

SMRI NON-ROUTINE and ANALYTICAL SERVICES

PRICE LIST 2026/27



SUGAR MILLING RESEARCH INSTITUTE NPC

Contact

Telephone : +27 31 273 1300

email : queries@smri.org

Contents

Non-routine and analytical service offered by SMRI	3
Important notes on charges, turnaround times and results.....	3
Charges	3
Turnaround times	4
Reports and results	4
Analytical service Quality Assurance and Confidentiality	5
Charges.....	6
Non-routine services.....	6
Analytical.....	6
Process Engineering	6
Factory Figures	6
Training	6
Routine analytical service.....	7
Refined Sugar	8
Intermediate Products	9
General Analysis.....	11
Microbiological analysis	12
Water analysis.....	13
Instrumentation.....	14
SMRI contacts	15

Find us :



www.smri.org



queries@smri.org



031 273 1300

Non-routine and analytical service offered by SMRI

The Sugar Milling Research Institute NPC (SMRI) is the central scientific organisation involved in research work and technical services for the southern African sugarcane processing industry. The institute provides a package of technical services including research and development, analytical and information services and training to its members, depending on their category of membership.

Important notes on charges, turnaround times and results

Charges

The charges for services offered are dependent on the membership status of the requesting company as outlined below:

Membership type	Description	Charge rate
A, B1	SASMA and South African sugarcane processing entities owned by members of SASMA	50% discount of full rate
B2	Non-South African sugar processing entities affiliated to SASMA members	25% discount of full rate
B3	Downstream manufacturers affiliated to members of SASMA	25% discount of full rate
B4	South African Sugar Association	25% discount of full rate
B6	Third parties connected or affiliated with the sugarcane processing and downstream manufacturers	Full rate

NB: All rates quoted herein are net of all taxes. If any foreign withholding or other taxes are applicable the rates need to be inflated by the applicable withholding/other tax rate.

No work for a B6 member will be started until payment for the service requested is received in full.

Find us :



www.smri.org



queries@smri.org



031 273 1300

When work is undertaken at sugar factories additional Subsistence and Travel (S&T) expenses will also be charged to the relevant mills. The Institute's transport rate for 2026/27 is R 4,95 per km (excluding VAT).

Turnaround times

Turnaround times for non-routine services are agreed in writing before commencement of the work. Analysis turnaround times that SMRI strives to adhere to are outlined below:

Testing	Turn around time
Routine chemical analyses	Sample received by Tuesday midday will have results reported on Friday afternoon of the same week.
	Sample received after Tuesday midday will be reported the following week by Friday.
Routine Microbiological analyses	Same applies as for routine chemical analyses.
Non-Routine chemical analyses	Results will be reported within 10 working days.
Floc, 10 Day low Brix	Sample received on Tuesday morning will be reported in 10 days i.e. the following Friday.
	Sample received after Tuesday morning will be reported 10 days later.
*XRD, XRF and SEM	Dependent on the availability of the SEM and X-Ray equipment, results will be reported within one month from receipt of sample.
*Pesticides	Results reported within 1 month from receipt of sample.
*Heavy metals	Results will be reported within 10 working days.

*Sub contracted analyses

Reports and results

Reports and results are supplied in PDF format by email. Analytical results are supplied to the client in the form of an Analytical Report or Certificate of Analysis (COA). Please note the following:

- The SMRI can include additional information on a COA or Analytical Report about the sample supplied for testing before the COA or Analytical Report has been issued e.g. inclusion of Batch or Lot number, etc. The SMRI will **NOT** consider alteration or the addition of information to the COA or analysis certificate once it has been issued. Inclusion of altered or additional information on these reports will require the provision of a new sample for testing.

Find us :



www.smri.org



queries@smri.org



031 273 1300

Additionally, SMRI will **NOT** hold back issuing of a report once all analyses have been completed whilst awaiting further information to be included on the report; and

- All reports, results and certificates can only be reproduced in full by the client and with the written approval of the CEO of SMRI.

Analytical service Quality Assurance and Confidentiality

The SMRI Analytical laboratory and many of the methods are accredited by SANAS to the ISO/IEC 17025:2017 standard. Strict quality control procedures are applied to all chemical, physical and microbiological analyses. This involves frequent use of replicates to monitor precision, and standard reference materials and blanks to ensure accuracy. The laboratory is routinely involved in international inter-laboratory proficiency schemes and trials.

Confidentiality is an integral part of our quality assurance certification. Analytical results are kept confidential and will not be released to third parties without the written approval of the client.

Find us :



www.smri.org



queries@smri.org



031 273 1300

Charges

Non-routine services

Some of the non-routine services available on request are outlined below but it is emphasised that the list of potential services is not complete, and that general consulting and short-term investigations can be undertaken on a variety of subjects for individual factories.

	Service	Charge
1	General consulting	Daily consulting fee
2	Analytical	
	On site and remote laboratory audits including investigations and comparisons of the three laboratory shifts	Available on request
	Analytical method development and instrument evaluation	Available on request
3	Process Engineering	
	Factory Audits – Desktop or on site	Available on request
	Complete energy audit of a factory	Available on request
	Sucrose loss determinations	Available on request
	Specialised mass and colour balance calculations	Available on request
	Tracer tests across all unit operations	Available on request
	Use of SMRI pilot pan for specific tests	Available on request
	Feasibility studies e.g. chemical cleaning and capacity increases	Available on request
4	Factory Figures	
	Data handling (historical trends, data manipulations and statistical work)	Available on request
5	Training (<i>Charges shown excluding VAT and at Full rate – Membership discount will apply</i>)	
	SMRI Advanced Programme in Sugarcane Processing - On-line certificate course that replaces the Ten-Week On-site Course (commences on 1 April)	R203 710.56 per delegate
	From Stick to Crystal, a brief introduction to sugar technology - On-line certificate course that replaces the One-Week On-site Course (commences on 1 April and 1 October)	R20 145.00 per delegate
	Two-Day Elementary Course in Sugar Technology	By special arrangement R96 627.59 per course + S&T for one trainer)
	On-site Laboratory Analyst Refresher Training	R156 033.51 (one week) + S&T for two trainers
	Factory Chemist Course	R48 925.36 per delegate
	Pan Boiling Course - On-site	R24 277.01 per delegate
	Mastering Factory Performance Parameters and Cane Crush Planning Course - On-line	R21 910.46 per delegate
	Customised Remote and On-site Courses	Available on request



Routine analytical service

Where a considerable number of samples is involved, lower prices can be negotiated.

NOTE: All prices exclude VAT

1	Raw and Brown Sugar Analysis	Charge by membership category (R)		
		B6	B2, B3, B4	B1
	Affination, ICUMSA cane sugar method	1674.00	1255.50	837.00
	Affination, SASTA method	751.68	563.76	375.84
	Ash, conductivity	390.96	293.22	195.48
	Bagacillo	1254.96	941.22	627.48
	Colour, ICUMSA at 420 nm or 560 nm	980.64	735.48	490.32
	Colour, MOPS method	980.64	735.48	490.32
	Density	632.88	474.66	316.44
	Dextran, haze method	1674.00	1255.50	837.00
	Fructose and glucose by HPAEC	3518.64	2638.98	1759.32
	Crystal size distribution	1352.16	1014.12	676.08
	Gums	2540.16	1905.12	1270.08
	Moisture, by oven drying (105°C for 3 h)	390.96	293.22	195.48
	pH	390.96	293.22	195.48
	Pol	980.64	735.48	490.32
	Reducing sugars, Luff-Schoorl method	926.64	694.98	463.32
	Sieve analysis	1965.60	1474.20	982.80
	Starch	1427.76	1070.82	713.88
	Starch, simplified method	848.88	636.66	424.44
	Sulfur dioxide, Rosaniline method	848.88	636.66	424.44
	Suspended solids (SMRI method)	1503.36	1127.52	751.68

Find us :



www.smri.org



queries@smri.org



031 273 1300

2	Refined Sugar	Charge by membership category (R)		
		B6	B2, B3, B4	B1
	Appearance	574.56	430.92	287.28
	Ash, conductivity	390.96	293.22	195.48
	Colour, ICUMSA at 420 nm	980.64	735.48	490.32
	Colour, MOPS method	980.64	735.48	490.32
	Caking test, test tube	980.64	735.48	490.32
	Density	632.88	474.66	316.44
	Dextran	1674.00	1255.50	837.00
	Filterability	1352.16	1014.12	676.08
	Floc, Low Brix test (10 days)	1257.12	942.84	628.56
	Fructose and glucose by HPAEC	3518.64	2638.98	1759.32
	Insoluble solids (ICUMSA method)	1738.80	1304.10	869.40
	Insoluble solids (SMRI method)	1615.68	1211.76	807.84
	Moisture, Karl Fischer	3220.56	2415.42	1610.28
	Moisture, by oven drying (105°C for 3 h)	390.96	293.22	195.48
	Odour	848.88	636.66	424.44
	Odour, on acidification	848.88	636.66	424.44
	pH	390.96	293.22	195.48
	Pol	980.64	735.48	490.32
	Reducing sugars, Knight and Allen method	848.88	636.66	424.44
	Sieve analysis	848.88	636.66	424.44
	Starch	1427.76	1070.82	713.88
	Sulfur dioxide, Rosaniline method	848.88	636.66	424.44
	Taste	848.88	636.66	424.44
	Turbidity (@ 420 nm and 720 nm)	848.88	636.66	424.44
	Visual	574.56	430.92	287.28



3	Intermediate Products	Charge by membership category (R)		
		B6	B2, B3, B4	B1
<i>Juice, syrup, massecuite, molasses etc.</i>				
	Acetic acid	3518.64	2638.98	1759.32
	Ash, conductivity	632.88	474.66	316.44
	Ash, sulfated - molasses	848.88	636.66	424.44
	Boiling down of molasses (including analyses)	25828.00	19371.00	12914.00
	Brix, hydrometer	1254.96	941.22	627.48
	Brix, refractometer	848.88	636.66	424.44
	Colour, ICUMSA at 420 nm	980.64	735.48	490.32
	Crystal size distribution	1352.16	1014.12	676.08
	Density	2799.36	2099.52	1399.68
	Dextran, Haze method (including Brix)	2525.04	1893.78	1262.52
	Dry solids, Karl Fischer method	3220.56	2415.42	1610.28
	Dry solids, by vacuum oven drying	1395.36	1046.52	697.68
	Ethanol, by HPLC	3518.64	2638.98	1759.32
	Enzyme activity	1637.28	1227.96	818.64
	Fermentability	5667.84	4250.88	2833.92
	Fructose, glucose and sucrose, by GC	4877.28	3657.96	2438.64
	Fructose, glucose & other lactose, by HPAEC	4270.32	3202.74	2135.16
	Other maltose, by HPAEC	3518.64	2638.98	1759.32
	Fructose, glucose and sucrose, by HPAEC	3518.64	2638.98	1759.32
	Furfural	3518.64	2638.98	1759.32
	Glucose (unfermentables)	1946.16	1459.62	973.08
	Gums	2540.16	1905.12	1270.08
	Hydroxymethyl furfural by HPLC	3548.88	2661.66	1774.44
	Lactic acid	2494.80	1871.10	1247.40
	Mixed Juice compositing	2365.20	1773.90	1182.60
	Molasses fermentability	5665.68	4249.26	2832.84
	NIRS (Pol, Brix, Purity)	1550.88	1163.16	775.44
	Oligosaccharides by HPLC	3518.64	2638.98	1759.32
	pH	390.96	293.22	195.48
	Pol (including Brix)	1550.88	1163.16	775.44
	Reducing sugars, by Lane and Eynon	1674.00	1255.50	837.00
	Starch	1427.76	1070.82	713.88
	Suspended matter	1674.00	1255.50	837.00
	Total invert, by Eynon and Lane	1674.00	1255.50	837.00
	Turbidity	848.88	636.66	424.44
	Unleaded Pol and Brix	1550.88	1163.16	775.44
	Viscosity (molasses)	514.08	385.56	257.04
	Viscosity (massecuite and magma)	857.52	643.14	428.76
	Volatile organic acids	3823.20	2867.40	1911.60



3	<i>Intermediate Products (continued)</i>	Charge by membership category (R)		
		B6	B2, B3, B4	B1
<i>Cane and Bagasse</i>				
	Ash/soil	1946.16	1459.62	973.08
	Brix, refractometer	848.88	636.66	424.44
	Calorific value*			
	Fibre, by DAC	1254.96	941.22	627.48
	Fibre, direct	1254.96	941.22	627.48
	Moisture, by microwave or oven drying	390.96	293.22	195.48
	Pol and Brix	1550.88	1163.16	775.44
	Preparation index	1946.16	1459.62	973.08
	Total Analysis (Pol, Brix, Fibre, Moisture)	3799.44	2849.58	1899.72
<i>Filter Cake and Filter Feed</i>				
	Brix refractometer	848.88	636.66	424.44
	Filter retention	6311.52	4733.64	3155.76
	Moisture, by oven drying	390.96	293.22	195.48
	Mud solids	2343.60	1757.70	1171.80
	Pol and Brix	1550.88	1163.16	775.44



4	General Analysis	Charge by membership category (R)		
		B6	B2, B3, B4	B1
	Acidity	848.88	636.66	424.44
	Aluminium*			
	Anions by IC (Cl ⁻ , PO ₄ ³⁻ , SO ₄ ²⁻)	3518.64	2638.98	1759.32
	Arsenic*			
	Available CaO sugar method	2494.80	1871.10	1247.40
	Calcium*			
	Carbon dioxide*			
	Cations by IC (K ⁺ , NH ₄ ⁺ , Ca ²⁺ , Mg ²⁺)	3518.64	2638.98	1759.32
	Centrifugal screen analysis (for slot size) (plus photograph if requested)	1674.00	1255.50	837.00
		332.64	249.48	166.32
	Chemical Oxygen Demand	1077.84	808.38	538.92
	Chromium, by emission*			
	Copper*			
	Iron*			
	Lead*			
	Lead, by chemical method*			
	Lead sub-acetate (full analysis)	15508.80	11631.60	7754.40
	Lithium*			
	Loss on ignition per temperature	864.00	648.00	432.00
	Magnesium*			
	Manganese*			
	Metacontent (nickel plating solutions)	1028.16	771.12	514.08
	Optical rotation	486.00	364.50	243.00
	Phosphate, inorganic (colorimetric method)	848.88	636.66	424.44
	Potassium*			
	Quaternary Ammonium Compounds (raw & refined sugar)	2693.52	2020.14	1346.76
	Refractive index of castor oil	291.60	218.70	145.80
	Scale (digestion)	848.88	636.66	424.44
	Scale Analysis (XRD and XRF)*			
	Silica, gravimetric	1946.16	1459.62	973.08
	Sludge content by centrifugation	1185.84	889.38	592.92
	Sodium*			
	Specific gravity (bottle)	1550.88	1163.16	775.44
	Verification of quartz plates (per plate)	7801.92	5851.44	3900.96

*Subcontracted analysis- SMRI will charge a 15% handling fee if requested to act as an intermediary

Find us :



www.smri.org



queries@smri.org



031 273 1300

5	Microbiological analysis	Charge by membership category (R)		
		B6	B2, B3, B4	B1
	Anaerobes producing gas	1423.44	1067.58	711.72
	Anaerobes producing sulfide	1561.68	1171.26	780.84
	Bottlers' sugar	1812.24	1359.18	906.12
	Canners' sugar	2587.68	1940.76	1293.84
	Flat sours	1671.84	1253.88	835.92
	Mesophilic bacteria	1600.56	1200.42	800.28
	Microscopic examination	848.88	636.66	424.44
	Mould	1620.00	1215.00	810.00
	Osmophiles	2587.68	1940.76	1293.84
	Total Bacterial Count	1600.56	1200.42	800.28
	Thermophilic Acidophilic Bacteria	1235.52	926.64	617.76
	Thermophilic Bacteria	1671.84	1253.88	835.92
	Yeast	1600.56	1200.42	800.28

Find us :


www.smri.org

queries@smri.org


031 273 1300

6	Water analysis	Charge by membership category (R)		
		B6	B2, B3, B4	B1
	Sucrose traces (colorimetric)	1028.16	771.12	514.08
	Alkalinity*	<p>For these analyses please contact the CSIR (Council for Scientific and Industrial Research). 031 261 8161.</p> <p>Alternatively, the SMRI will charge a 15% handling fee to act as an intermediary.</p>		
	Ammonia*			
	Chelant*			
	COD, semi-micro method*			
	Conductivity*			
	Chloride*			
	Iron*			
	Loss on ignition of insoluble solids*			
	Loss on ignition of total solids*			
	Nitrate*			
	Nitrite*			
	Oil, grease*			
	Oxygen absorbed*			
	pH*			
	Phosphate*			
	Silica*			
	Sodium*			
	Sulfite*			
	Suspended solids*			
	Total dissolved solids, conductometric*			
	Total dissolved solids, gravimetric*			
	Total hardness*			
	Total solids*			



Instrumentation

The SMRI has developed various instruments specifically for the sugar industry, which are manufactured by third parties. These instruments include:

- a) Nutsch Filters
- b) Mini Nutsch filters
- c) Displacement Rate Index Apparatus (DRI)
- d) Juice Turbidity Meter
- e) Juice Colour Meter

For further information contact: queries@smri.org

Find us :



www.smri.org



queries@smri.org



031 273 1300

SMRI contacts

The following is a list of useful contacts at the SMRI:

Sugar Technology

Acting Head	Steve Davis
Lead Process Engineer	Dr Vincent Ndinisa
Lead Mechanical Engineer	Rishen Naidoo
Group Leader: Technology Development	Yolanda Mbuthuma
Researchers	Bryan Barker
	Dr Kim Booysen
	Dr Richard Loubser
	Dr Thobeka Mkwanzani
	Dr Sanet Nel
	Sayed Rahiman
	Zinhle Mkhwanazi
Consulting	Malesedi Moletsane-Mbuyazi
Factory Figures	Levitta Bhyrodeyal
Training	Indiran Govender

Group Leader: Strategic Research

Dr Kitty Foxon

Analytical Services:

Head of Analytical Services	Lola Naidoo
Analytical Services Lead	Anayshree Naicker
Analytical Audit & Training Lead	Mfundo Ngema
Quality	Venishree Pillay
SMRI-NIRS	Sandile Mkhize

Support Services:

Finance & Admin Manager	Gail Hart-Jones
Finance & Admin Officer	Marlini Moodley
Invoicing/Debtors	Kavita Mudali
Procurement/Creditors	Ntokozo Msani
Reception	Nonhlanhla Langa

The SMRI reserves the right to change the listed prices as deemed necessary. E&OE

Find us :



www.smri.org



queries@smri.org



031 273 1300