Practices in Response to Load-Shedding	Jumman A and Tweddle PB	09:00 – 09:25	A Review of the Estimation of Sucrose Inversion Loss Across a Raw Sugar Factory Evaporator Station	Rahiman SN , Mbuthuma Y and Walford SN
09:20 – 09:40	The Impact of Electrical Load-Shedding on Irrigated Sugarcane Farms in South Africa – Part 2: Determining the Severity and Extent of Load-Shedding	Tweddle PB , Jumman A and Paraskevopoulos AL	09:25 – 09:50	A review of Corrosion in V2 Systems in Factories that Practice High Levels of V2 Bleed	Munsamy S
09:40 – 10:00	The Impact of Electrical Load-Shedding on Irrigated Sugarcane Farms in South Africa – Part 3: Preliminary Results on Yield Impact Due to Irrigation Down Time	Jumman A, Paraskevopoulos AL and Tweddle PB	09:50 – 10:10	Sugar Screening – From Scalping to Fine Screening	Baraye J and Allan G
10:00 – 10:30	Tea / Coffee break, Exhibition Hall		10:10 – 10:45	Tea / Coffee break, Exhibition Hall	Exhibition Hall
10:30 – 11:55	Agriculture Session 3: Soil Nutrition Chairperson: Dr Rianto van Antwerpen		10:45 – 12:05	Factory Session 3: Posters Chairperson: David Love	

Venue: Dube AgriLab Hall 4C & 5D		Venue: Hall 4D			
10:30 – 10:40	Evaluation of Available and Reserve Pools of Soil Micronutrients in the Zimbabwe Sugar Industry	Siyakisa F, Rambwawasvika H and Mutatu W	10:45 – 10:55	Carbonation vs Phosphatation in Indian Context	Mahana N , Dani RV, Panda S and Narasimalu G
10:40 – 11:05	Management Options for Alleviating Zinc Deficiencies in Sugarcane Farming	Mutatu W and Rambwawasvika H	10:55 – 11:05	Improving Pan Stage Crystallisation Using the On-Line Pan Microscope Crystobserver®	Duc N
11:05 – 11:30	Can the Mehlich 3 Multi-Element Extractant be Used as an Alternative to Ambic and Resin Methods in Routine Soil Fertility Testing? Some Preliminary Results	Titshall LW, Naicker N, Msezane A , Kanamugire A, Ntshangase V and Collings K	11:05 – 11:15	Development of Analytical Methods for the Determination of Colourant Types Present in Sugar Factory Processing Streams	Booyesen KC and Walford SN
11:30 – 11:55	Evaluation of Mehlich-3 Multi-Extractant for the Determination of Exchangeable Bases and Essential Micronutrients in the Zimbabwe Sugar Industry Soils	Siyakisa F, Muchanyereyi N , Rambwawasvika H and Mutatu W	11:15 – 11:25	Development of Potentiometric Methods for the Determination of Reducing Sugars in White and Raw Sugar	Moloi T and Walford SN
			11:25 – 11:35	Automatic Sampling of Juice Streams in Sugarcane-Processing Factories	Barker B , Mbuthuma Y, Loubser RC and Davis S
			11:35 – 11:45	Excel-Based Energy Balance Model for Steam System Analysis	Foxon KM , Ndinisa NV, Mkwanzani T, Mngomezulu NI and Mkhwanazi Z
			11:45 – 11:55	Flow Behaviour Characteristics of C-Massecuite	Moloi T, Barker B and Walford SN
			11:55 – 12:05	Replacement of Sulphur Dioxide Turbulator with an Educator at Malelane Refinery	Ndhlala T.C. and Mdakane A
11:55 – 13:00	Lunch break, Exhibition Hall		12:05 – 13:10	Lunch break, Exhibition Hall	
13:00 – 14:25	Agriculture Session 4: Varieties Chairperson: Moipei Lichakane Venue: Dube AgriLab Hall 4C & 5D		13:10 – 14:00	Factory Session 4: Energy Chairperson: Dr Katherine Foxon Venue: Hall 4D	

13:00 – 13:20	A Snapshot of the Total Industry Sugarcane Variety Data and the 2021/22 Variety Data in the Small-Scale Grower Sector: To Start the Debate on Capturing and Evaluating This Data into The Future	Nicholson R , Dube S, Landman M and Masondo T	13:10 – 13:35	Counterflow Air Heater for Industrial Watertube Boilers	Marais F , van den Berg, Barnard L
13:20 – 13:45	Indices for Estimating the Ratooning Ability of Sugarcane	Dlamini NE and Zhou M	13:35 – 14:00	Replacement of Syrup by Clear Juice to Melt B and C Sugar: Effect on Steam Consumption and Sugar Quality	Panda S , Dani R, Mahana N, Gopalakrishnan N
13:45 – 14:05	Cultivar Genetic Gains from the Coastal Breeding Programmes of South Africa	Zhou M , Joshi SV, Lichakane M and Mishasha T			
14:05 – 14:25	Evaluation of Cross-Compatibility Between Commercial Sugarcane Hybrids and their Wild Relatives	Joshi SV , Lloyd Evans D and Ghai M			
14:30 – 15:10	Agriculture Session 5: Entomology Chairperson: Dr Malcolm Keeping Venue: Dube AgriLab Hall 4C & 5D				
14:30 – 14:40	Screening Transgenic Sugarcane Plants for Resistance to Eldana Larvae	Jacob RM , Ligege R, GM Meyer and SJ Snyman			
14:40 – 14:50	Abundance and Diversity of Ground-Dwelling Arthropods Under Rainfed and Irrigated Sugarcane Conditions in South Africa	Smith R , Malinga L and Boucher G			
14:50 – 15:10	Modelling Yellow Sugarcane Aphid Using In Situ Infrared Spectroscopy: A Preliminary Study	Poona NK , Gokul A and Kistan CJ			
14:00 – 17:00	Exhibition Open Afternoon, Exhibition Hall Cash bar branded by Rotex				

DAY 3: THURSDAY, 17 AUGUST 2023

07:30 – 13:00	Registration		Registration Foyer		
07:30 – 08:00	Arrival Tea / Coffee		Exhibition Hall		
08:00 – 09:00	Plenary Presentation Chairperson: Dr Sumita Ramgareeb Venue: Dube Agrilab Hall 4C & 5D 2023 ISSCT feedback session by the SASTA President and Jubilee Agriculture and Factory Winners				
09:05 – 10:10	Agriculture Session 6: Soil Nutrition Chairperson: Dr Thandile Mdlambuzi Venue: Dube AgriLab Hall 4C & 5D		09:05 – 10:40	Factory Session 5: Lab/Management Chairperson: Dennis Walthew Venue: Hall 4D	
09:05 – 09:30	An Overview of the Soil Fertility Status of the South African Sugarcane Industry from 2017 to 2022	Titshall LW, Naicker N and Mdlambuzi T	09:05 – 09:30	Estimated Recoverable Crystal Measurement in the Zimbabwe Sugar Industry	Mutatu W
09:30 – 09:50	Long-term Trials Supporting N Management Guidelines for Sugarcane Grown in the Australian Moist Tropics	Schroeder B and Wood A	09:30 – 09:55	An Assessment of the Impact of 5S on the Safety Climate in an Agro-Processing Unit: The Case of a Sugarcane Processing Unit	Debwe M
09:50 – 10:10	Modelling Leaf Nitrogen Using In Situ Infrared Spectroscopy: A Preliminary Study	Poona NK , Radebe T and Titshall LW	09:55 – 10:15	How Do We Keep Our Microbes Aka 'Bugs' Happy and Healthy? An Overview: Trending Chemical Parameters with Biomass Population	Kungwa Z and Daya V
			10:15 – 10:40	Installation of a Steam-Heated Pilot Pan at the Sugar Milling Research Institute	Rahiman SN , Mbuthuma Y, Love DJ and Davis SB
10:10 – 10:45	Tea / Coffee break, Exhibition Hall		10:40 – 11:00	Tea / Coffee break, Exhibition Hall	
10:45 – 12:10	Agriculture Session 7: Soil Health Chairperson: Dr Ruth Rhodes Venue: Dube AgriLab Hall 4C & 5D		11:00 – 12:25	Factory Session 6: Commercial Chairperson: Gavin Smith Venue: Hall 4D	
10:45 – 11:10	The Potential of Vermicomposted Sugarcane Filter Cake and Other Sugarcane Residues as an Alternative Fertiliser for	Mthimkhulu SS	11:00 – 11:25	The New Dimple Tube: A Technology to Improve Vacuum Pan Performance	Bezuidenhout D , Gokool M, Rosettenstein S and Stevens M

	Sugarcane Production – A Review				
11:10 – 11:30	A Comparison of Pre-Harvest Dry Matter Allocation and Selected Nutrient Content of Various Plant Components Between ZN10 and N14 Sugarcane Varieties Over the First Five Ratoons in Zimbabwe	Mutatu W , Nzvenga P, Nzima M, Dzinotywei K and Chinorumba S	11:25 – 11:45	Flexible and Fast Steam Turbine for the South African Sugar Industry	Conrad M and Lopes R
11:30 – 11:50	Quantifying the Contribution of Residue Retention and Fertiliser Use to the Financial Viability of a Rainfed Sugarcane Crop	Van Antwerpen R and Tweddle PB	11:45 – 12:05	Common Grate Defects and Maintenance Recommendations	Du Preez J-P
11:50 – 12:10	A Comparison of Soil Compaction in Chopper-Harvested Fields and Manually-Cut Fields at Ubombo Sugar	Tfwala C , Ndlangamandla S, Ngomane D, Magagula M, Dlamini M and Kunene N	12:05 – 12:25	Operation of Falling-Film Evaporators in Cane Sugar Factories: Current State of Knowledge	Lehnberger A and Thaval O
12:15	Lunch break, Exhibition Hall				
Congress Closing by Dr Sumita Ramgareeb, Chair: SASTA Congress Organising Committee					