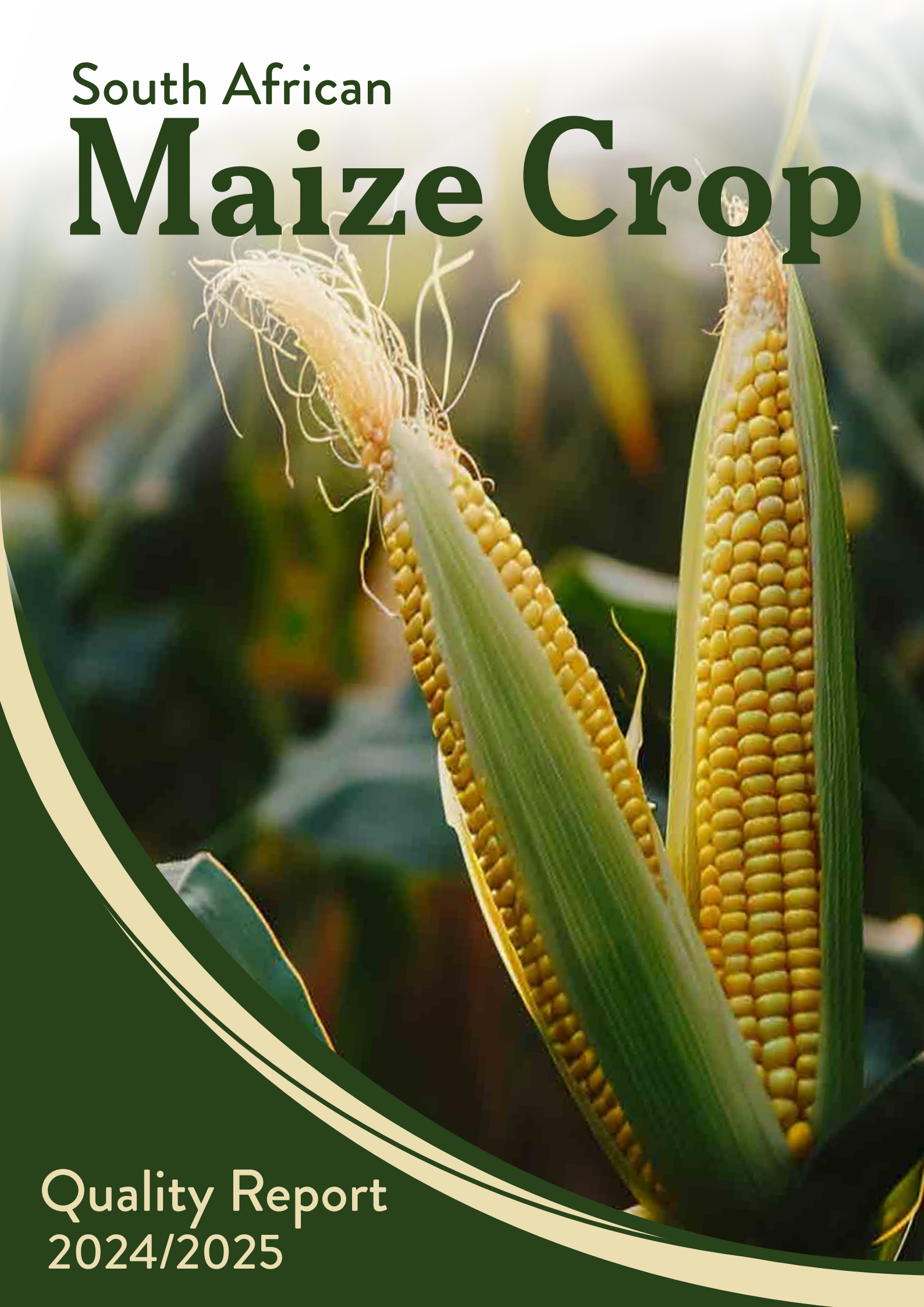
South African

Maize Crop



Quality Report 2024/2025

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Index

South African

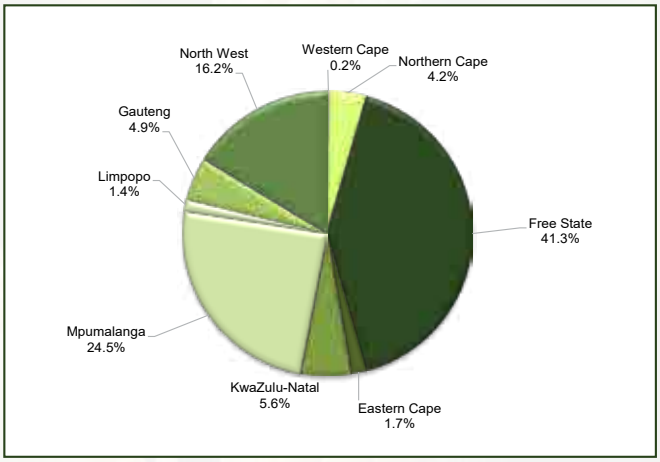
Commercial Maize Quality for the 2024/2025 season

Acknowledgments
With gratitude to:

- **The Maize Trust for financial support in conducting this survey.**
- **Agbiz Grain and its members for providing maize samples for this survey.**
- **The Crop Estimates Committee (CEC) of the Department of Agriculture (DoA) for providing production related figures.**
- **South African Grain Information Service (SAGIS) for providing supply and demand figures relating to maize and maize products.**

Introduction

During the 2025 harvesting season, a representative sample of each delivery of maize at the various grain intake points was taken according to the prescribed grading regulation and sampling protocol provided. The sampling procedure for the samples used in this survey is described on page 91. A total of 1 000 composite samples, representing white and yellow maize of each production region, were received and analysed to determine the quality. The samples consisted of 458 white and 542 yellow maize samples.



Graph 1: Provincial contribution to the production of the 2024/25 maize crop

Figures provided by the CEC.

The quality attributes tested, include:
RSA grading: Samples were graded according to the following factors, as defined in the South African grading regulation: defective kernels above and below the 6.35 mm sieve, total defective kernels, foreign matter, other colour kernels and combined deviations.

USA grading: Samples were graded according to the American grading regulations to determine the following factors: Test weight per bushel (pounds), heat damaged kernels, total damaged kernels, broken corn and foreign matter (BCFM) and other colour.

Nutritional values: Moisture, crude protein, crude fat, crude fibre and starch.

Physical quality factors: Test weight (kg/hl), 100 kernel mass, kernel size, breakage susceptibility, stress cracks, milling index and grit yield.

All white maize samples were milled on the Bühler MCKA maize mill, while 50% of the samples were also milled on the Roff laboratory maize mill for comparison purposes. The whiteness index of all the milled maize meal samples was determined.

Mycotoxin analyses were performed on 350 samples representative of white and yellow maize produced per region.

Please refer to pages 91 – 95 for the methodologies followed.

The maize crop quality survey is performed annually by the Southern African Grain Laboratory NPC (SAGL). SAGL was established in 1997 on request of the Grain Industry. SAGL is an ISO 17025 accredited testing laboratory and participates in a number of proficiency testing schemes, both nationally and internationally, as part of our ongoing quality assurance procedures to demonstrate technical competency and international comparability.

The results of this, the 28th survey, as well as previous years' surveys are available on the SAGL website (www.sagl.co.za). The report, in an easy to page format, is also available on the website. Hard copy reports are distributed to industry stakeholders and interested parties.

Crop quality results are summarised and reported on a per region, per colour and from this report going forward, also a per province basis. In addition to the quality information, production figures (obtained from the Crop Estimates Committee (CEC)) relating to hectares planted, tons produced and yields obtained on a national as well as provincial basis, over an eleven-season period, are provided in this report. SAGIS (South African Grain Information Service) supply and demand figures over several years are provided in table and graph format, also import and export data. Information on maize processed per province as well as the manufacture, import and export of maize products is also included in this report. The national grading regulations as published in Government Gazettes of 16 February 2024 as well as 1 March 2024, are provided on pages 100 to 110.

The long-term goal of this quality survey is the annual determination of the quality of the commercial maize crop on a national level. This valuable data set reveals general tendencies, highlights quality differences in the commercial maize produced in different local production regions for local market requirements and provides important information on the quality of commercial maize intended for export. During seasons when maize is imported for domestic use, the quality of the imported maize can be compared to that of locally produced maize.

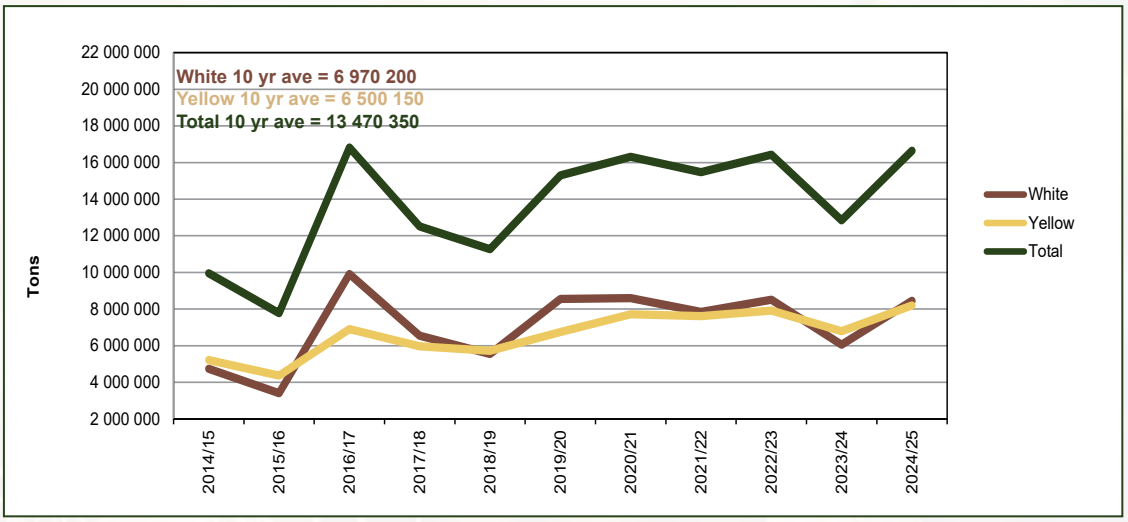
The quality data generated is also referred to by various role players in the maize industry, adds value to research projects and serves as the basis for discussions when maize grading regulations have to be revised.

With funding from the Maize Trust, a data mining project on thirteen season's crop quality data was conducted and the results transferred to a Geographic Information System (GIS) map system, reflecting all the maize producing areas of South Africa. These maps are updated annually.

Production

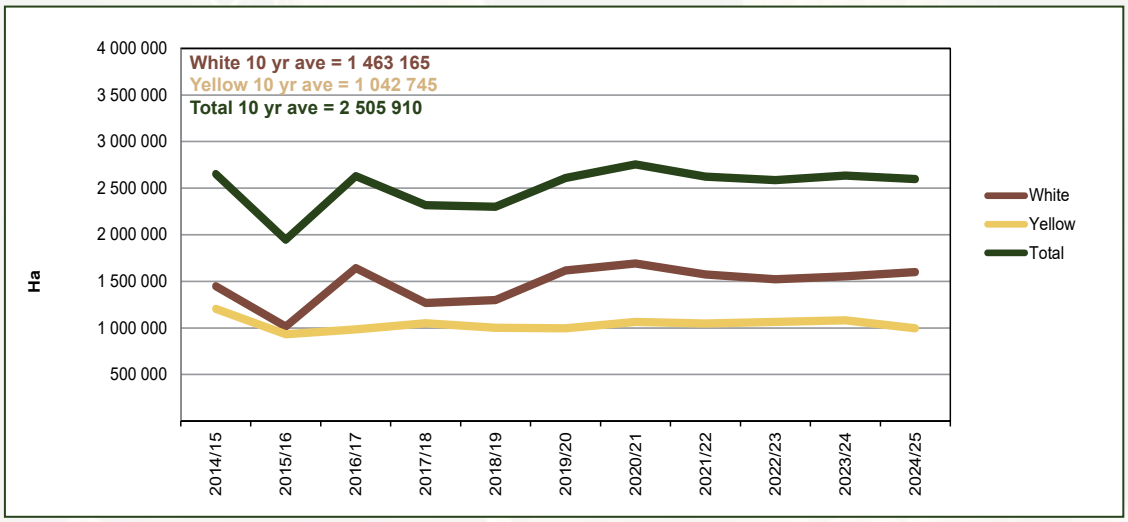
The final figure for the 2024/25 season's commercial maize crop, as overseen by the National Crop Estimates Liaison Committee (CELC), is 16 650 000 tons (Graph 2). This is the second largest crop following the all-time high record crop of 16 820 000 tons produced in the 2016/17 season. This season's crop is also almost 24% higher than the previous 10-year crop average (2014/15 - 2023/24) of 13 470 350 tons. White maize's contribution to the total production was 8 450 000 tons (50.8%) and that of yellow maize 8 200 000 tons (49.2%).

The national Crop Estimates Committee's (CEC) estimated total production figures were revised, using the South African Grain Information Services' (SAGIS) published figures of actual deliveries as basis for the calculations. Figures from the maize utilisation survey, conducted by the Department of Agriculture and the National Crop Statistics Consortium (NCSC) to determine on-farm usage and retentions, were added to the SAGIS delivery figures to calculate the final crop production figures.



Graph 2: Maize production in RSA from 2014/15 to 2024/25

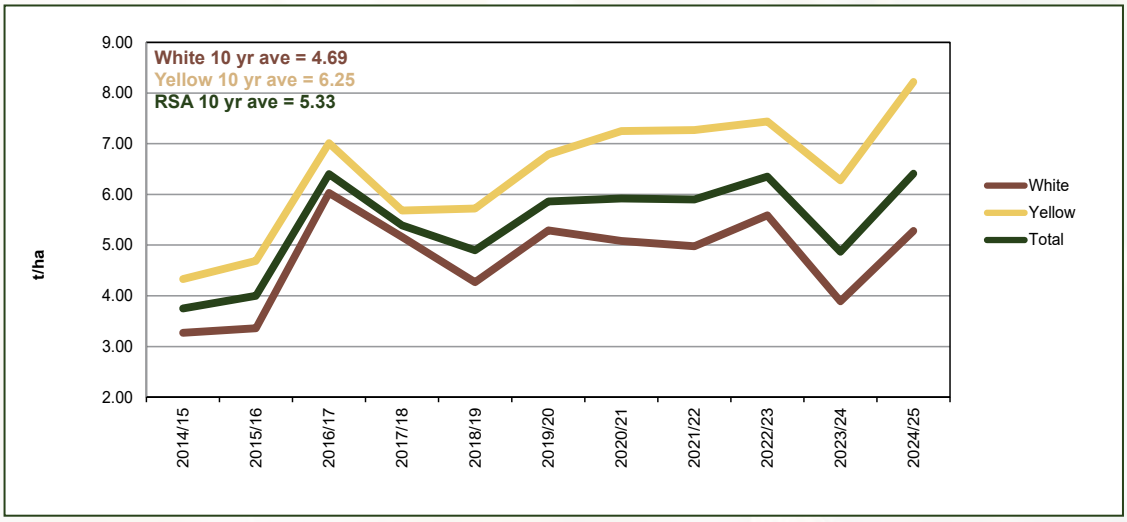
As shown in Graph 3, the total area utilised for maize production in the 2024/25 season was 2 596 700 hectares, representing a 1.5% decrease compared to the previous season and a 3.6% increase compared to the previous 10-year average (2014/15 - 2023/24). White maize was produced on 1 599 700 hectares and yellow maize on 997 000 hectares (1 554 750 and 1 081 500 hectares respectively in the 2023/24 season).



Graph 3: Total RSA area utilised for maize production from 2014/15 to 2024/25

Graph 4 depicts the maize yield of 6.41 tons per hectare (t/ha), which was almost 32% higher than the previous season (4.87 t/ha) and also 20.3% higher than the previous 10-year average (2014/15 - 2023/24) of 5.33 t/ha. White maize yielded 5.28 t/ha and yellow maize 8.22 t/ha (3.89 t/ha and 6.28 t/ha respectively during the previous season).

According to the CEC, the maize area planted in the non-commercial agricultural sector is estimated at 358 000 ha, representing a 3.17% increase compared to the 347 000 ha of the previous season. The expected maize crop for this sector is 621 500 tons, which is 8.09% more than the 575 000 tons of last season. Approximately 46.75% of non-commercial maize is produced in the Eastern Cape, followed by KwaZulu-Natal with 20.88% and Limpopo with 20.65%.



Graph 4: RSA Maize yield from 2014/15 to 2024/25

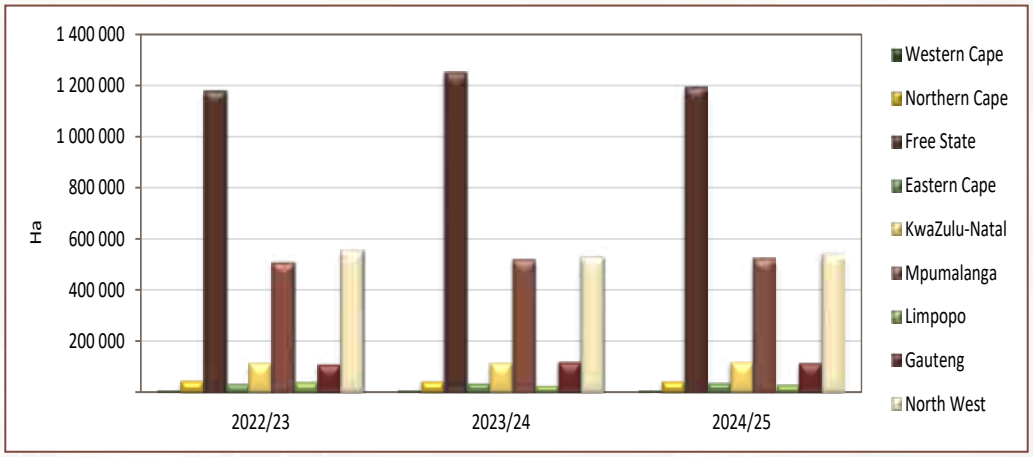
The major commercial maize-producing provinces are the Free State, Mpumalanga and North West, contributing 81.9% of the total maize production in the RSA (Table 1). The Free State produced 6 870 900 tons of maize on 1 195 000 hectares with a yield of 5.75 t/ha. Mpumalanga produced 4 080 000 tons of maize on 524 000 hectares with a yield of 7.79 t/ha and North West produced 2 690 850 tons of maize on 540 000 hectares yielding 4.98 t/ha. Yellow maize contributed 73% of the total maize production in Mpumalanga while the majority of maize produced in the Free State (63%) and North West (82%) was white.

Table 1: Maize production overview (2024/25 season)

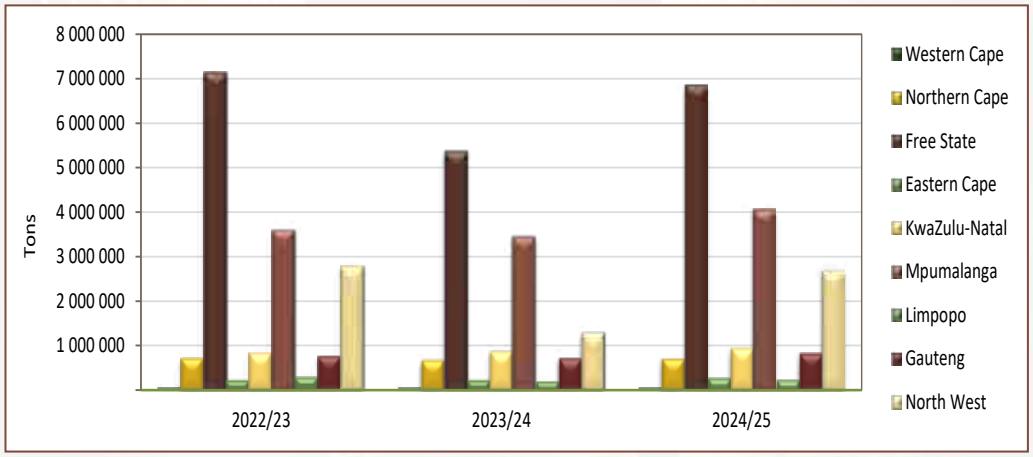
Province	Type of production	White			Yellow		
		Hectares planted, ha	Production, tons	Yield, t/ha	Hectares planted, ha	Production, tons	Yield, t/ha
Western Cape	Dryland	-	-	-	-	-	-
	Irrigation	200	1 800	9.00	3 500	33 850	9.67
	Total	200	1 800	9.00	3 500	33 850	9.67
Northern Cape	Dryland	-	-	-	-	-	-
	Irrigation	1 500	18 750	12.50	42 000	680 400	16.20
	Total	1 500	18 750	12.50	42 000	680 400	16.20
Free State	Dryland	826 000	4 139 400	5.01	307 000	2 072 300	6.75
	Irrigation	24 000	195 600	8.15	38 000	463 600	12.20
	Total	850 000	4 335 000	5.10	345 000	2 535 900	7.35
Eastern Cape	Dryland	4 000	19 000	4.75	17 000	89 000	5.24
	Irrigation	2 000	23 600	11.80	11 000	149 000	13.55
	Total	6 000	42 600	7.10	28 000	238 000	8.50
KwaZulu-Natal	Dryland	42 000	234 000	5.57	46 000	365 100	7.94
	Irrigation	8 000	86 000	10.75	20 000	252 000	12.60
	Total	50 000	320 000	6.40	66 000	617 100	9.35
Mpumalanga	Dryland	152 400	990 600	6.50	340 000	2 703 000	7.95
	Irrigation	9 600	102 900	10.72	22 000	283 500	12.89
	Total	162 000	1 093 500	6.75	362 000	2 986 500	8.25
Limpopo	Dryland	4 000	12 800	3.20	6 500	28 400	4.37
	Irrigation	6 000	58 200	9.70	12 000	134 400	11.20
	Total	10 000	71 000	7.10	18 500	162 800	8.80
Gauteng	Dryland	52 000	330 250	6.35	51 800	396 200	7.65
	Irrigation	3 000	30 000	10.00	5 200	65 500	12.60
	Total	55 000	360 250	6.55	57 000	461 700	8.10
North West	Dryland	443 500	1 994 250	4.50	58 500	303 900	5.19
	Irrigation	21 500	212 850	9.90	16 500	179 850	10.90
	Total	465 000	2 207 100	4.75	75 000	483 750	6.45
RSA	**Dryland**	**1 523 900**	**7 720 300**	**5.07**	**826 800**	**5 957 900**	**7.21**
	Irrigation	**75 800**	**729 700**	**9.63**	**170 200**	**2 242 100**	**13.17**
	Total	**1 599 700**	**8 450 000**	**5.28**	**997 000**	**8 200 000**	**8.22**

Figures provided by the CEC.

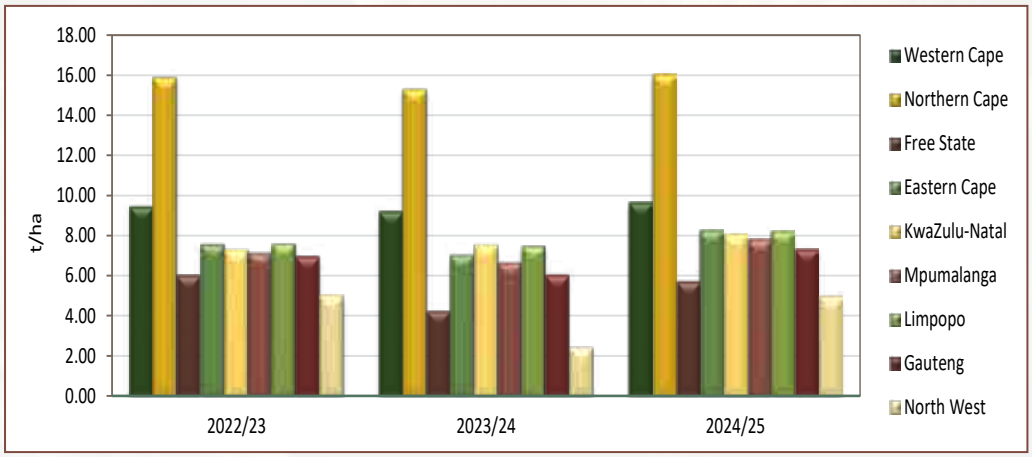
Figures for area planted, production and yield per province over the last three seasons, are provided in Graphs 5 to 7.



Graph 5: Area utilised for maize production (dryland and/or irrigation) per province over three seasons



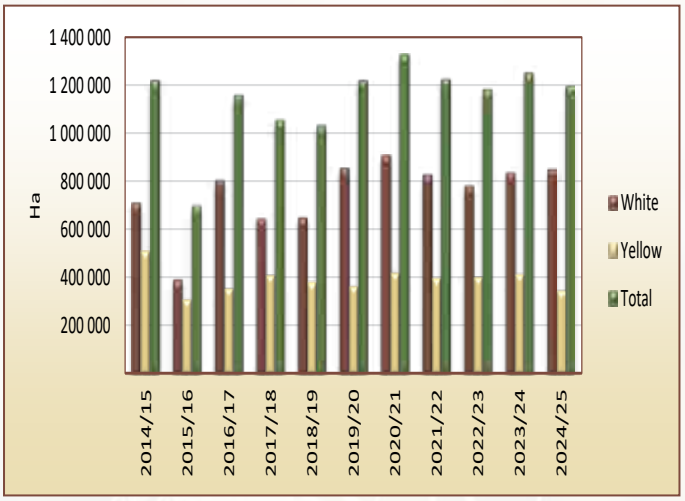
Graph 6: Maize production (dryland and/or irrigation) per province over three seasons



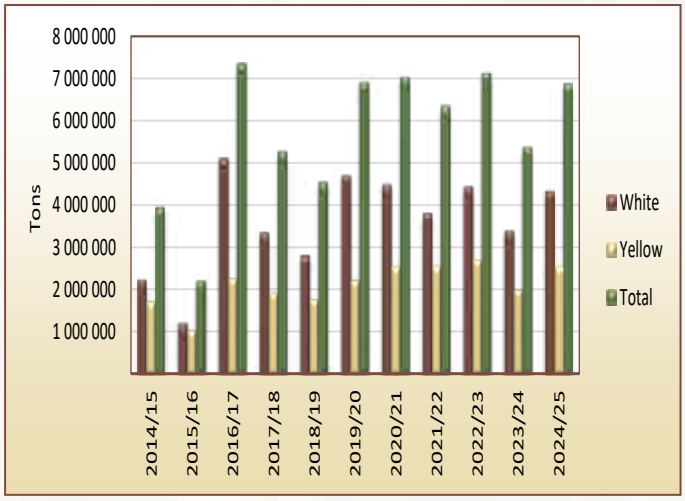
Graph 7: Maize yield (dryland and/or irrigation) per province over three seasons

Figures provided by the CEC.

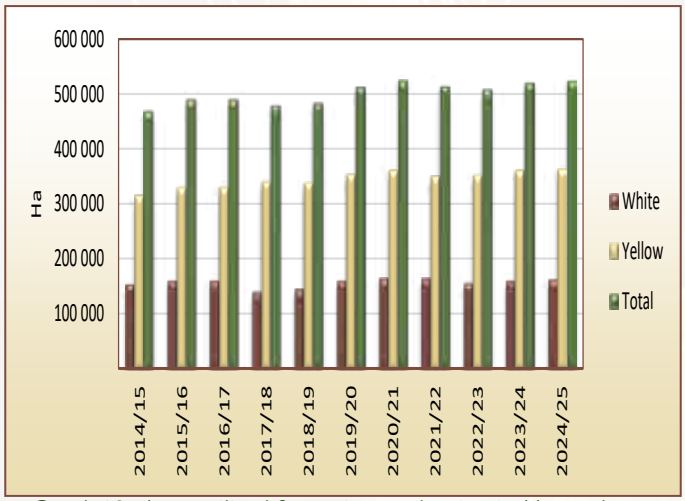
Graphs 8 to 13 provide an overview of the area planted as well as the production figures for the Free State, Mpumalanga and North West provinces since the 2014/15 season.



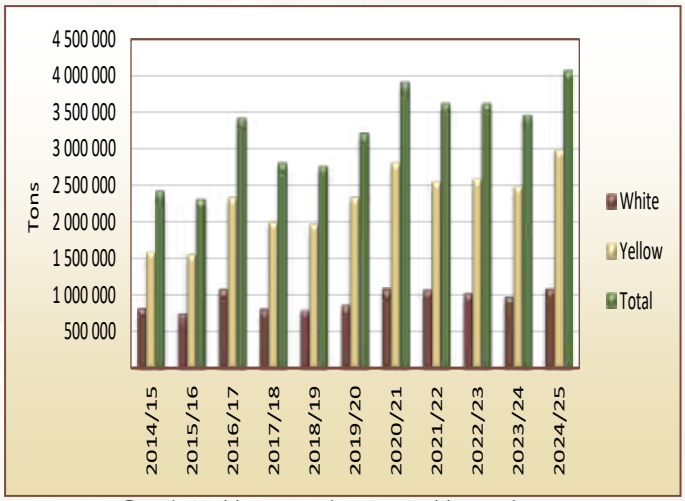
Graph 8: Area utilised for maize production in the Free State since 2014/15



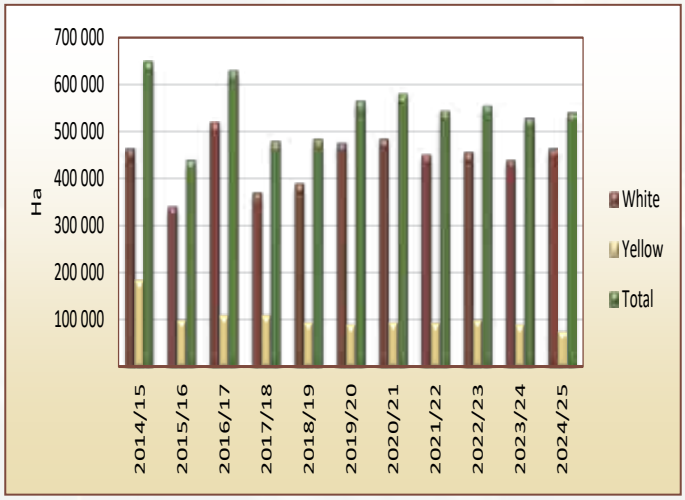
Graph 9: Maize production in the Free State since 2014/15



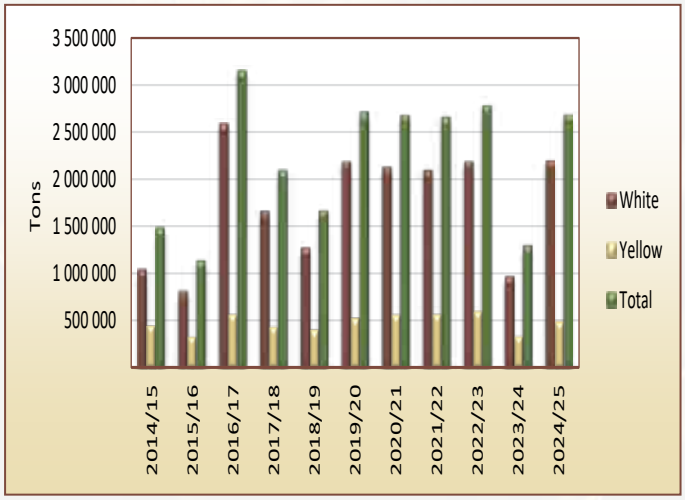
Graph 10: Area utilised for maize production in Mpumalanga since 2014/15



Graph 11: Maize production in Mpumalanga since 2014/15



Graph 12: Area utilised for maize production in North West since 2014/15



Graph 13: Maize production in North West since 2014/15

Figures provided by the CEC.

Supply and Demand

World maize production for the 2024/25 season was set at 1 242.5 million tons according to the *International Grains Council Grain Market Report GMR 579 – 20 August 2026*, with the major maize producing countries being the USA (378.3 million tons), China (294.9 million tons) and Brazil (115.5 million tons). The USA (73.0 million tons), Argentina and Brazil (both 38.2 million tons) as well as the Ukraine (20.0 million tons) were the biggest exporters of maize during the 2024/25 season. World maize usage figures were 140.6, 341.3 and 733.1 million tons respectively for food, industrial and feed purposes. World production for the 2025/26 season is estimated at 1 345.8 million tons and the 2026/27 figure is forecasted to be 1 304.9 million tons.

Please refer to the tables and graphs on pages 9 to 14 for supply and demand figures of total, white and yellow maize over several seasons.

During the 2025/26 marketing year, South Africa imported a total of 110 448 tons of maize. This is significantly less than the 937 559 tons of the previous season and also 72% less than the 10-year import average of 400 695 tons. All the maize imported for local use this year, was yellow maize from Argentina. See Table S5 on page 16. Table S4 on page 15 show the amount of white maize imported for the purpose of exports to Lesotho and Zimbabwe.

The quality of the imported yellow maize is summarised in Table 2 on page 17 and compared to the quality of the corresponding local crop (2024/25 harvesting season).

5 453 151 tons of white maize was processed for the local market (almost 11% more than during the previous marketing season), with 90% going towards human consumption and the remainder towards animal feed/industrial use and gristing.

The amount of yellow maize processed decreased by 4.5% year-on-year to 6 349 561 tons. The majority (89%) going toward animal feed/industrial use.

South African whole white maize exports amounted to 1 180 747 tons, with 90% exported to neighbouring countries, mainly Zimbabwe, but also Botswana, Namibia, Lesotho, Mozambique and Eswatini. Last season, 1 491 687 tons of white maize was exported. The 10-year average is 1 023 692 tons. See Table S4 and Graph 27 on page 15.

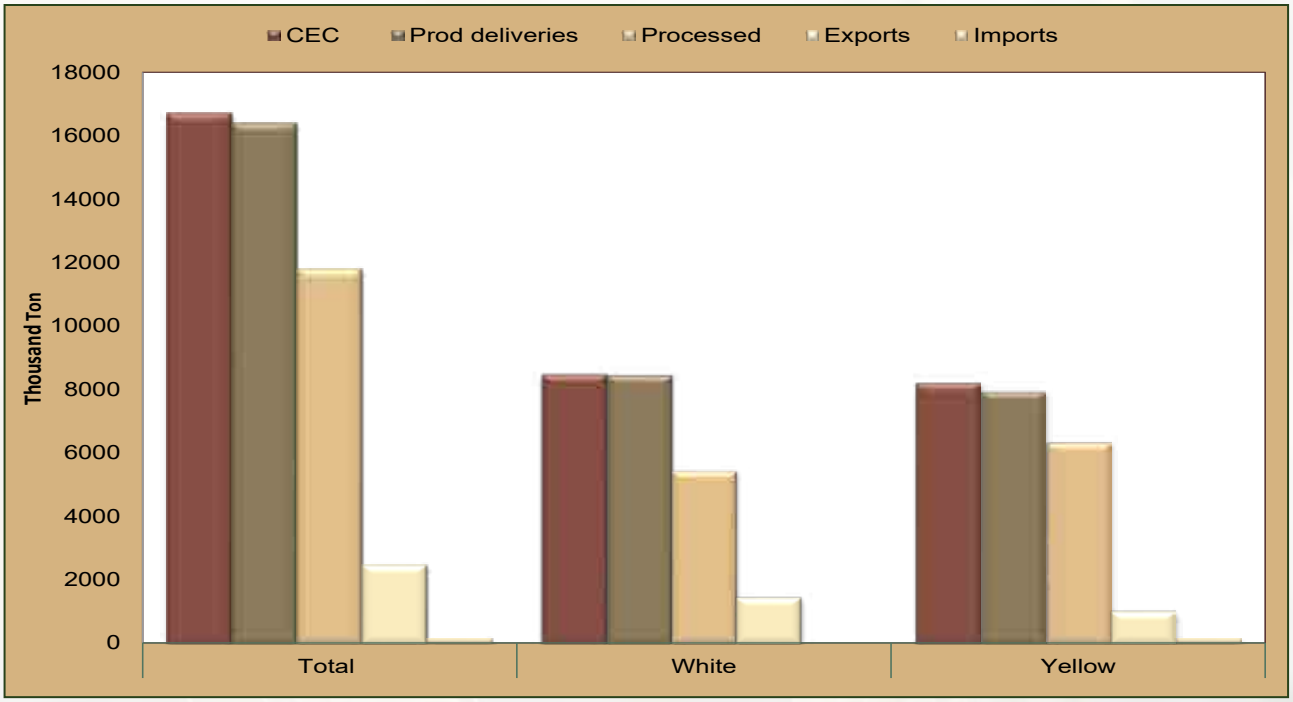
Whole yellow maize exports totaled 872 840 tons, an increase of almost 12% compared to the 780 994 of the previous season. The 10-year average is 1 345 588 tons. Neighbouring countries like Zimbabwe and Eswatini were also the main buyers of local yellow maize. See Table S5 and Graph 28 on page 16.

White maize closing stock as on 30 April 2025 was 1 937 498 tons, the highest since the 2017/18 season and more than 5 times higher than the previous season. The 10-year average is 1 285 245 tons.

Yellow maize closing stock was 988 289 tons, more than 3 times that of the previous season (288 292 tons) and 24% more than the 10-year average of 794 943 tons.

Whole maize (total/white/yellow) processing figures per province as well as maize product (manufactured/imported/exported) figures over several seasons are provided in Tables S6 to S8 on pages 18 to 20 and Tables S9 to S11 on pages 22 to 24.

Local Supply and Demand figures for the 2025/26 marketing season are provided in Graph 14.



Graph 14: Maize supply and demand overview 2025/26 marketing season

Information provided by SAGIS.

SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

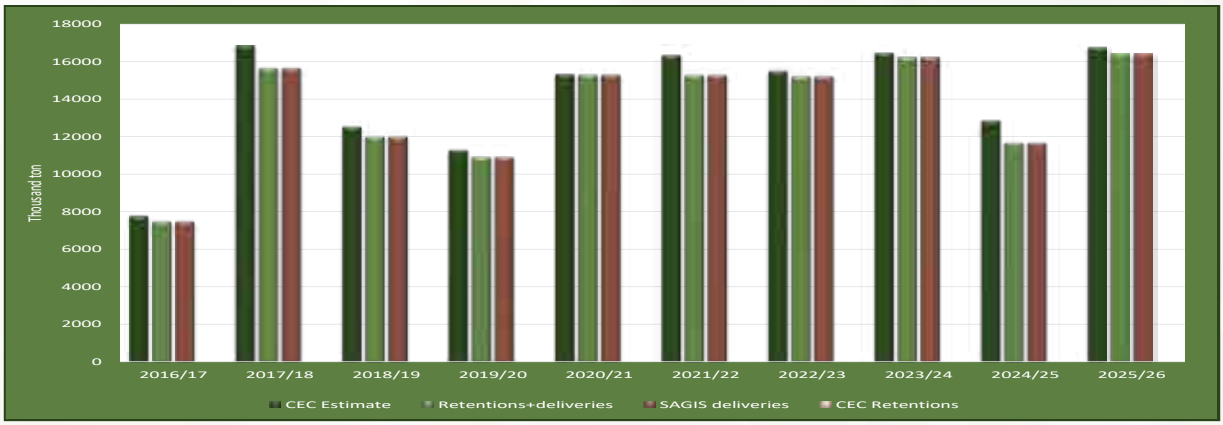
Table: S1

TOTAL MAIZE: SUPPLY AND DEMAND TABLE BASED ON SAGIS' INFO (TON)

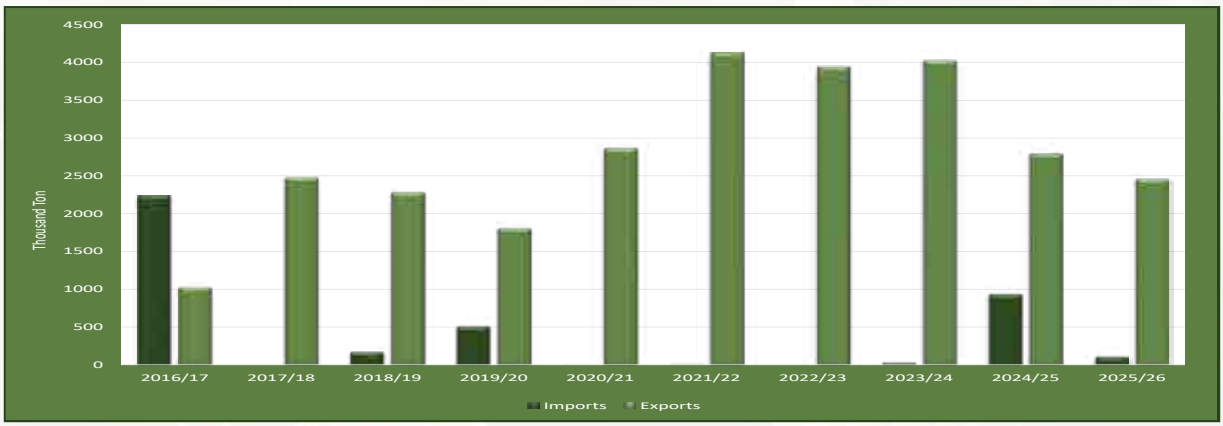
Publication date: 2026-07-24

	Marketing Season (May - Apr)																		Active Season May - Jun	10 Year average
SEASON	**2007/08**	**2008/09**	**2009/10**	**2010/11**	**2011/12**	**2012/13**	**2013/14**	**2014/15**	**2015/16**	**2016/17**	**2017/18**	**2018/19**	**2019/20**	**2020/21**	**2021/22**	**2022/23**	**2023/24**	**2024/25**	**2025/26**	**2026/27**	**2016/17-2025/26**
(Non-SAGIS Info)																				*** 2	
CEC (Crop Estimates)	*7 125 000*	*12 700 000*	*12 050 000*	*12 815 000*	*10 360 000*	*12 120 656*	*11 810 600*	*14 250 000*	*9 955 000*	*7 778 500*	*16 820 000*	*12 510 000*	*11 275 000*	*15 300 000*	*16 315 000*	*15 470 000*	*16 430 000*	*12 850 000*	*16 725 000*	*17 254 540*	*14 147 350*
CEC (Retention)	*337 000*	*554 000*	*389 000*	*527 000*	*474 000*	*433 000*	*457 810*	*550 000*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*
SUPPLY																					
Opening Stock (1 May)	2 070 000	1 049 000	1 581 000	2 131 000	2 336 000	994 000	1 417 393	589 028	2 073 635	2 471 067	1 094 638	3 689 476	2 663 086	1 000 601	2 116 906	2 124 219	1 953 931	2 404 540	653 790	2 925 787	2 017 225
Producer deliveries	6 882 000	11 899 000	11 629 000	12 016 000	10 340 000	11 929 000	10 991 995	13 827 632	9 794 332	7 469 600	15 628 682	11 983 852	10 887 053	15 278 983	15 266 562	15 189 328	16 222 935	11 660 689	16 402 967	5 964 111	13 599 065
Imports	1 120 000	27 000	27 000	0	421 000	11 000	79 682	65 250	1 963 610	2 236 743	0	171 622	509 684	463	7 583	0	32 844	937 559	110 448	0	400 695
Surplus	29 000	30 000	68 000	77 000	54 000	42 000	122 608	26 153	52 930	44 417	46 657	22 173	22 336	20 079	43 389	24 045	20 198	46 141	55 223	0	34 466
Total Supply	**10 101 000**	**13 005 000**	**13 305 000**	**14 224 000**	**13 151 000**	**12 976 000**	**12 611 678**	**14 508 063**	**13 884 507**	**12 221 827**	**16 769 977**	**15 867 123**	**14 087 764**	**16 300 126**	**17 434 440**	**17 337 592**	**18 229 908**	**15 048 929**	**17 222 428**	**8 889 898**	**16 052 011**
DEMAND																					
Processed for the local market	8 029 000	8 613 000	8 658 000	8 857 000	8 941 000	8 935 000	9 348 670	9 926 519	10 248 994	9 838 709	10 299 680	10 690 977	11 106 412	11 201 202	11 087 127	11 353 240	11 753 244	11 567 882	11 802 712	1 819 969	11 070 119
Human	3 809 000	4 524 000	4 471 000	4 513 000	4 512 000	4 499 000	4 582 310	4 840 021	4 698 482	4 809 221	4 993 476	5 160 772	5 387 572	5 657 836	5 171 981	5 387 927	5 942 143	5 424 650	5 594 107	835 016	5 352 969
Animal/industrial	4 157 000	4 020 000	4 101 000	4 271 000	4 362 000	4 378 000	4 715 295	5 040 647	5 520 248	5 003 810	5 276 447	5 507 180	5 698 317	5 527 649	5 897 871	5 948 222	5 792 740	6 125 040	6 181 407	981 032	5 695 868
Gristing	63 000	69 000	86 000	73 000	67 000	58 000	51 065	45 851	30 264	25 678	29 757	23 025	20 523	15 717	17 275	17 091	18 361	18 192	27 198	3 921	21 282
Bio-fuel	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Withdrawn by producers	217 000	273 000	291 000	267 000	142 000	138 000	148 909	124 508	76 888	94 948	102 906	64 264	57 104	35 736	36 663	28 857	15 820	8 259	15 403	595	45 996
Released to end-consumers	230 000	220 000	378 000	526 000	484 000	478 000	280 432	205 577	186 296	157 460	180 544	151 643	99 815	69 329	48 882	36 453	22 251	16 117	11 976	1 727	79 447
Net dispatches(+)/receipts(-)	42 000	49 000	51 000	44 000	15 000	62 000	12 043	22 100	21 451	9 770	15 663	13 095	8 654	9 163	2 338	3 434	3 010	4 352	4 220	126	7 370
Deficit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11 871	0	0	0	2 520	1 187
Total Exports	534 000	2 269 000	1 796 000	2 194 000	2 575 000	1 946 000	2 232 596	2 155 724	879 811	1 026 302	2 481 708	2 284 058	1 809 573	2 867 790	4 135 211	3 949 806	4 031 043	2 798 529	2 462 330	719 779	2 784 635
Products	62 000	107 000	126 000	128 000	129 000	133 000	176 978	198 319	186 383	189 112	192 874	213 592	360 812	320 926	403 225	297 531	588 045	525 848	408 743	54 312	350 071
African Countries	35 000	67 000	87 000	84 000	86 000	95 000	123 040	137 742	132 900	144 229	117 797	142 117	320 754	282 678	360 891	247 012	538 694	480 869	371 133	49 057	300 617
Other Countries	27 000	40 000	39 000	44 000	43 000	38 000	53 938	60 577	53 483	44 883	75 077	71 475	40 058	38 248	42 334	50 519	49 351	44 979	37 610	5 255	49 453
Whole Maize	472 000	2 162 000	1 670 000	2 066 000	2 446 000	1 813 000	2 055 618	1 957 405	693 428	837 190	2 288 834	2 070 466	1 448 761	2 546 864	3 731 986	3 652 275	3 442 998	2 272 681	2 053 587	665 467	2 434 564
Border Posts	472 000	1 332 000	703 000	629 000	584 000	613 000	921 454	691 659	684 834	804 322	591 692	630 572	1 230 762	1 380 017	764 557	837 958	1 610 222	2 224 792	1 688 761	181 744	1 176 366
Harbours	0	830 000	967 000	1 437 000	1 862 000	1 200 000	1 134 164	1 264 326	8 594	32 868	1 697 142	1 439 894	217 999	1 166 847	1 166 847	2 814 317	1 832 776	47 889	364 826	483 723	1 078 141
Total Demand	**9 052 000**	**11 424 000**	**11 174 000**	**11 888 000**	**12 157 000**	**11 559 000**	**12 022 650**	**12 434 428**	**11 413 440**	**11 127 189**	**13 080 501**	**13 204 037**	**13 087 163**	**14 183 220**	**15 310 221**	**15 383 661**	**15 825 368**	**14 395 139**	**14 296 641**	**2 544 716**	**13 989 314**
Unutilized Closing Stock (30 Apr)	**1 049 000**	**1 581 000**	**2 131 000**	**2 336 000**	**994 000**	**1 417 000**	**589 028**	**2 073 635**	**2 471 067**	**1 094 638**	**3 689 476**	**2 663 086**	**1 000 601**	**2 116 906**	**2 124 219**	**1 953 931**	**2 404 540**	**653 790**	**2 925 787**	**6 345 182**	**2 062 697**
Processed p/month	669 100	717 800	721 500	738 100	745 100	744 583	779 056	827 210	854 083	819 892	858 307	890 915	925 534	933 434	923 927	946 103	979 437	963 990	983 559	909 985	922 510
Months' stock	1.6	2.2	3.0	3.2	1.3	1.9	0.8	2.5	2.9	1.3	4.3	3.0	1.1	2.3	2.3	2.1	2.5	0.7	3.0	7.0	2.3

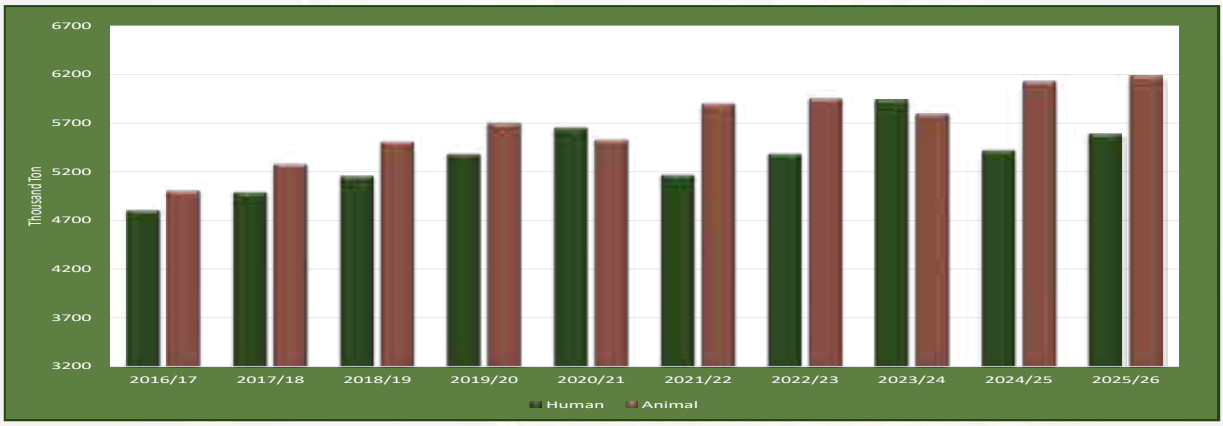
Note: *** Figures for active season up to date



Graph 15: Maize: CEC Estimate, Retentions and SAGIS deliveries over 10 marketing seasons



Graph 16: Maize: Imports and exports over 10 marketing seasons



Graph 17: Maize: RSA consumption over 10 marketing seasons

Graph 18: Maize: Opening and ending stocks over 10 marketing seasons

Information provided by SAGIS.

SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

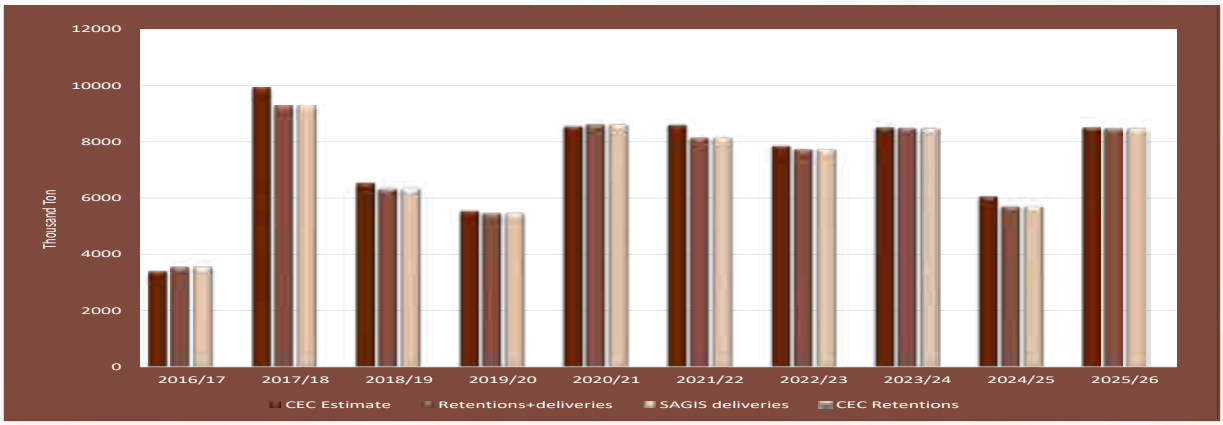
Table: S2

WHITE MAIZE: SUPPLY AND DEMAND TABLE BASED ON SAGIS' INFO (TON)

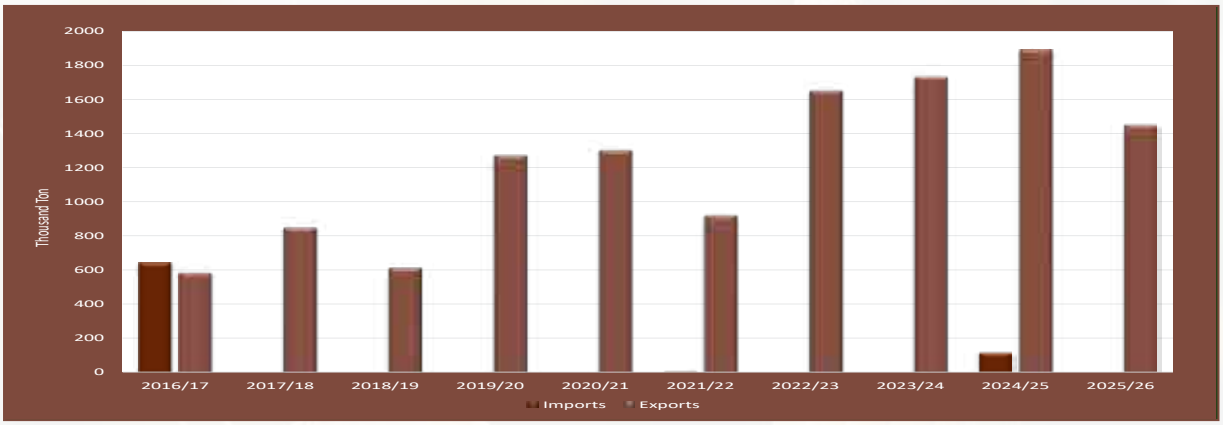
Publication date: 2026-07-24

	Marketing Season (May - Apr)																		Active Season May - Jun	10 Year average
SEASON	2007/08	2008/09	2009/10	2010/11	2011/12	2012/13	2013/14	2014/15	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25	2025/26	2026/27	2016/17-2025/26
(Non-SAGIS Info)																				*** 2	
CEC (Crop Estimates)	*4 315 000*	*7 480 000*	*6 775 000*	*7 830 000*	*6 052 000*	*6 903 656*	*5 606 800*	*7 710 000*	*4 735 000*	*3 408 500*	*9 916 000*	*6 540 000*	*5 545 000*	*8 547 500*	*8 600 000*	*7 850 000*	*8 505 000*	*6 055 000*	*8 500 000*	*9 282 690*	*7 346 700*
CEC (Retention)	*11 000*	*120 000*	*83 000*	*119 000*	*100 000*	*114 000*	*110 910*	*150 000*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*
SUPPLY																					
Opening Stock (1 May)	1 630 000	618 000	762 000	1 362 000	1 609 000	518 000	757 214	274 318	1 282 581	1 307 867	597 837	2 428 653	1 798 998	473 964	1 354 953	1 465 537	1 082 640	1 346 876	365 498	1 937 498	1 222 282
Producer deliveries	4 309 000	7 190 000	6 737 000	7 518 000	6 105 000	6 880 000	5 342 204	7 592 893	4 808 279	3 551 822	9 268 593	6 308 941	5 442 474	8 606 334	8 135 392	7 723 640	8 473 350	5 692 357	8 459 308	2 649 663	7 166 221
Imports	46 000	0	0	0	133 000	11 000	0	0	100 803	644 144	0	0	0	0	7 583	0	0	119 394	0	0	77 112
Surplus	19 000	25 000	48 000	45 000	18 000	22 000	69 859	8 808	17 474	31 994	21 751	1 403	0	11 215	25 495	0	10 840	26 868	35 586	0	16 515
Total Supply	**6 004 000**	**7 833 000**	**7 547 000**	**8 925 000**	**7 865 000**	**7 431 000**	**6 169 277**	**7 876 019**	**6 209 137**	**5 535 827**	**9 888 181**	**8 738 997**	**7 241 472**	**9 091 513**	**9 523 423**	**9 189 177**	**9 566 830**	**7 185 495**	**8 860 392**	**4 587 161**	**8 482 131**
DEMAND																					
Processed for the local market	4 751 000	4 922 000	4 555 000	5 871 000	5 374 000	5 047 000	4 808 674	5 862 438	4 319 697	4 331 787	6 533 966	6 283 320	5 449 415	6 410 756	7 116 774	6 421 561	6 470 653	4 918 377	5 453 151	921 274	5 938 976
Human	3 552 000	4 198 000	4 125 000	4 157 000	4 119 000	4 095 000	4 118 448	4 361 295	4 183 067	4 232 583	4 459 504	4 594 123	4 809 569	5 073 886	4 697 765	4 827 300	5 364 513	4 813 933	4 912 030	720 810	4 778 521
Animal/industrial	1 142 000	662 000	362 000	1 658 000	1 202 000	904 000	651 925	1 469 002	118 522	86 153	2 061 649	1 677 236	629 076	1 325 959	2 407 049	1 583 331	1 096 958	97 257	532 638	199 266	1 149 731
Gristing	57 000	62 000	68 000	56 000	53 000	48 000	38 301	32 141	18 108	13 051	12 813	11 961	10 770	10 911	11 960	10 930	9 182	7 187	8 483	1 198	10 725
Bio-fuel	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Withdrawn by producers	107 000	111 000	81 000	108 000	46 000	36 000	32 409	36 940	13 385	14 083	35 885	12 844	13 111	10 089	13 766	15 442	11 260	6 054	13 170	595	14 570
Released to end-consumers	69 000	45 000	62 000	189 000	126 000	95 000	43 000	38 934	13 987	5 660	30 125	22 946	17 649	5 827	3 404	1 905	1 325	200	355	0	8 940
Net dispatches(+)/receipts(-)	28 000	27 000	10 000	22 000	7 000	28 000	1 953	14 319	-2 862	-963	7 583	4 238	6 282	5 413	-492	1 233	1 783	1 763	3 251	-845	3 009
Deficit	0	0	0	0	0	0	0	0	0	0	0	0	5 605	0	0	11 871	0	0	0	1 183	1 748
Total Exports	431 000	1 966 000	1 477 000	1 126 000	1 794 000	1 468 000	1 008 923	640 807	557 063	587 423	851 969	616 651	1 275 446	1 304 475	924 434	1 654 525	1 734 933	1 893 603	1 452 967	150 181	1 229 643
Products	31 000	69 000	69 000	77 000	60 000	68 000	82 877	93 307	83 636	41 042	42 038	72 280	236 537	182 824	189 492	155 871	465 283	401 916	272 220	31 090	205 950
African Countries	24 000	57 000	58 000	62 000	47 000	56 000	72 032	77 930	73 061	36 573	40 695	70 726	236 162	182 297	186 977	153 806	464 760	401 167	271 875	31 090	204 504
Other Countries	7 000	12 000	11 000	15 000	13 000	12 000	10 845	15 377	10 575	4 469	1 343	1 554	375	527	2 515	2 065	523	749	345	0	1 447
Whole White Maize	400 000	1 897 000	1 408 000	1 049 000	1 734 000	1 400 000	926 046	547 500	473 427	546 381	809 931	544 371	1 038 909	1 121 651	734 942	1 498 654	1 269 650	1 491 687	1 180 747	119 091	1 023 692
Border Posts	400 000	1 241 000	566 000	509 000	439 000	462 000	727 989	538 128	473 427	520 200	417 327	397 657	836 596	953 736	560 540	616 837	1 158 047	1 448 121	1 062 685	119 091	797 175
Harbours	0	656 000	842 000	540 000	1 295 000	938 000	198 057	9 372	0	26 181	392 604	146 714	202 313	167 915	174 402	881 817	111 603	43 566	118 062	0	226 518
Total Demand	**5 386 000**	**7 071 000**	**6 185 000**	**7 316 000**	**7 347 000**	**6 674 000**	**5 894 959**	**6 593 438**	**4 901 270**	**4 937 990**	**7 459 528**	**6 939 999**	**6 767 508**	**7 736 560**	**8 057 886**	**8 106 537**	**8 219 954**	**6 819 997**	**6 922 894**	**1 072 388**	**7 196 885**
Unutilized Closing Stock (30 Apr)	**618 000**	**762 000**	**1 362 000**	**1 609 000**	**518 000**	**757 000**	**274 318**	**1 282 581**	**1 307 867**	**597 837**	**2 428 653**	**1 798 998**	**473 964**	**1 354 953**	**1 465 537**	**1 082 640**	**1 346 876**	**365 498**	**1 937 498**	**3 514 773**	**1 285 245**
Processed p/month	395 900	410 200	379 600	489 300	447 800	420 583	400 723	488 537	359 975	360 982	544 497	523 610	454 118	534 230	593 065	535 130	539 221	409 865	454 429	460 637	494 915
Months' stock	1.6	1.9	3.6	3.3	1.2	1.8	0.7	2.6	3.6	1.7	4.5	3.4	1.0	2.5	2.5	2.0	2.5	0.9	4.3	7.6	2.5

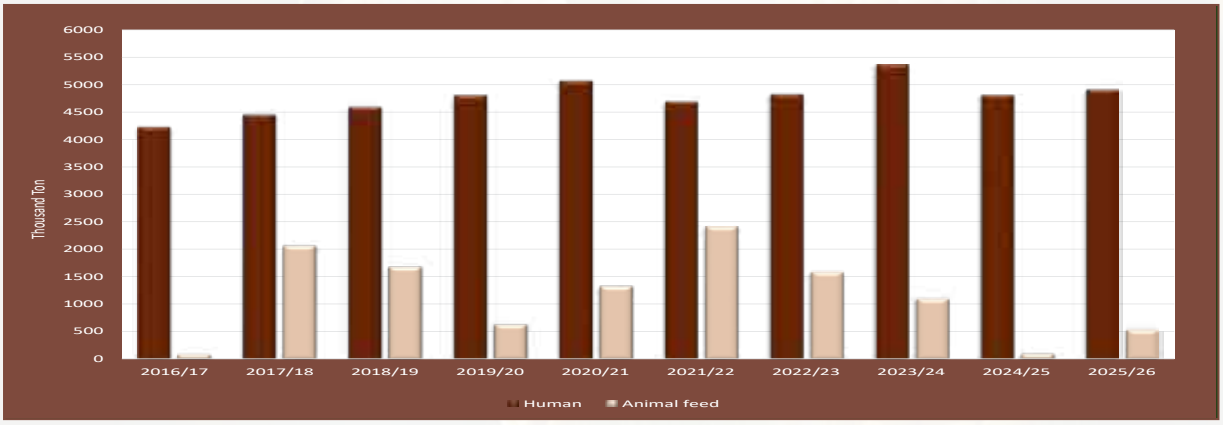
Note: *** Figures for active season up to date



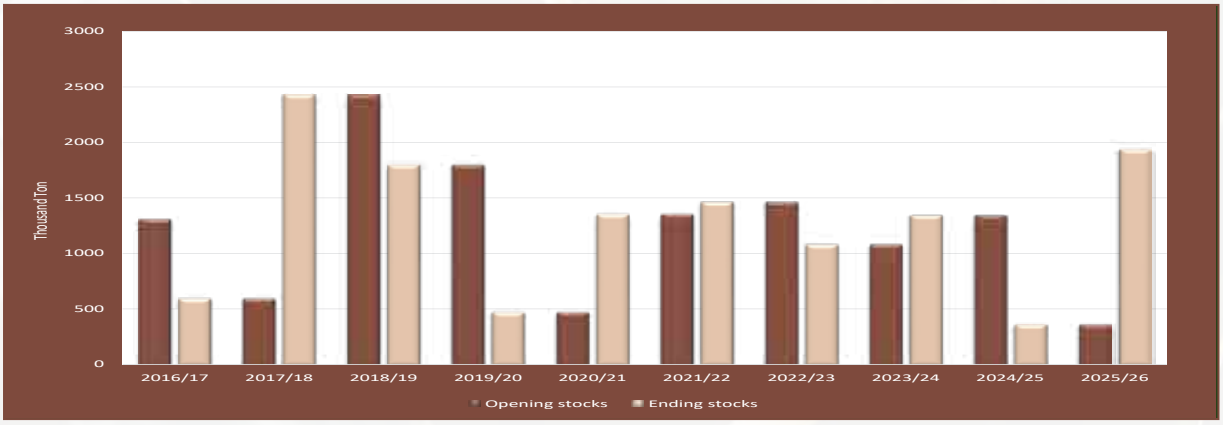
Graph 19: White Maize: CEC Estimate, Retentions and SAGIS deliveries over 10 marketing seasons



Graph 20: White Maize: Imports and exports over 10 marketing seasons



Graph 21: White Maize: RSA consumption over 10 marketing seasons



Graph 22: White Maize: Opening and ending stocks over 10 marketing seasons

Information provided by SAGIS.

Table: S3

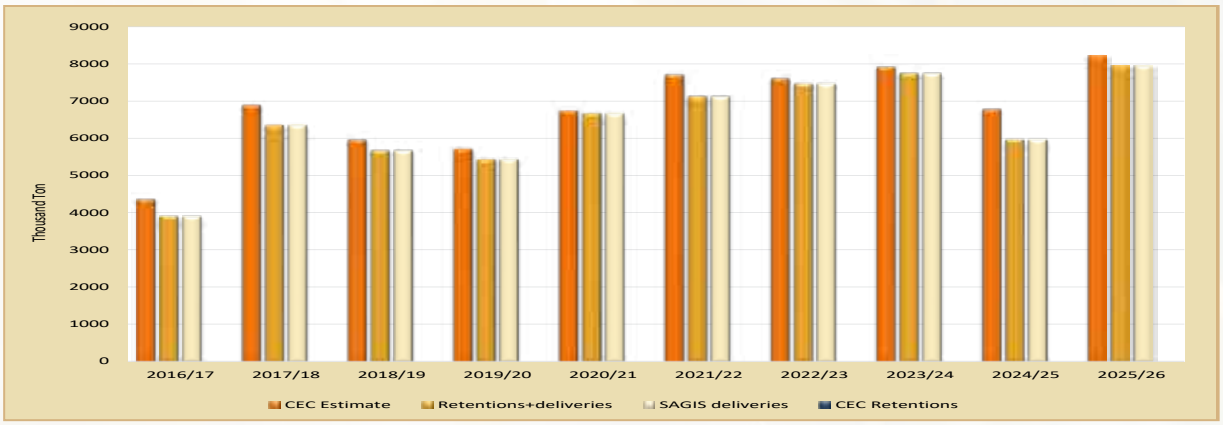
SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

YELLOW MAIZE: SUPPLY AND DEMAND TABLE BASED ON SAGIS' INFO (TON)

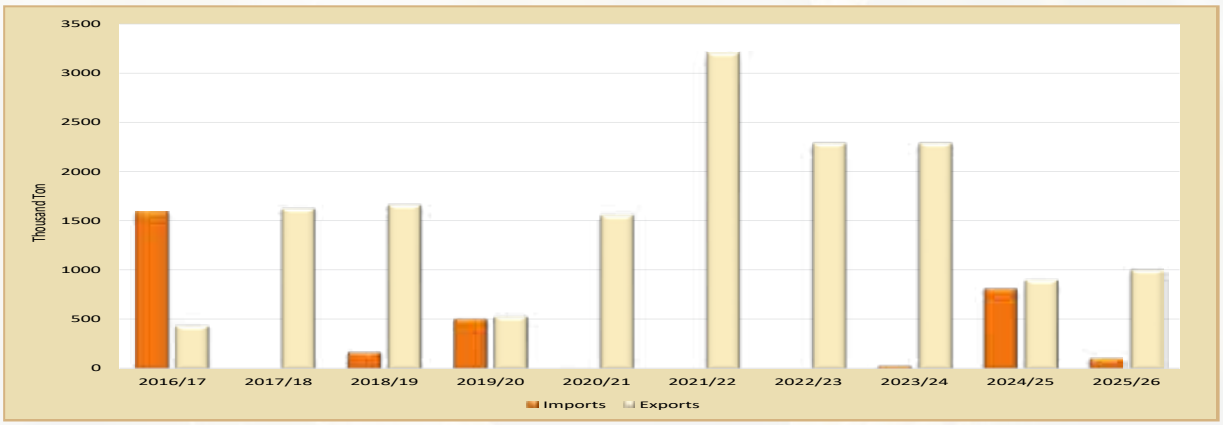
Publication date: 2026-07-24

	Marketing Season (May - Apr)																		Active Season May - Jun	10 Year average
SEASON	**2007/08**	**2008/09**	**2009/10**	**2010/11**	**2011/12**	**2012/13**	**2013/14**	**2014/15**	**2015/16**	**2016/17**	**2017/18**	**2018/19**	**2019/20**	**2020/21**	**2021/22**	**2022/23**	**2023/24**	**2024/25**	**2025/26**	**2026/27**	**2016/17-2025/26**
(Non-SAGIS Info)																				*** 2	
CEC (Crop Estimates)	*2 810 000*	*5 220 000*	*5 275 000*	*4 985 000*	*4 308 000*	*5 217 000*	*6 203 800*	*6 540 000*	*5 220 000*	*4 370 000*	*6 904 000*	*5 970 000*	*5 730 000*	*6 752 500*	*7 715 000*	*7 620 000*	*7 925 000*	*6 795 000*	*8 225 000*	*7 971 850*	*6 500 150*
CEC (Retention)	*326 000*	*434 000*	*306 000*	*408 000*	*374 000*	*319 000*	*346 900*	*400 000*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*	*0*
SUPPLY																					
Opening Stock (1 May)	440 000	431 000	819 000	769 000	727 000	476 000	660 179	314 710	791 054	1 163 200	496 801	1 260 823	864 088	526 637	761 953	658 682	871 291	1 057 664	288 292	988 289	845 219
Producer deliveries	2 573 000	4 709 000	4 892 000	4 498 000	4 235 000	5 049 000	5 649 791	6 234 739	4 986 053	3 917 778	6 360 089	5 674 911	5 444 579	6 672 649	7 131 170	7 465 688	7 749 585	5 968 332	7 943 659	3 314 448	6 137 083
Imports	1 074 000	27 000	27 000	0	288 000	0	79 682	65 250	1 862 807	1 592 599	0	171 622	509 684	463	0	0	32 844	818 165	110 448	0	498 818
Surplus	10 000	5 000	20 000	32 000	36 000	20 000	52 749	17 345	35 456	12 423	24 906	20 770	27 941	8 864	17 894	24 045	9 358	19 273	19 637	0	20 093
Total Supply	**4 097 000**	**5 172 000**	**5 758 000**	**5 299 000**	**5 286 000**	**5 545 000**	**6 442 401**	**6 632 044**	**7 675 370**	**6 686 000**	**6 881 796**	**7 128 126**	**6 846 292**	**7 208 613**	**7 911 017**	**8 148 415**	**8 663 078**	**7 863 434**	**8 362 036**	**4 302 737**	**7 501 214**
DEMAND																					
Processed for the local market	3 278 000	3 691 000	4 103 000	2 986 000	3 567 000	3 888 000	4 539 996	4 064 081	5 929 297	5 506 922	3 765 714	4 407 657	5 656 997	4 790 446	3 970 353	4 931 679	5 282 591	6 649 505	6 349 561	898 695	5 089 116
Human	257 000	326 000	346 000	356 000	393 000	404 000	463 862	478 726	515 415	576 638	533 972	566 649	578 003	583 950	474 216	560 627	577 630	610 717	682 077	114 206	557 782
Animal/industrial	3 015 000	3 358 000	3 739 000	2 613 000	3 160 000	3 474 000	4 063 370	3 571 645	5 401 726	4 917 657	3 214 798	3 829 944	5 069 241	4 201 690	3 490 822	4 364 891	4 695 782	6 027 783	5 648 769	781 766	4 521 433
Gristing	6 000	7 000	18 000	17 000	14 000	10 000	12 764	13 710	12 156	12 627	16 944	11 064	9 753	4 806	5 315	6 161	9 179	11 005	18 715	2 723	9 901
Bio-fuel	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Withdrawn by producers	110 000	162 000	210 000	159 000	96 000	102 000	116 500	87 568	63 503	80 865	67 021	51 420	43 993	25 647	22 897	13 415	4 560	2 205	2 233	0	37 553
Released to end-consumers	161 000	175 000	316 000	337 000	358 000	383 000	237 432	166 643	172 309	151 800	150 419	128 697	82 166	63 502	45 478	34 548	20 926	15 917	11 621	1 727	86 576
Net dispatches(+)/receipts(-)	14 000	22 000	41 000	22 000	8 000	34 000	10 090	7 781	24 313	10 733	8 080	8 857	2 372	3 750	2 830	2 201	1 227	2 589	969	971	6 695
Deficit	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1 337	0
Total Exports	103 000	303 000	319 000	1 068 000	781 000	478 000	1 223 673	1 514 917	322 748	438 879	1 629 739	1 667 407	534 127	1 563 315	3 210 777	2 295 281	2 296 110	904 926	1 009 363	569 598	1 486 331
Products	31 000	38 000	57 000	51 000	69 000	65 000	94 101	105 012	102 747	148 070	150 836	141 312	124 275	138 102	213 733	141 660	122 762	123 932	136 523	23 222	140 743
African Countries	11 000	10 000	29 000	22 000	39 000	39 000	51 008	59 812	59 839	107 656	77 102	71 391	84 592	100 381	173 914	93 206	73 934	79 702	99 258	17 967	92 172
Other Countries	20 000	28 000	28 000	29 000	30 000	26 000	43 093	45 200	42 908	40 414	73 734	69 921	39 683	37 721	39 819	48 454	48 828	44 230	37 265	5 255	48 571
Whole Yellow Maize	72 000	265 000	262 000	1 017 000	712 000	413 000	1 129 572	1 409 905	220 001	290 809	1 478 903	1 526 095	409 852	1 425 213	2 997 044	2 153 621	2 173 348	780 994	872 840	546 376	1 345 588
Border Posts	72 000	91 000	137 000	120 000	145 000	151 000	193 465	153 531	211 407	284 122	174 365	232 915	394 166	426 281	204 017	221 121	452 175	776 671	626 076	62 653	337 724
Harbours	0	174 000	125 000	897 000	567 000	262 000	936 107	1 254 954	8 594	6 687	1 304 538	1 293 180	15 686	998 932	2 793 027	1 932 500	1 721 173	4 323	246 764	483 723	1 007 864
Total Demand	**3 666 000**	**4 353 000**	**4 989 000**	**4 572 000**	**4 810 000**	**4 885 000**	**6 127 691**	**5 840 990**	**6 512 170**	**6 189 199**	**5 620 973**	**6 264 038**	**6 319 655**	**6 446 660**	**7 252 335**	**7 277 124**	**7 605 414**	**7 575 142**	**7 373 747**	**1 472 328**	**6 706 271**
Unutilized Closing Stock (30 Apr)	**431 000**	**819 000**	**769 000**	**727 000**	**476 000**	**660 000**	**314 710**	**791 054**	**1 163 200**	**496 801**	**1 260 823**	**864 088**	**526 637**	**761 953**	**658 682**	**871 291**	**1 057 664**	**288 292**	**988 289**	**2 830 409**	**794 943**
Processed p/month	273 200	307 600	341 900	248 800	297 300	324 000	378 333	338 673	494 108	458 910	313 810	367 305	471 416	399 204	330 863	410 973	440 216	554 125	529 130	449 348	424 093
Months' stock	1.6	2.7	2.2	2.9	1.6	2.0	0.8	2.3	2.4	1.1	4.0	2.4	1.1	1.9	2.0	2.1	2.4	0.5	1.9	6.3	2.0

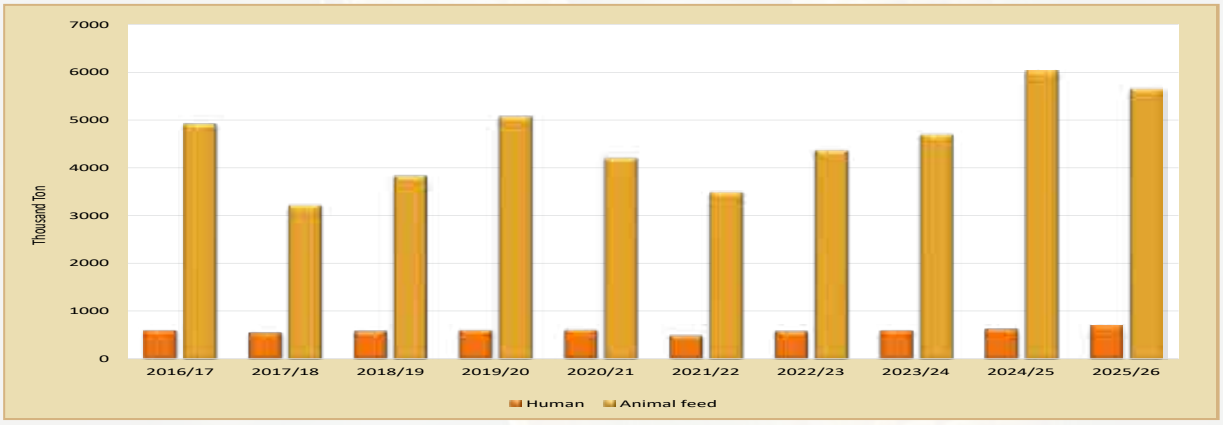
Note: * Figures for active season up to date**



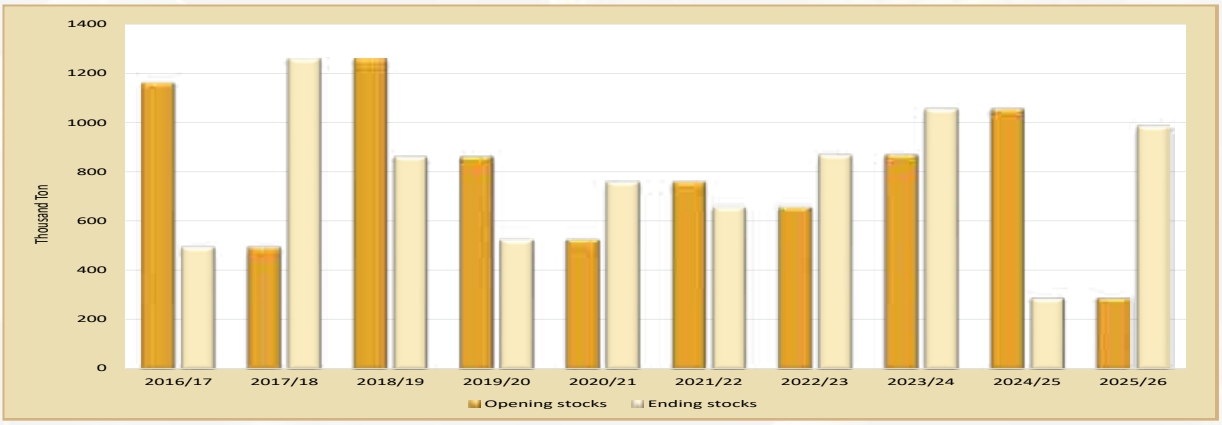
Graph 23: Yellow Maize: CEC Estimate, Retentions and SAGIS deliveries over 10 marketing seasons



Graph 24: Yellow Maize: Imports and exports over 10 marketing seasons



Graph 25: Yellow Maize: RSA consumption over 10 marketing seasons



Graph 26: Yellow Maize: Opening and ending stocks over 10 marketing seasons

Information provided by SAGIS.

Table: S4

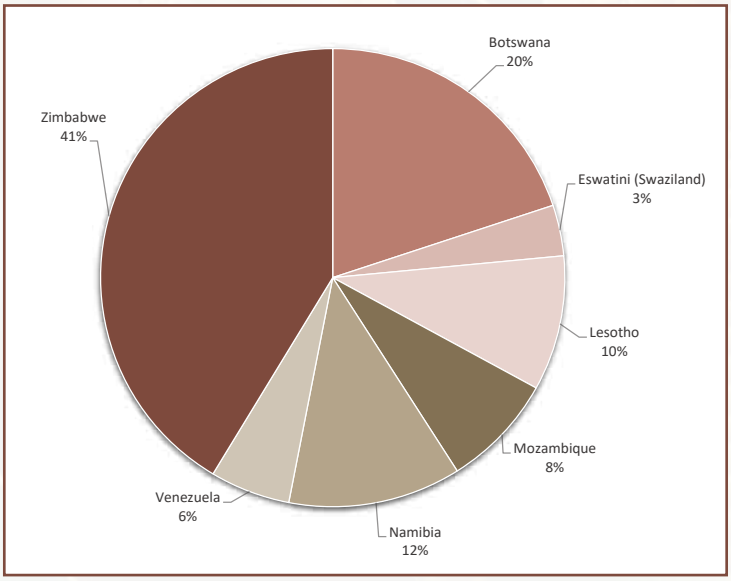
SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM

WHITE MAIZE EXPORTS/IMPORTS (Tons)

2025/26 MARKETING SEASON (26 Apr 2025 - 24 April 2026)

RSA EXPORTS		IMPORTS FOR RSA		IMPORTS FOR OTHER COUNTRIES		EXPORTS OF IMPORTED MAIZE		IMPORTS PER HARBOUR		EXPORTS PER HARBOUR	
To Country	Tons	From Country	Tons	From Country	Tons	To Country	Tons	Harbour	Tons	Harbour	Tons
Botswana	234 865	-	-	-	-	Lesotho	996	-	-	Durban	118 062
Eswatini (Swaziland)	42 360	-	-	-	-	Zimbabwe	667	-	-	-	-
Lesotho	112 397	-	-	-	-	-	-	-	-	-	-
Mozambique	94 357	-	-	-	-	-	-	-	-	-	-
Namibia	142 251	-	-	-	-	-	-	-	-	-	-
Venezuela	66 001	-	-	-	-	-	-	-	-	-	-
Zimbabwe	488 516	-	-	-	-	-	-	-	-	-	-
Total	**1 180 747**	**Total**	**0**	**Total**	**0**	**Total**	**1 663**	**Total***	**0**	**Total**	**118 062**

** Includes: Imports for RSA and Other Countries*



Graph 27: Major desinations for RSA white maize exported during the 2025/26 marketing season

Table: S5

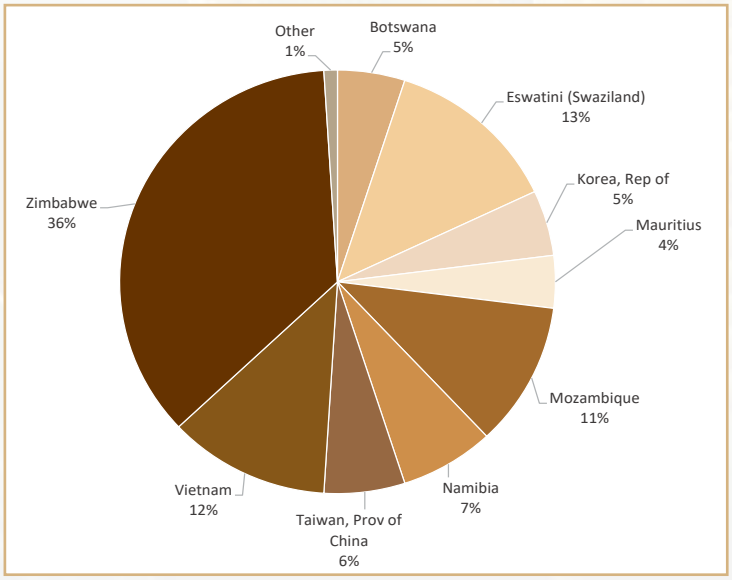
SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM

YELLOW MAIZE EXPORTS/IMPORTS (Tons)

2025/26 MARKETING SEASON (26 Apr 2025 - 24 April 2026)

RSA EXPORTS		IMPORTS FOR RSA		IMPORTS FOR OTHER COUNTRIES		EXPORTS OF IMPORTED MAIZE		IMPORTS PER HARBOUR		EXPORTS PER HARBOUR	
To Country	Tons	From Country	Tons	From Country	Tons	To Country	Tons	Harbour	Tons	Harbour	Tons
Botswana	42 769	Argentina	110 448	-	-	-	-	Cape Town	100 423	Durban	246 764
Eswatini (Swaziland)	111 318	-	-	-	-	-	-	Port Elizabeth	10 025	-	-
France	480	-	-	-	-	-	-	-	-		
Korea, Rep of	47 633	-	-	-	-	-	-	-	-		
Lesotho	1 876	-	-	-	-	-	-	-	-	-	-
Madagascar	1 330	-	-	-	-	-	-	-	-	-	-
Mauritius	33 013	-	-	-	-	-	-	-	-		
Mozambique	92 853	-	-	-	-	-	-	-	-	-	-
Namibia	59 500	-	-	-	-	-	-	-	-	-	-
Sri Lanka	4 933	-	-	-	-	-	-	-	-	-	-
Taiwan, Prov of China	50 255	-	-	-	-	-	-	-	-		
Vietnam	109 120	-	-	-	-	-	-	-	-	-	-
Zimbabwe	317 760	-	-	-	-	-	-	-	-	-	-
Total	**872 840**	**Total**	**110 448**	**Total**	**0**	**Total**	**0**	**Total***	**110 448**	**Total**	**246 764**

** Includes: Imports for RSA and Other Countries*



Graph 28: Major desinations for RSA yellow maize exported during the 2025/26 marketing season

TABLE 2: QUALITY OF YELLOW MAIZE IMPORTED FROM ARGENTINA FOR THE PERIOD 1 MAY 2025 TO 30 APRIL 2026

Country of origin	Argentina				RSA Crop Quality Average 2024/2025			
Class and Grade Yellow maize	**YM1**	**YM2**	**YM3**	**Average**	**YM1**	**YM2**	**YM3**	**Average**
RSA Grading								
Defective kernels above 6.35mm screen, %	2.9	3.8	5.5	3.4	3.0	7.8	13.3	4.7
Defective kernels below 6.35mm screen, %	3.1	4.5	4.9	3.6	1.7	2.8	5.2	2.1
Total defective kernels, %	6.0	8.3	10.4	7.0	4.7	10.6	18.5	6.9
Other colour maize kernels %	0.0	0.0	0.0	0.0	0.0	0.2	0.4	0.1
Foreign matter, % (all matter other than maize, glass, stone, coal, dung or metal)	0.1	0.1	0.7	0.1	0.0	0.1	0.3	0.1
Combined deviation, %	6.2	8.4	11.1	7.1	4.8	10.8	19.2	7.1
No. of samples	***11***	***5***	***1***	***17***	***371***	***119***	***18***	***542***
USA Grading factors according to RSA grades								
Heat damaged kernels, %	0.1	0.1	0.0	0.1	0.0	0.1	0.0	0.0
Total damaged kernels, %	3.0	4.0	5.9	3.5	4.9	10.1	16.4	6.7
Broken corn and foreign material, %	1.2	2.0	2.8	1.6	0.4	1.0	1.8	0.7
No. of samples	***11***	***5***	***1***	***17***	***371***	***119***	***18***	***542***
Physical Quality Characteristics								
100 Kernel mass, g (as is)	32.0	32.3	31.2	32.0	34.2	32.8	31.0	33.7
Stress cracks, %	5	7	5	6	3	5	5	4
Milling Index	83	84	75	83	73	72	69	72
Grit Yield	66	66	64	66	63	63	62	63
Test weight, kg/hl	76.1	75.8	74.7	75.9	76.1	75.9	74.7	75.9
No. of samples	***11***	***5***	***1***	***17***	***371***	***119***	***18***	***542***
Kernel size								
% above 10 mm	4.3	5.5	4.6	4.7	12.0	9.2	12.1	11.2
% above 8 mm	61.4	58.7	63.1	60.7	63.8	61.6	56.8	63.1
% below 8 mm	34.3	35.9	32.3	34.7	24.2	29.2	31.1	25.6
No. of samples	***11***	***5***	***1***	***17***	***371***	***119***	***18***	***542***
Breakage susceptibility								
% below 6.35 mm	36.3	19.9	0.6	29.4	0.9	1.1	1.8	1.1
% below 4.75 mm	0.3	0.5	0.6	0.4	0.7	0.8	1.1	0.8
No. of samples	***11***	***5***	***1***	***17***	***371***	***119***	***18***	***542***
Nutritional Factors								
Protein, %(db)	9.2	9.1	8.7	9.1	8.8	8.8	8.7	8.8
Fat, %(db)	4.1	4.2	4.2	4.1	4.0	3.9	3.7	3.9
Starch, %(db)	72.7	71.9	71.3	72.4	73.6	73.5	73.5	73.6
Crude fibre, % (db)	2.3	2.4	1.9	2.3	2.2	2.2	2.2	2.2
No. of samples	***11***	***5***	***1***	***17***	***371***	***119***	***18***	***542***

Mycotoxins (µg/kg)	Average of positive results	Number of positivie results	Average of positive results	Number of positivie results
Aflatoxin B_1 [max. value]	0 [0]	*0*	0 [0]	*0*
Aflatoxin B_2 [max. value]	0 [0]	*0*	0 [0]	*0*
Aflatoxin G_1 [max. value]	0 [0]	*0*	0 [0]	*0*
Aflatoxin G_2 [max. value]	0 [0]	*0*	0 [0]	*0*
Fumonisin B_1 [max. value]	2535 [3217]	*4*	642 [2864]	*64*
Fumonisin B_2 [max. value]	999 [1906]	*4*	264 [915]	*47*
Fumonisin B_3 [max. value]	199 [226]	*4*	95 [239]	*30*
Deoxynivalenol [max. value]	246 [346]	*4*	972 [5919]	*168*
15-ADON [max. value]	0 [0]	*0*	229 [866]	*116*
Ochratoxin A [max. value]	0 [0]	*0*	0 [0]	*0*
Zearalenone [max. value]	25 [36]	*3*	90 [543]	*109*
HT2 [max. value]	0 [0]	*0*	0 [0]	*0*
T2 [max. value]	0 [0]	*0*	0 [0]	*0*
No. of samples	***4***		***190***	

SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

Table: S6

TOTAL WHOLE MAIZE PROCESSED PER PROVINCE

PROGRESSIVE: May 2021 to April 2022 (2021/22 Full Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	251 947	1 859 544	329 889	756 717	356 859	1 013 953	964 240	5 533 149
Animal Feed and Industrial	1 378 107	825 703	669 153	829 215	206 236	1 430 940	617 849	5 957 203
	1 630 054	**2 685 247**	**999 042**	**1 585 932**	**563 095**	**2 444 893**	**1 582 089**	**11 490 352**

PROGRESSIVE: May 2022 to April 2023 (2022/23 Full Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	247 314	1 893 287	377 519	813 357	361 295	1 011 617	937 033	5 641 422
Animal Feed and Industrial	1 390 758	738 973	703 096	835 790	196 505	1 538 652	605 575	6 009 349
	1 638 072	**2 632 260**	**1 080 615**	**1 649 147**	**557 800**	**2 550 269**	**1 542 608**	**11 650 771**

PROGRESSIVE: May 2023 to April 2024 (2023/24 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	308 944	2 137 863	397 062	1 101 395	387 983	974 689	1 168 142	6 476 078
Animal Feed and Industrial	1 412 698	750 297	773 965	674 710	212 729	1 407 245	633 567	5 865 211
	1 721 642	**2 888 160**	**1 171 027**	**1 776 105**	**600 712**	**2 381 934**	**1 801 709**	**12 341 289**

PROGRESSIVE: May 2024 to April 2025 (2024/25 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	290 427	1 961 946	308 341	980 564	331 793	843 105	1 172 906	5 889 082
Animal Feed and Industrial	1 456 009	793 110	832 871	645 673	222 070	1 580 975	673 940	6 204 648
	1 746 436	**2 755 056**	**1 141 212**	**1 626 237**	**553 863**	**2 424 080**	**1 846 846**	**12 093 730**

PROGRESSIVE: May 2025 to April 2026 (2025/26 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	347 157	2 115 284	220 311	1 031 305	324 810	780 256	1 141 490	5 960 613
Animal Feed and Industrial	1 511 040	866 433	843 288	622 868	227 648	1 474 864	704 701	6 250 842
	1 858 197	**2 981 717**	**1 063 599**	**1 654 173**	**552 458**	**2 255 120**	**1 846 191**	**12 211 455**

** Please note that included are the products destined for exports*

Table: S7

SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

WHOLE WHITE MAIZE PROCESSED PER PROVINCE

PROGRESSIVE: May 2021 to April 2022 (2021/22 Full Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	232 143	1 624 113	297 523	587 693	356 235	851 718	949 792	4 899 217
Animal Feed and Industrial	818 947	345 380	133 466	75 175	34 861	463 682	535 538	2 407 049
	1 051 090	**1 969 493**	**430 989**	**662 868**	**391 096**	**1 315 400**	**1 485 330**	**7 306 266**

PROGRESSIVE: May 2022 to April 2023 (2022/23 Full Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	225 342	1 681 418	337 216	633 211	360 924	832 565	923 425	4 994 101
Animal Feed and Industrial	518 034	245 440	57 790	6 407	1 304	324 320	430 036	1 583 331
	743 376	**1 926 858**	**395 006**	**639 618**	**362 228**	**1 156 885**	**1 353 461**	**6 577 432**

PROGRESSIVE: May 2024 to April 2025 (2024/25 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	264 154	1 728 520	238 463	719 111	331 793	772 809	1 168 186	5 223 036
Animal Feed and Industrial	3 775	10 794	2 348	0	0	72 465	7 875	97 257
	267 929	**1 739 314**	**240 811**	**719 111**	**331 793**	**845 274**	**1 176 061**	**5 320 293**

PROGRESSIVE: May 2024 to April 2025 (2024/25 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	264 154	1 728 520	238 463	719 111	331 793	772 809	1 168 186	5 223 036
Animal Feed and Industrial	3 775	10 794	2 348	0	0	72 465	7 875	97 257
	267 929	**1 739 314**	**240 811**	**719 111**	**331 793**	**845 274**	**1 176 061**	**5 320 293**

PROGRESSIVE: May 2025 to April 2026 (2025/26 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	322 207	1 859 629	133 205	714 655	324 810	703 326	1 134 901	5 192 733
Animal Feed and Industrial	113 592	180 900	4 833	2 545	1 876	92 451	136 441	532 638
	435 799	**2 040 529**	**138 038**	**717 200**	**326 686**	**795 777**	**1 271 342**	**5 725 371**

** Please note that included are the products destined for exports*

SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

Table: S8

WHOLE YELLOW MAIZE PROCESSED PER PROVINCE

PROGRESSIVE: May 2021 to April 2022 (2021/22 Full Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	19 804	235 431	32 366	169 024	624	162 235	14 448	633 932
Animal Feed and Industrial	559 160	480 323	535 687	754 040	171 375	967 258	82 311	3 550 154
	578 964	**715 754**	**568 053**	**923 064**	**171 999**	**1 129 493**	**96 759**	**4 184 086**

PROGRESSIVE: May 2022 to April 2023 (2022/23 Full Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	21 972	211 869	40 303	180 146	371	179 052	13 608	647 321
Animal Feed and Industrial	872 724	493 533	645 306	829 383	195 201	1 214 332	175 539	4 426 018
	894 696	**705 402**	**685 609**	**1 009 529**	**195 572**	**1 393 384**	**189 147**	**5 073 339**

PROGRESSIVE: May 2023 to April 2024 (2023/24 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	22 507	227 458	62 885	249 698	0	62 817	11 735	637 100
Animal Feed and Industrial	1 002 563	539 992	743 824	674 211	208 146	1 226 886	372 631	4 768 253
	1 025 070	**767 450**	**806 709**	**923 909**	**208 146**	**1 289 703**	**384 366**	**5 405 353**

PROGRESSIVE: May 2024 to April 2025 (2024/25 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	26 273	233 426	69 878	261 453	0	70 296	4 720	666 046
Animal Feed and Industrial	1 452 234	782 316	830 523	645 673	222 070	1 508 510	666 065	6 107 391
	1 478 507	**1 015 742**	**900 401**	**907 126**	**222 070**	**1 578 806**	**670 785**	**6 773 437**

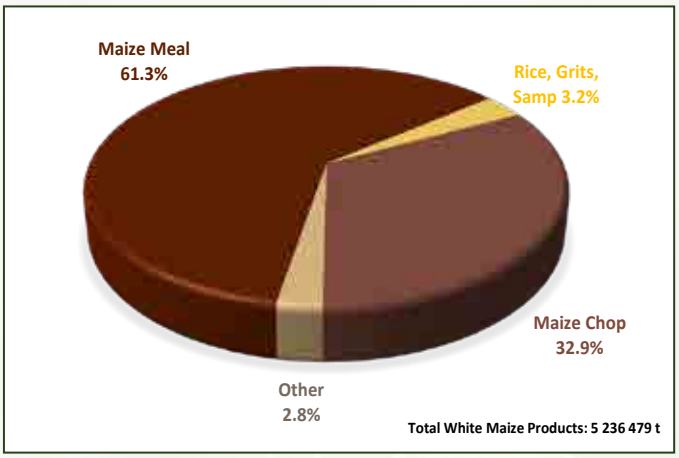
PROGRESSIVE: May 2025 to April 2026 (2025/26 Marketing Year)

Processed For	Cape Provinces	Free State	Kwazulu-Natal	Mpumalanga	Limpopo	Gauteng	Northwest	Total
Human Consumption and Gristing	24 950	255 655	87 106	316 650	0	76 930	6 589	767 880
Animal Feed and Industrial	1 397 448	685 533	838 455	620 323	225 772	1 382 413	568 260	5 718 204
	1 422 398	**941 188**	**925 561**	**936 973**	**225 772**	**1 459 343**	**574 849**	**6 486 084**

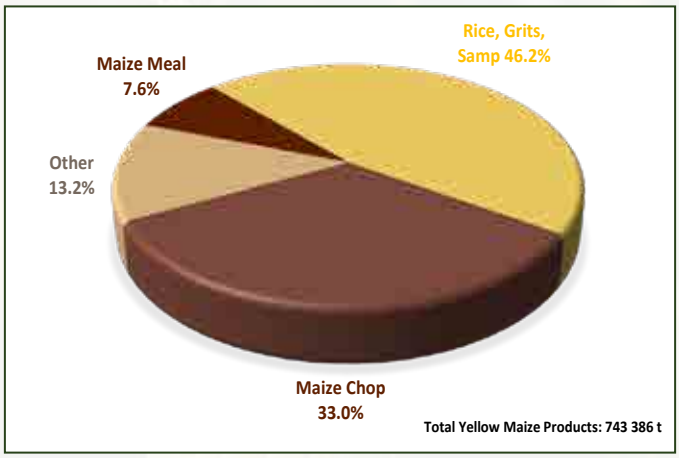
** Please note that included are the products destined for exports*

SAGIS Maize Product Information

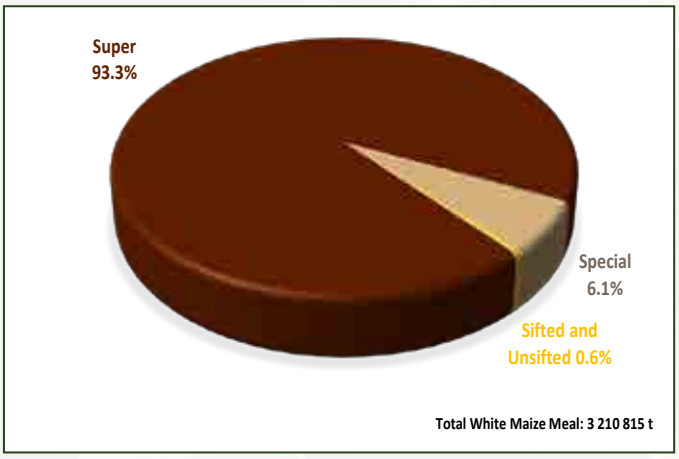
Please see graphs 29 to 32 (compiled from Table S9) below for an overview of the white and yellow maize products as well as white and yellow maize meal manufactured for the period May 2025 to April 2026. The tables on pages 22 to 24 provide a summary of the figures for maize products manufactured, imported and exported during the previous three marketing seasons (May to April).



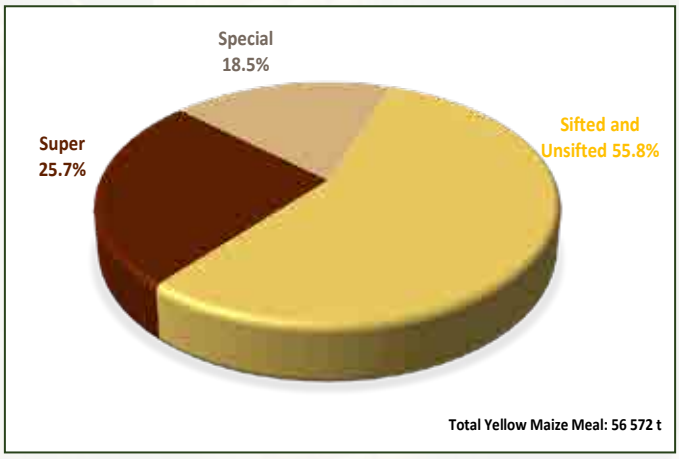
Graph 29: White maize products manufactured from May 2025 to April 2026



Graph 30: Yellow maize products manufactured from May 2025 to April 2026



Graph 31: White maize meal manufactured from May 2025 to April 2026



Graph 32: Yellow maize meal manufactured from May 2025 to April 2026

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Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

Table: S9

MAIZE PRODUCTS MANUFACTURED PER MARKETING YEAR

	Marketing year: May 2023 - Apr 2024 Manufactured Tons Progressive: 12 Months			Marketing year: May 2024 - Apr 2025 Manufactured Tons Progressive: 12 Months			Marketing year: May 2025 - Apr 2026 Manufactured Tons Progressive: 12 Months		
	White Maize	Yellow Maize	Total Maize	White Maize	Yellow Maize	Total Maize	White Maize	Yellow Maize	Total Maize
Maize Chop	1 909 269	200 829	2 110 098	1 656 947	197 250	1 854 197	1 720 250	245 368	1 965 618
Maize Rice	5 883	*	5 883	4 643	*	4 643	4 991	*	4 991
Maize Grits	77 617	*	77 617	51 178	*	51 178	51 744	*	51 744
Samp	111 556	*	111 556	96 657	*	96 657	113 843	*	113 843
**** Total Yellow Maize Rice / Maize Grits / Samp***		***299 683***	***299 683***		***310 317***	***310 317***		***343 168***	***343 168***
Sifted Maize Meal	19 898	30 016	49 914	18 821	29 826	48 647	18 533	31 551	50 084
Special Maize Meal	287 553	884	288 437	224 779	1 895	226 674	195 943	10 458	206 401
Super Maize Meal	3 268 041	15 335	3 283 376	3 057 913	17 380	3 075 293	2 994 637	14 553	3 009 190
Unsifted Maize Meal	30	9	39	14	13	27	1 702	10	1 712
Other maize products intended for Human consumption	145 264	81 444	226 708	145 952	95 560	241 512	134 836	98 278	233 114
Total	***5 825 111***	***628 200***	***6 453 311***	***5 256 904***	***652 241***	***5 909 145***	***5 236 479***	***743 386***	***5 979 865***

** Included total for yellow rice, grits and samp*

SAGIS South African Grain Information Service NPC
Suid Afrikaanse Graaninligtingsdiens NWM
Reg no. 1997/019186/08

Table: S10

MAIZE PRODUCTS IMPORTED PER MARKETING YEAR

	Marketing year: May 2023 - Apr 2024 Imported Tons Progressive: 12 Months			Marketing year: May 2024 - Apr 2025 Imported Tons Progressive: 12 Months			Marketing year: May 2025 - Apr 2026 Imported Tons Progressive: 12 Months		
	White Maize	Yellow Maize	Total Maize	White Maize	Yellow Maize	Total Maize	White Maize	Yellow Maize	Total Maize
Maize Chop	6 419	0	6 419	8 595	0	8 595	4 783	0	4 783
Maize Rice	0	*	0	0	*	0	0	*	0
Maize Grits	0	*	0	0	*	0	0	*	0
Samp	0	*	0	0	*	0	0	*	0
**** Total Yellow Maize Rice / Maize Grits / Samp***		***0***	***0***		***0***	***0***		***0***	***0***
Sifted Maize Meal	0	0	0	0	0	0	0	0	0
Special Maize Meal	2 692	0	2 692	1 997	0	1 997	1 909	0	1 909
Super Maize Meal	302	0	302	587	0	587	64	0	64
Unsifted Maize Meal	0	0	0	0	0	0	0	0	0
Other maize products intended for Human consumption	0	0	0	0	0	0	0	0	0
Total	***9 413***	***0***	***9 413***	***11 179***	***0***	***11 179***	***6 756***	***0***	***6 756***

** Included total for yellow rice, grits and samp*

SAGIS South African Grain Information Service NPC
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Reg no. 1997/019186/08

Table: S11

MAIZE PRODUCTS EXPORTED PER MARKETING YEAR

	Marketing year: May 2023 - Apr 2024 Exported Tons Progressive: 12 Months			Marketing year: May 2024 - Apr 2025 Exported Tons Progressive: 12 Months			Marketing year: May 2025 - Apr 2026 Exported Tons Progressive: 12 Months		
	White Maize	Yellow Maize	Total Maize	White Maize	Yellow Maize	Total Maize	White Maize	Yellow Maize	Total Maize
Maize Chop	162	0	162	116	0	116	60	0	60
Maize Rice	27	*	27	61	*	61	49	*	49
Maize Grits	459	*	459	453	*	453	677	*	677
Samp	2 218	*	2 218	1 550	*	1 550	3 091	*	3 091
**** Total Yellow Maize Rice / Maize Grits / Samp***		***26 253***	***26 253***		***25 536***	***25 536***		***29 915***	***29 915***
Sifted Maize Meal	257	3 738	3 995	0	2 187	2 187	0	7 500	7 500
Special Maize Meal	50 313	0	50 313	24 233	0	24 233	8 797	9 049	17 846
Super Maize Meal	260 323	1 378	261 701	247 642	3 237	250 879	175 868	703	176 571
Unsifted Maize Meal	0	0	0	699	0	699	0	0	0
Other maize products intended for Human consumption	26 728	9 211	35 939	17 705	3 596	21 301	5 203	3 467	8 670
Total	***340 487***	***40 580***	***381 067***	***292 459***	***34 556***	***327 015***	***193 745***	***50 634***	***244 379***

** Included total for yellow rice, grits and samp*

Maize Crop Quality 2024/25 - summary of results

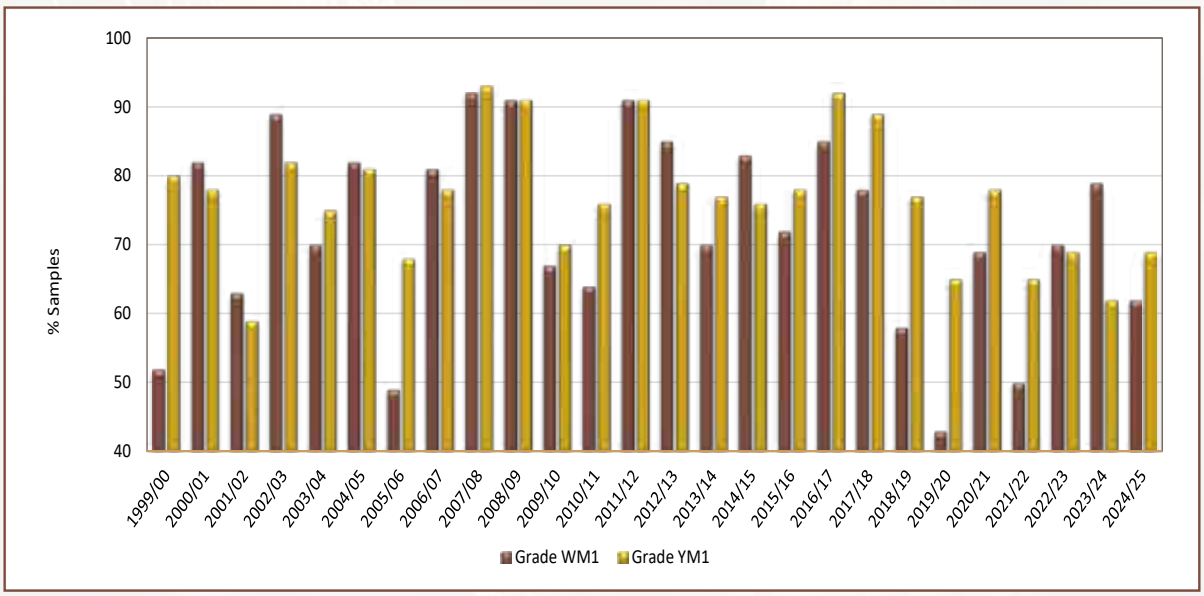
The weighted average quality results per class and grade per colour are summarised in Table 3 on page 28.

Table 4 on page 29 provides a comparison of the weighted average results of the main maize producing provinces, namely the Free State, Mpumalanga and North West during the 2024/25 production season.

RSA Grading

The latest maize grading regulations were published in Government Notices No. R. 4368 of 16 February 2024 and No. R. 4433 of 1 March 2024. This is the second annuall maize crop survey where samples were graded according to these regulations.

62% of white maize samples received for the purpose of the crop quality survey were graded as maize grade one (WM1), last season this figure was 79%. 69% of yellow maize samples received and graded were graded as grade one (YM1), compared to 62% the previous season. Graph 33 provides an overview of the percentages of maize graded as WM1 and YM1, since commencement of the annual maize crop quality survey in 1998.

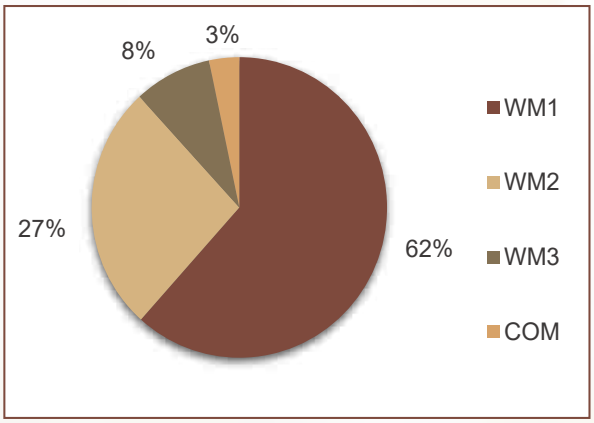


Graph 33: Percentage samples graded as Grade 1 over seasons

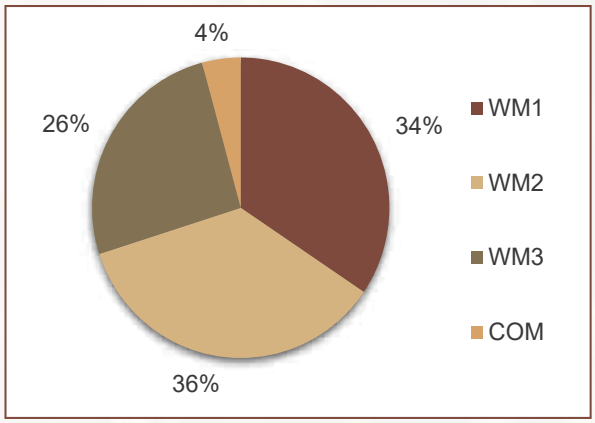
For comparison purposes, the samples were also graded according to the previous grading regulations as published in Government Notice No. R.473 of 8 May 2009. The percentages of samples per Class and grade according to the current as well as the previous grading regulations were determined. Please refer to Graphs 34 and 35 for the percentages of samples per Class and grade white maize as well as Graphs 36 and 37 for the percentages of samples per Class and grade yellow maize.

The average percentage total defective white maize kernels above (larger than) and below (smaller than) the 6.35 mm sieve increased by 2.5% to 6.0% compared to the previous season. The percentage defective kernels above the sieve increased by 3.4% on average, while the percentage defective kernels below the sieve decreased by 0.8%.

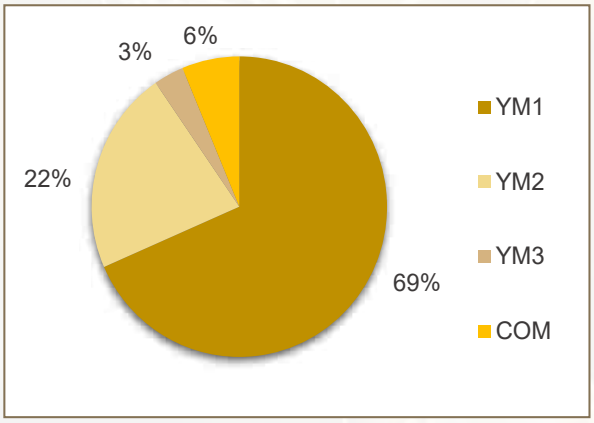
The average percentage total defective yellow maize kernels above the 6.35 mm sieve increased by 3.1% to 4.7%. Defective yellow kernels below the 6.35 mm sieve, decreased by 2.2% to 2.1%.



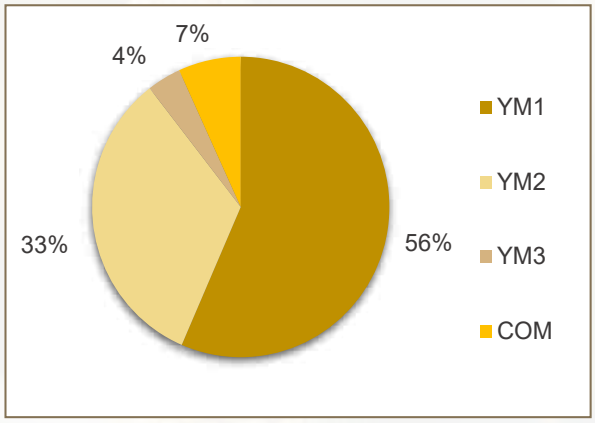
Graph 34: White maize - Percentage of samples per Class and grade according to the current grading regulations



Graph 35: White maize - Percentage of samples per Class and grade according to the previous grading regulations



Graph 36: Yellow maize - Percentage of samples per Class and grade according to the current grading regulations



Graph 37: Yellow maize - Percentage of samples per Class and grade according to the previous grading regulations

The average percentage Diplodia infected kernels this season was 1.5% in the white and 1.7% in the yellow maize samples. The previous season's averages were 0.2% and 0.3% respectively. Visual Fusarium infection on white maize kernels increased from 0.7% to 2.5% and in yellow maize from 1.2% to 2.6%.

The percentage white maize samples downgraded to Class Other maize due to foreign matter exceeding 0.75%, was 3% (13 samples) and that of yellow maize 4% (19 samples). None of the white maize samples were downgraded to class other due to other colour maize exceeding the 10% maximum permissible deviation for grade 3 white maize. One yellow maize sample was downgraded to class other due to the percentage other colour maize exceeding 5%.

Foreign matter, other colour maize kernels and defective kernels (above and below the 6.35 mm sieve) are reported collectively. The average percentage for white maize increased from 3.8% last season to 6.4% this season. Yellow maize also showed an increase from 5.3% to 7.1%.

The grading results of white and yellow maize according to the South African grading regulations are provided in Tables 5 to 8 (per grade and colour) and Tables 9 and 10 (per province) on pages 37 to 41.

Table 11 and Graphs 38 to 40 on pages 42 and 43 show the results over 10 seasons.

USA Grading

Of the 1 000 maize samples graded according to USA grading regulations, 21% were graded US1, 18% US2, 16% US3, 15% US4, 16% US5, 11% Sample grade and 3% Mixed grade. The percentage

samples graded as US1 varies substantially over seasons, varying from 59% (2023/24 and 2022/23) to 27% (2021/22), 62% (2020/21) and 30% (2019/20). The percentages samples graded as US Grades 2, 3, 4, 5, Sample as well Mixed grade were notably higher than in the previous seasons. The main reason for downgrading the samples was (as in previous seasons) the percentage total damaged kernels exceeding the maximum limit per grade, followed by broken corn and foreign material. Please see Tables 12 and 13 on pages 44 and 45 for USA grading results per grade as well as Tables 14 and 15 on page 46 for the results reported per province.

Physical Quality characteristics

Bushel weight/Test weight is applied as a grading factor in the USA grading regulations and is also routinely done at most intake points locally for stock verification purposes. White maize had an average test weight of 76.7 kg/hl compared to the 75.9 kg/hl of yellow maize. The average test weights of white and yellow maize were respectively 0.5 kg/hl and 0.2 kg/hl higher than in the previous season. The test weight in total varied from 66.0 kg/hl to 82.7 kg/hl.

Of the 38 samples (3.8%) that reported Bushel weight values below the minimum requirement (56.0 lbs or 72.1 kg/hl) for USA grade 1 maize, three originated in North West, five in Gauteng and 15 each in Mpumalanga and the Free State production regions. In the previous season, 5.6% of the samples were below the minimum requirement.

The 100 kernel mass ("as is" basis) of white maize was 36.8 g (31.4 g in 2023/24) and averaged higher than yellow maize's 33.7 g (last season 28.7 g). This trend towards higher white maize values is also observed in previous seasons.

The percentage white maize kernels above the 10 mm sieve increased by 8.3% to 27.1% compared to the 18.8% of the previous season. The percentage yellow maize kernels above the 10 mm sieve also increased from 5.8% last season to 11.2% this season. The percentage yellow maize kernels above the 10 mm sieve were on average 15.9% lower than white kernels and the percentage yellow kernels below the 8 mm sieve 15.1% higher than that of white maize. Overall, yellow maize kernels remain smaller than white maize kernels as observed over time.

The percentages maize below the 6.35 mm and 4.75 mm sieves provides an indication of the breakage susceptibility. The lower the percentage below the sieve, the less susceptible is the sample to breakage. The breakage susceptibility values for both white and yellow maize were equal to the previous season. The percentage stress cracks observed varied overall from 0 to 29% and averaged 4%. Yellow maize also averaged 4%, while white maize averaged 5%, both similar to the previous season.

Refer to Tables 18 to 21 on pages 48 to 51 for the physical quality characteristics of white and yellow maize per grade. Table 22 and Graphs 41 to 45 on pages 52 and 53 provides the physical quality characteristics over 10 seasons. Tables 23 and 24 and Graphs 46 to 49 on pages 54 and 55 present the physical characteristics per province.

The milling index obtained from the SAGL Milling Index 2025 model, varied from an average of 78 for white maize (73 in 2023/24) to an average of 72 for yellow maize (76 in 2023/24). Grit Yield (GYA) values averaged 64 for white and 63 for yellow maize this season, both equal to the previous season. The development of the new model for Milling Index commenced in the 2012/13 season. Please refer to pages 93 and 94, Milling Index, in the Methods section of the report.

Roff milling and whiteness index (WI)

201 of the white maize samples were milled on the Roff laboratory mill this season. The average percentage extraction of total meal in white maize obtained with the Roff mill, averaged 76.4% (0.9% higher than the previous season) and varied from 71.7% to 84.2%. Please see Graphs 50 to 55 on page 58 for a comparison of the different fractions' percentages as well as the percentage total meal extraction obtained on the Roff mill for the last ten seasons.

The whiteness index averaged 31.1 for unsifted and 28.9 for sifted maize meal. The whiteness index of the previous season averaged 40.4 and 38.4 for unsifted and sifted maize meal respectively. Sieving the sample eliminates differences in the readings as a result of particle size. Finer particles appear whiter due to the increased surface area that increases light scattering. Larger particles allow light to penetrate deeper, where some colours are absorbed or trapped, causing the sample to appear darker or more coloured.

Higher WI values represent whiter maize meal samples. The main contributing factors causing differences in WI values are the presence of other colour maize like yellow maize, the presence of defective kernels, the type of cultivar as well as the soil composition. Please see Tables 25, 26 and 27 on pages 56 and 57.

Bühler MCKA milling and whiteness index (WI)

This is the second season that white maize was milled on the Bühler MCKA maize mill. Prior to milling, the samples were degermed using the Grainman degerminator. 456 white maize samples were milled on the Bühler MCKA mill. The average % extraction of all meal fractions was 77.3% and ranged from 63.8% to 89.1%.

The whiteness index of the flour obtained from the MCKA mill averaged 14.5 for unsifted and 13.2 for sifted maize meal. The difference in whiteness index results between the two mills can be ascribed to particle size differences, with the Bühler MCKA mill producing meal with larger particle sizes than the Roff mill. Please see Table 28 (results per grade), Table 29 (results per province) and Table 30 (results per region) on pages 59 to 61.

Nutritional Values

The fat, starch, protein and crude fibre nutritional components are reported as % (g/100 g) on a dry base.

Please refer to Tables 31 to 33 on pages 63 to 65 for the nutritional results per grade and colour. Table 34 on page 66 and Graphs 56 to 59 on page 67 provide the results over a 10-season period. The nutritional values per province are provided in Tables 35 and 36 on page 68.

The average fat content of white maize was 4.0% this season and that of yellow maize 3.9%. Both averaged 3.9% the previous season as well as 4.0% for the 10-year average.

The average starch content of white maize was 74.0%, slightly lower than the 74.3% of the previous season. Yellow maize averaged 0.4% lower than white maize and compared well with the 73.5% of the previous season. Ten-year averages for white and yellow maize are 74.2% and 73.4% respectively.

The average crude fibre contents of white and yellow maize were 2.1% and 2.2% respectively this season. Both averaged 2.2% last season.

Mycotoxins

A discussion of the mycotoxin results obtained per region over the last 15 seasons, is provided on pages 69 to 89.

A table with the limit of quantification (LOQ) for each of the mycotoxins analysed is provided on page 95 under Methods.

See also page 90 for the National Mycotoxin Regulations.

TABLE 3: SOUTH AFRICAN MAIZE CROP QUALITY 2024/25 (Weighted Averages)									
Class and grade of maize	**WM1**	**WM2**	**WM3**	**WCOM**	**YM1**	**YM2**	**YM3**	**YCOM**	**Weighted Ave.**
RSA Grading									
Defective kernels above 6.35 mm sieve, %	2.4	6.9	12.5	3.8	3.0	7.8	13.3	8.4	4.6
Defective kernels below 6.35 mm sieve, %	1.3	1.7	1.8	2.0	1.7	2.8	5.2	3.1	1.8
Total defective kernels, %	3.7	8.6	14.2	5.8	4.7	10.6	18.5	11.5	6.4
Other colour maize kernels, %	0.2	0.7	0.6	0.1	0.0	0.2	0.4	0.6	0.2
Foreign matter, %	0.0	0.1	0.2	1.0	0.0	0.1	0.3	0.8	0.1
Combined deviation, %	3.9	9.5	15.1	6.9	4.8	10.8	19.2	12.9	6.8
Pinked maize kernels, %	0.0	0.1	0.1	0.0	0.0	0.0	0.0	0.0	0.0
Physical Factors									
Test weight, kg/hl	76.7	76.8	75.9	76.7	76.1	75.9	74.7	74.4	76.3
100 Kernel mass, g	36.6	36.7	37.7	37.9	34.2	32.8	31.0	32.7	35.1
Stress cracks, %	5	6	4	4	3	5	5	5	4
Milling Index	78	78	76	76	73	72	69	70	75
Grit Yield	64	64	64	64	63	63	62	62	63
Kernel Size									
% on top 10 mm	26.2	25.6	35.3	33.6	12.0	9.2	12.1	9.3	18.5
% on top 8 mm	62.9	63.1	56.6	58.4	63.8	61.6	56.8	64.4	62.7
% through 8 mm	10.8	11.3	8.1	8.0	24.4	29.2	31.1	26.3	18.8
Breakage susceptibility									
% Below 6.35 mm sieve	0.8	1.1	1.4	1.1	0.9	1.1	1.8	1.7	1.0
% Below 4.75 mm sieve	0.7	0.9	1.1	0.9	0.7	0.8	1.1	1.1	0.8
Nutritional Values									
Fat, % (db)	4.0	3.9	3.8	4.0	4.0	3.9	3.7	4.0	4.0
Protein, % (db)	8.8	9.0	9.1	9.2	8.8	8.8	8.7	8.8	8.9
Starch, % (db)	74.3	73.8	73.6	73.7	73.6	73.5	73.5	73.5	73.8
Crude fibre, % (db)	2.1	2.1	2.1	2.2	2.2	2.2	2.2	2.2	2.2
Number of samples	***282***	***122***	***39***	***15***	***371***	***119***	***18***	***34***	***1 000***

WCOM: White maize downgraded to Class Other Maize.
YCOM: Yellow maize downgraded to Class Other Maize.

TABLE 4: COMPARISON OF WEIGHTED AVERAGE RESULTS OF THE MAIN MAIZE PRODUCING PROVINCES 2024/25

Maize class	White maize			Yellow maize		
Production region	**North West Regions 12 - 20**	**Free State Regions 21 - 28**	**Mpumalanga Regions 29 - 33**	**North West Regions 12 - 20**	**Free State Regions 21 - 28**	**Mpumalanga Regions 29 - 33**
Defective kernels above the 6.35 mm round-hole sieve, %	4.8	5.4	3.8	5.1	5.0	4.9
Defective kernels below the 6.35 mm round-hole sieve, %	1.4	1.5	1.4	3.4	2.2	1.8
Total defective kernels, %	6.2	6.9	5.2	8.5	7.1	6.7
Combined deviations, %	6.5	7.2	5.9	9.1	7.3	6.9
Test weight, kg/hl	76.9	77.1	76.3	75.2	75.5	75.8
100 kernel mass, g	37.2	37.7	36	33.9	33.2	33.9
Kernel size above 10 mm sieve, %	33.5	34.0	21.2	6.7	11.4	15
Kernel size below 8 mm sieve, %	8.0	8.2	12.3	28.1	24	21.4
Breakage susceptibility (below the 6.35 mm sieve), %	0.9	1.0	1.0	1.7	0.9	0.9
Stress cracks, %	3	5	5	4	4	4
Milling index	78	79	76	67	73	74
Number of samples	***67***	***156***	***184***	***18***	***201***	***208***
Fat, %	4.0	4.0	4.0	3.9	4.0	4.0
Protein, %	9.2	9.2	8.6	8.8	8.9	8.9
Starch, %	73.8	73.6	74.4	73.7	73.3	73.4
Crude fibre, %	2.2	2.2	2.1	2.3	2.2	2.2
Number of samples	***67***	***156***	***184***	***18***	***201***	***208***
Total extraction, % (Roff mill)	76.5	76.9	75.9	-	-	-
Whiteness index, unsifted	30.0	31.2	30.9	-	-	-
Whiteness index, sifted	27.6	29.3	28.7	-	-	-
Number of samples	***42***	***73***	***71***	***-***	***-***	***-***
Total extraction, % (Bühler MCKA mill)	80	78.8	75.4	-	-	-
Whiteness index, unsifted	13.8	13.9	14.8	-	-	-
Whiteness index, sifted	12.8	12.8	13.4	-	-	-
Number of samples	***66***	***155***	***184***	***-***	***-***	***-***

RSA Provinces and Production Regions

The Republic of South Africa is divided into 9 provinces as illustrated in Figure 1.

Figure 1: RSA Provinces

Provincial map with gratitude to SiQ.

The 9 provinces are divided into 36 grain production regions.

The regions are distributed as follows:

Region 1: Namakwaland
Regions 2 to 4: Swartland
Regions 5 and 6: Rûens
Regions 7 and 8: Eastern Cape
Region 9: Karoo
Region 10: Griqualand West
Region 11: Vaalharts
Regions 12 to 20: North West
Regions 21 to 28: Free State
Regions 29 to 33: Mpumalanga
Region 34: Gauteng
Region 35: Limpopo
Region 36: KwaZulu-Natal

Please see the Crop Production Regions map on the next page.

The production regions from which maize samples have been received for the crop quality survey of the 2024/25 production season, are named and described on pages 33 to 36. All the silo/intake stands as well as the type of storage structure, situated in a particular region, are provided.

The mostly rain-fed maize production area is divided into four major maize production regions according to climatological characteristics:

- The Warm Western Region (western parts of the Free State and most of the North West)
- The Temperate Eastern Region (Gauteng and the central parts of the Free State)
- The Cold Eastern Region (Mpumalanga Highveld and eastern Free State)
- The KwaZulu-Natal Region (the western/upland and central/midland parts of KZN)

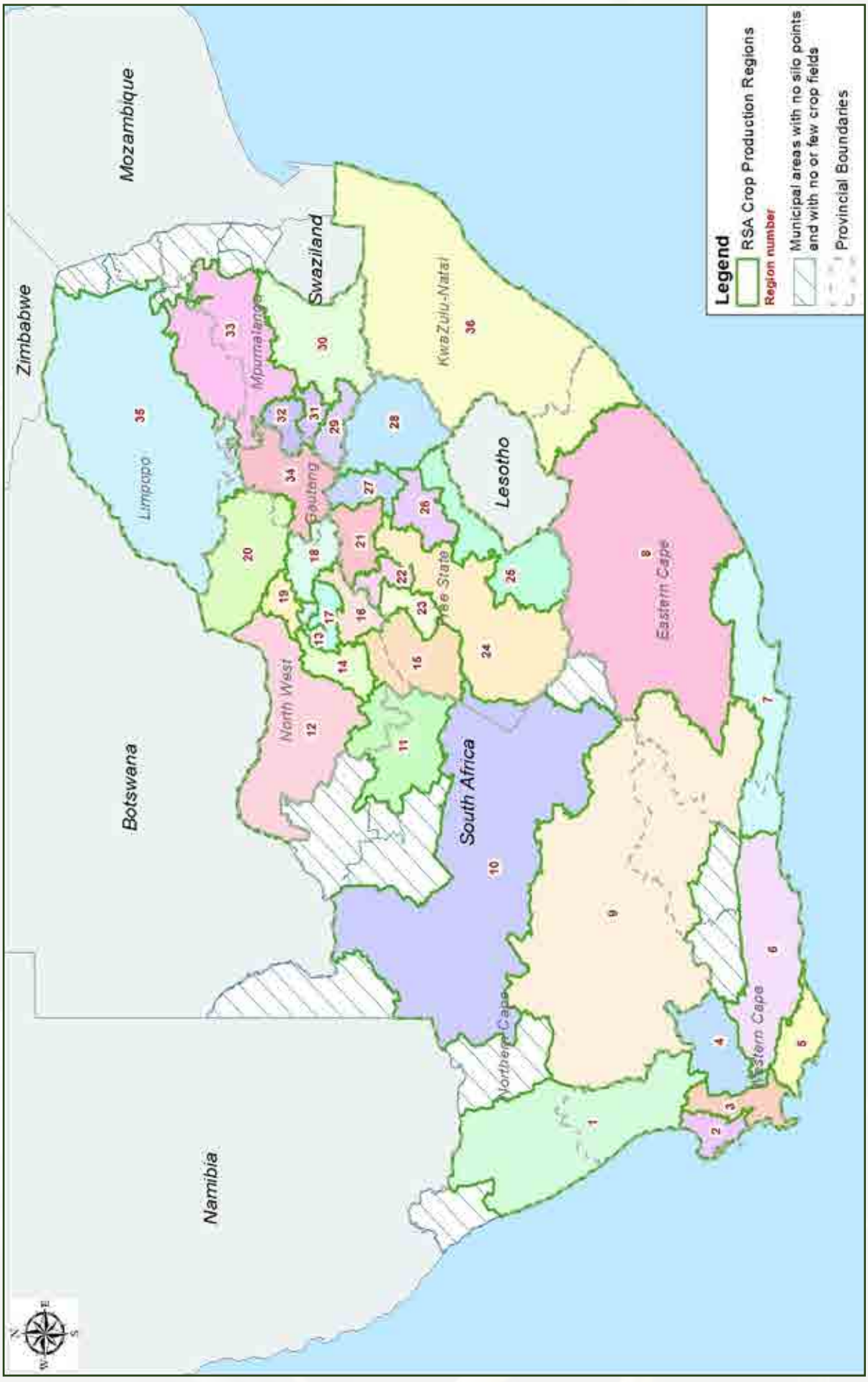


Figure 2: RSA Crop Production Regions

Regional map with gratitude to Agbiz Grain and SIQ.

Grain Production Regions

Silo/Intake stands per region indicating type of storage structure

Region 5: Ruens Western Region			
BKB	Hassiesdrift (Bunker)	Overberg Agri	Krige (Bags/Bins)
Overberg Agri	Bredasdorp (Bags/Bins/Bunkers)	Overberg Agri	Napier (Bags/Bins)
Overberg Agri	Caledon (Bins/Bunkers)	Overberg Agri	Ou Plaas (Bunkers)
Overberg Agri	Lemoenskop (Bags/Bins)	Overberg Agri	Protem (Bags/Bins)
Overberg Agri	Klipdale (Bags/Bins)	Overberg Agri	Rietpoel (Bags/Bins)

Region 6: Ruens Eastern Region			
SSK	Albertina (Bins)	SSK	Krombeksrivier (Bins)
SSK	Ashton (Bags/Bins)	SSK	Protem (Bags/Bins)
SSK	Heidelberg (Bins)	SSK	Riversdal (Bins)
SSK	Herold (Bins)	SSK	Swellendam (Bags/Bins)
SSK	Karringmelksrivier (Bags/Bins/)		

Region 10: Griqualand West Region			
GWK	Douglas (Bags/Bins)	GWK	Trans Oranje (Bags/Bins/Bunkers)
GWK	Luckhoff (Bins)	OVK	Havenga Brug (Bins)
GWK	Marydale (Bins)	OVK	Morgenzon (Bins)
GWK	Meganisasie (Bungers)	OVK	Oranjerivier (Bins/Bunkers)
GWK	Modderrivier (Bags/Bins/Bulk)	OVK	Prieska (Bins/Bunkers)
GWK	Prieska (Bins/Dams)	OVK	Rietrivier (Bins)
GWK	Rietrivier (Bins)	OVK	Swemkuil (Bunkers)
GWK	Stoffelshoek (Bunkers)		

Region 11: Vaalharts Region			
GWK	Barkly-Wes (Bins/Bulk)	Senwes	Jan Kempdorp (Bins)
GWK	Jan Kempdorp (Bags/Bunkers)	Senwes	Magogong (Bins)
Senwes	Hartswater (Bins)	Senwes	Tadcaster (Bins)

Region 14: North West Southern Region			
NWK	Barberspan (Bins)	NWK	Taaibospan (Bins)
NWK	Delareyville (Bins)	Senwes	Amalia (Bins)
NWK	Excelsior (Bins)	Senwes	Hallatshope (Bins)
NWK	Geysdorp (Bins)	Senwes	Migdol (Bins)
NWK	Migdol (Bins)	Senwes	Schweizer-Reneke (Bins)
NWK	Nooitgedacht (Bins)		

Region 15: North West South Eastern Region			
GWK	Christiana (Bins)	Senwes	Hoopstad (Bins)
Senwes	Bloemhof (Bins)	Senwes	Kingswood (Bins)
Senwes	Christiana (Bins)	Senwes	Krusing (Bunkers)
Senwes	Helpman Depot 726 (Bags)	Senwes	Poppieland (Bunkers)
Senwes	Hertzogville (Bins)		

Region 16: North West Central-Eastern Region			
Senwes	Bamboesspruit (Bins)	Senwes	Regina (Bins)
Senwes	Klerksdorp (Bins)	Senwes	Strydpoort (Bins)
Senwes	Leeudoringstad (Bins)	Senwes	Wolmaranstad (Bins)
Senwes	Makwassie (Bins)	Senwes	Zesto (Bunkers)

Grain Production Regions

Silo/Intake stands per region indicating type of storage structure

Region 17: North West Central-Northern Region (Ottosdal)			
NWK	Boschpoort (Bags/Bins/Bulk)	NWK	Vermaas (Bins)
NWK	Kleinharts (Bins)	Senwes	Hartbeesfontein (Bins)
NWK	Ottosdal (Bins)	Senwes	Melliodora (Bins)
NWK	Rostrataville (Bins)	Senwes	Werda (Bins)

Region 18: North West Central Region (Ventersdorp)			
NWK	Bodenstein (Bins)	Senwes	Makokskraal (Bins)
NWK	Coligny (Bins)	Senwes	Potchefstroom (Bins)
Senwes	Buckingham (Bins)	Senwes	Ventersdorp (Bins)
Senwes	Enselspruit (Bins)		

Region 21: Free State North-Western Region (Viljoenskroon)			
Afgri	Kommandonek (Bunkers)	Senwes	Rooiwal (Bins)
Senwes	Attie (Bins)	Senwes	Vierfontein (Bins)
Senwes	Groenebloem (Bins)	Senwes	Viljoenskroon (Bins)
Senwes	Heuningspruit (Bins)	Senwes	Vredefort (Bins)
Senwes	Koppies (Bins)	Senwes	Weiveld (Bins)

Region 22: Free State North-Western Region (Bothaville)			
Senwes	Allanrigde (Bins)	Senwes	Schoonspruit (Bins)
Senwes	Bothaville (Bins)	Senwes	Schuttesdraai (Bins)
Senwes	Mirage (Bins)	Senwes	Misgunst (Bunkers)
Senwes	Odendaalsrus (Bins)		

Region 23: Free State North-Western Region (Bultfontein)			
Senwes	Bultfontein (Bins)	Senwes	Tierfontein (Bins)
Senwes	Kaalplaas (Bins)	Senwes	Wesselsbron (Bins)
Senwes	Losdoorns (Bins)	Senwes	Willemsrus (Bins)
Senwes	Protespan (Bins)		

Region 24: Free State Central Region			
Senwes	Bainsvlei (Bins)	Senwes	Kroonstad (Bins)
Senwes	Bloemfontein (Bins)	Senwes	Petrusburg (Bins)
Senwes	Brandfort (Bins)	Senwes	Theunissen (Bins)
Senwes	De Brug (Bins)	Senwes	Van Tonder (Bins)
Senwes	Geneva (Bins)	Senwes	Welgeleë (Bins)
Senwes	Hennenman (Bins)	Senwes	Winburg (Bins)

Region 25: Free State South-Western Region			
Afgri	Bethlehem (Bins)	OVK	Modderpoort (Bins)
Afgri	Slabberts (Bins)	OVK	Thaba Nchu (Bunkers)
OVK	Clocolan (Bins)	OVK	Tweespruit (Bins)
OVK	Ficksburg (Bins)	OVK	Westminster (Bins)
OVK	Fouriesburg (Bins)	Senwes	Dewetsdorp (Bins)
OVK	Marseilles (Bins)		

Grain Production Regions

Silo/Intake stands per region indicating type of storage structure

Region 26: Free State South-Eastern Region			
Afgri	Kaallaagte (Bins)	Afgri	Monte Video (Bins)
Afgri	Libertas (Bins)	Afgri	Senekal (Bins)
Afgri	Marquard (Bins)	Senwes	Arlington (Bins)
Afgri	Meets (Bins)	Senwes	Steynsrus (Bins)

Region 27: Free State Northern Region			
Senwes	Gottenburg (Bins)	Senwes	Wolwehoek (Bins)
Senwes	Heilbron (Bins)	VKB	Petrus Steyn (Bins)
Senwes	Hoogte Grainlink (Bins)	VKB	Reinette (Bunkers)
Senwes	Mooigeleë (Bins)		

Region 28: Free State Eastern Region			
Afgri	Afrikaskop (Bins/Bunkers)	VKB	Jim Fouché (Bins)
Afgri	Eeram (Bins)	VKB	Memel (Bins)
Afgri	Harrismith (Bins)	VKB	Reitz (Bins)
Afgri	Kransfontein (Bins/Bunkers)	VKB	Tweeling (Bins)
VKB	Ascent (Bins)	VKB	Villiers (Bins/Bulk)
VKB	Cornelia (Bins)	VKB	Vrede (Bins)
VKB	Daniëlsrus (Bins)	VKB	Warden (Bins)
VKB	Frankfort (Bins)	VKB	Windfield (Bins)

Region 29: Mpumalanga Southern Region			
Afgri	Balfour (Bins)	Afgri	Leeuspruit (Bins)
Afgri	Greylingstad (Bins)	Afgri	Platrand (Bins)
Afgri	Grootvlei (Bins)	Afgri	Standerton (Bins)
Afgri	Harvard (Bins)	Afgri	Vaaldrift (Bunkers)
Afgri	Holmdene (Bins)	Afgri	Val (Bins)

Region 30: Mpumalanga Eastern Region			
Afgri	Amersfoort (Bins)	Afgri	Maizefield (Bins)
Afgri	Carolina (Bins)	Afgri	Morgenzon (Bins)
Afgri	Davel (Bins)	Afgri	Overvaal (Bins)
Afgri	Dennegeur (Bunkers)	Afgri	Sandspruit (Bunkers)
Afgri	Eerstelingsfontein (Bunkers)	BKB	Bloekomhoek (Bunkers)
Afgri	Ermelo (Bins)	BKB	Waterval (Bunkers)
Afgri	Estancia (Bins)	TWK	Mkondo (Bins)
Afgri	Hendriksvallei (Bunkers)	TWK	Panbult (Bins)
Afgri	Lothair (Bins)	TWK	Rietspruit (Bunkers)

Region 31: Mpumalanga Central Region			
Afgri	Bakenlaagte (Bunkers)	Afgri	Leslie (Bins)
Afgri	Bethal (Bins)	Afgri	Palmietfontein (Bunkers)
Afgri	Brakfontein (Bunkers)	Afgri	Trichardt (Bins)
Afgri	Devon (Bins/Bunkers)	Afgri	Vaalkrantz (Bunkers)
Afgri	Kinross (Bins/Bunkers)		

Grain Production Regions

Silo/Intake stands per region indicating type of storage structure

Region 32: Mpumalanga Western Region			
Afgri	Argent (Bins/Bunkers)	Afgri	Hawerklip (Bins)
Afgri	Delmas (Bunkers)	Afgri	Kendal (Bins)
Afgri	Dryden (Bins)	Afgri	Ogies (Bins)
Afgri	Eloff (Bins)	Afgri	Vlakfontein (Bunkers)
Afgri	Endicott (Bins)		

Region 33: Mpumalanga Northern Region			
Afgri	Arnot (Bins)	Afgri	Middelburg (Bins)
Afgri	Broodsnyersplaas (Bunkers)	Afgri	Pan (Bins)
Afgri	Driefontein (Bins)	Afgri	Stoffberg (Bins)
Afgri	Lydenburg (Bins)	Afgri	Wonderfontein (Bins)
Afgri	Marble Hall (Bins)	BKB	Wonderfontein (Bunkers)

Region 34: Gauteng Region			
Afgri	Bapsfontein (Bunkers)	Afgri	Meyerton (Bunkers)
Afgri	Bloekomspruit (Bins)	Afgri	Nigel (Bins)
Afgri	Bronkhorstspruit (Bins)	Afgri	Pretoria Wes (Bins)
Afgri	Glenroy (Bins)	Afgri	Vogelvallei (Bunkers)
Afgri	Goeie Hoek (Bins)	Senwes	Middelvlei (Bins)
Afgri	Kaalfontein (Bins)	Senwes	Oberholzer (Bins)
Afgri	Kliprivier (Bunkers)	Senwes	Raathsvlei (Bins)

Region 35: Limpopo Region			
Afgri	Northam (Bins)	VKB	Nylstroom (Modimolle) (Bins)
VKB	Alma (Bins)	VKB	Potgietersrus (Mokopane) (Bins)
VKB	Lehau (Bins)	VKB	Roedtan (Bins)
VKB	Naboomspruit (Mookgophong) (Bins)	VKB	Settlers (Bins)
VKB	Nutfield (Bins)	VKB	Warmbad (Bela-Bela) (Bins)

Region 36: KwaZulu-Natal Region			
Afgri	Bergville (Bins/Bunkers)	Afgri	Mizpah (Bins)
Afgri	Chelmsford Dam (Bunkers)	Afgri	Paulpietersburg (Bins)
Afgri	Bloedrivier (Bins)	Afgri	Pietermaritzburg (Bins)
Afgri	Dannhauser (Bins)	Afgri	Vryheid (Bins)
Afgri	Dundee (Bins)	Afgri	Winterton (Bins/Bunkers)

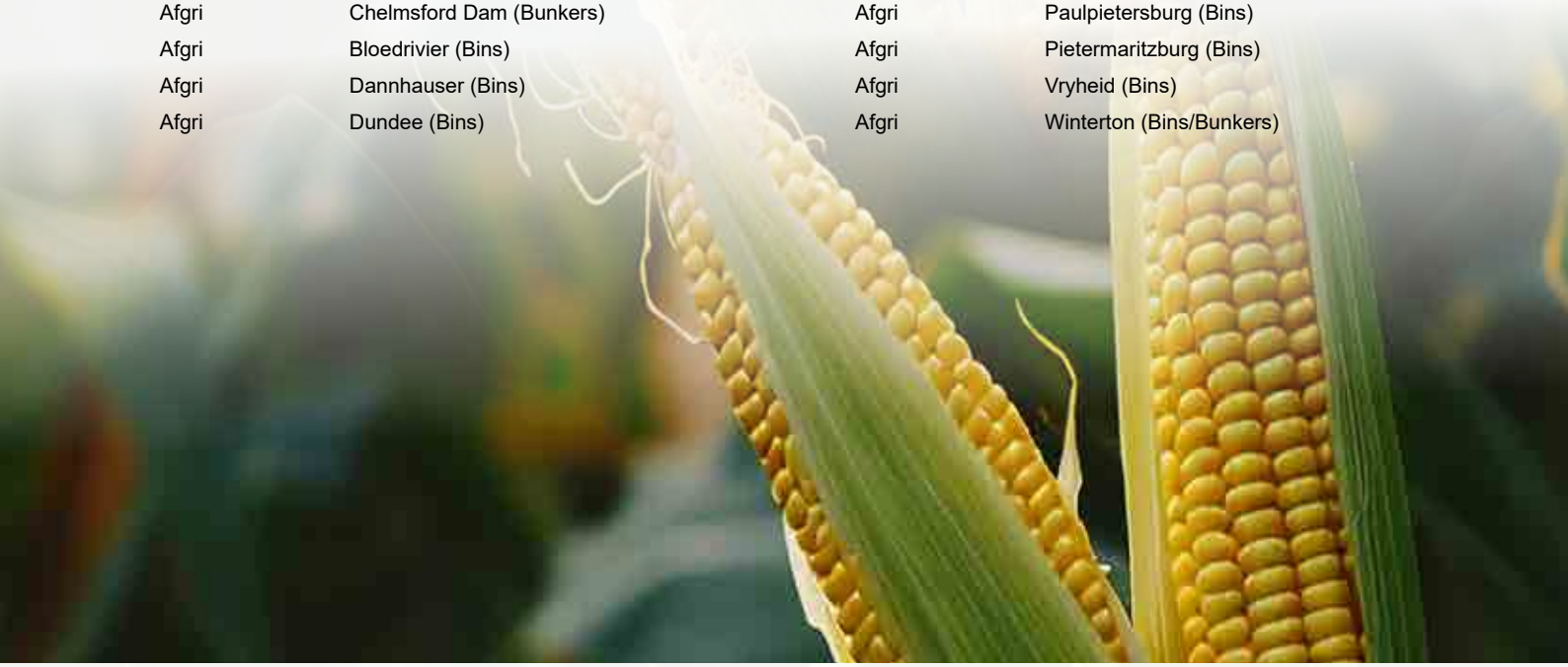


TABLE 5: RSA GRADING OF WHITE MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	% Defective Kernels						% Total defective			% Foreign matter			% Other Colour			% Combined Deviations			% Diplodia Kernels			% Fusarium Kernels			% Cobrot Kernels		
		Above 6.35 mm sieve			Below 6.35 mm sieve																							
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WM1																												
282	Ave. WM1	2.4			1.3			3.7			0.0			0.2			3.9			0.6			1.7			2.3		
	Min. WM1		0.0			0.0			0.6			0.0			0.0			0.8			0.0			0.0			0.0	
	Max. WM1			5.8			4.7			7.0			0.3			2.8			7.9			5.0			10.0			11.0
GRADE: WM2																												
122	Ave. WM2	6.9			1.7			8.6			0.1			0.7			9.5			2.2			3.8			6.0		
	Min. WM2		0.0			0.2			1.2			0.0			0.0			1.8			0.0			0.0			0.0	
	Max. WM2			12.3			9.5			12.9			0.5			4.0			15.1			9.4			11.6			12.3
GRADE: WM3																												
39	Ave. WM3	12.5			1.8			14.2			0.2			0.6			15.1			5.2			5.0			10.2		
	Min. WM3		0.4			0.2			2.4			0.0			0.0			3.0			0.0			0.0			0.3	
	Max. WM3			26.0			4.9			28.7			0.7			7.0			29.2			16.3			18.2			20.0
GRADE: COM																												
15	Ave. COM	3.8			2.0			5.8			1.0			0.1			6.9			1.0			2.1			3.2		
	Min. COM		1.0			0.4			1.7			0.0			0.0			2.5			0.0			0.0			0.4	
	Max. COM			12.1			4.7			14.1			2.1			0.7			15.1			6.6			6.7			9.1
458	Ave. White	4.5			1.5			6.0			0.1			0.4			6.4			1.5			2.5			4.0		
	Min. Whtie		0.0			0.0			0.6			0.0			0.0			0.8			0.0			0.0			0.0	
	Max. White			26.0			9.5			28.7			2.1			7.0			29.2			16.3			18.2			20.0
1000	Ave. Maize	4.6			1.8			6.4			0.1			0.2			6.8			1.6			2.6			4.2		
	Min. Maize		0.0			0.0			0.6			0.0			0.0			0.8			0.0			0.0			0.0	
	Max. Maize			30.1			31.4			34.0			3.2			20.0			34.0			25.2			22.5			29.9

TABLE 6: RSA GRADING OF WHITE MAIZE ACCORDING TO REGION (2024/25)

Number of samples	Region	% Defective Kernels						% Total defective			% Foreign matter			% Other Colour			% Combined Deviations			% Diplodia Kernels			% Fusarium Kernels			% Cobrot Kernels		
		Above 6.35 mm sieve			Below 6.35 mm sieve																							
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WHITE																												
2	Region 11	0.3	0.2	0.5	0.6	0.4	0.8	0.9	0.6	1.3	0.3	0.0	0.5	0.2	0.0	0.3	1.4	0.9	1.8	0.2	0.1	0.3	0.1	0.0	0.1	0.3	0.2	0.4
7	Region 14	2.7	0.1	7.4	1.2	0.5	2.3	3.9	1.0	8.0	0.1	0.0	0.4	0.0	0.0	0.0	4.0	1.0	8.0	1.2	0.0	3.4	1.2	0.0	4.6	2.4	0.1	7.2
31	Region 15	3.8	0.0	26.0	1.1	0.2	3.1	4.9	1.0	28.7	0.1	0.0	2.1	0.2	0.0	2.4	5.2	1.0	29.2	1.9	0.0	16.3	1.1	0.0	3.7	3.0	0.0	19.4
11	Region 16	5.6	1.0	14.9	2.0	0.5	4.2	7.6	2.4	16.3	0.4	0.0	1.1	0.0	0.0	0.2	8.0	3.0	16.4	3.0	0.0	8.2	1.1	0.0	2.9	4.1	0.4	11.1
4	Region 17	7.4	3.3	11.4	1.1	0.2	1.9	8.5	3.5	13.1	0.1	0.1	0.2	0.0	0.0	0.0	8.6	3.5	13.2	3.4	2.3	5.8	3.5	0.0	8.6	6.9	2.3	11.4
14	Region 18	6.5	1.5	20.7	1.9	0.8	6.2	8.3	2.8	21.9	0.2	0.0	1.9	0.2	0.0	0.9	8.8	3.5	22.0	1.8	0.0	6.6	3.5	0.0	18.2	5.4	0.4	19.5
12	Region 21	2.7	0.3	6.5	1.8	0.7	4.0	4.6	1.8	8.2	0.1	0.0	0.3	0.2	0.0	0.7	4.8	2.1	8.8	0.6	0.0	2.8	2.1	0.0	6.2	2.7	0.0	6.2
9	Region 22	7.3	3.1	12.2	1.2	0.6	2.0	8.4	3.8	13.3	0.2	0.0	0.9	0.0	0.0	0.0	8.7	3.9	13.3	2.9	0.0	6.9	1.2	0.0	2.9	4.2	0.3	8.2
43	Region 23	7.2	0.8	18.5	1.6	0.3	3.5	8.8	1.2	20.7	0.1	0.0	0.8	0.0	0.0	0.3	9.0	1.4	21.2	4.3	0.0	14.0	2.0	0.0	10.0	6.3	0.3	16.2
46	Region 24	5.3	0.4	20.2	1.5	0.2	4.7	6.8	1.7	21.4	0.1	0.0	0.5	0.1	0.0	0.8	7.0	1.9	21.4	1.7	0.0	12.2	2.6	0.0	11.7	4.4	0.0	20.0
3	Region 25	2.6	1.4	3.6	1.6	0.9	2.3	4.1	2.3	5.9	0.0	0.0	0.0	0.4	0.0	0.6	4.5	2.9	5.9	0.7	0.0	2.2	1.6	0.9	2.7	2.4	1.2	3.2
12	Region 26	3.4	0.4	16.0	1.0	0.3	2.4	4.4	0.9	16.8	0.3	0.0	0.6	0.5	0.0	2.7	5.1	1.0	20.0	1.1	0.0	6.3	2.3	0.0	9.7	3.4	0.4	16.0
11	Region 27	6.2	1.6	11.6	1.3	0.7	3.2	7.5	2.4	12.9	0.4	0.0	1.1	0.5	0.0	3.0	8.4	3.2	13.4	1.0	0.0	4.0	4.6	1.6	9.8	5.6	1.6	10.8
20	Region 28	3.9	0.7	8.4	1.5	0.1	8.1	5.3	1.0	11.2	0.1	0.0	0.5	0.4	0.0	2.3	5.8	1.0	11.5	1.0	0.0	4.2	2.4	0.1	6.7	3.5	0.7	8.2
28	Region 29	5.8	0.6	18.7	1.6	0.1	5.7	7.4	2.1	20.2	0.1	0.0	0.5	0.9	0.0	3.7	8.4	2.1	21.9	1.0	0.0	8.1	4.1	0.0	10.0	5.1	0.4	14.7
42	Region 30	3.5	0.5	12.4	1.7	0.1	4.8	5.2	1.7	14.1	0.1	0.0	0.8	0.3	0.0	3.1	5.6	1.7	14.1	0.7	0.0	4.1	2.8	0.0	10.3	3.5	0.4	13.1
16	Region 31	3.8	1.3	9.9	1.2	0.4	3.8	5.0	2.5	10.5	0.2	0.0	1.9	0.5	0.0	3.3	5.6	2.7	13.2	1.5	0.0	4.8	3.2	0.4	9.6	4.7	1.3	11.0
29	Region 32	4.3	0.4	15.8	1.9	0.3	4.0	6.3	1.7	18.5	0.1	0.0	1.4	1.3	0.0	7.0	7.7	2.6	18.9	0.7	0.0	3.3	3.1	0.0	10.7	3.8	0.0	10.7
69	Region 33	3.0	0.0	14.3	1.0	0.0	3.2	4.0	0.8	16.7	0.0	0.0	0.8	0.3	0.0	2.0	4.4	0.8	17.6	0.4	0.0	7.3	2.6	0.0	11.9	3.0	0.0	13.0
29	Region 34	4.3	0.0	11.7	1.6	0.4	6.0	5.9	0.7	16.5	0.0	0.0	0.7	0.8	0.0	3.1	6.8	1.7	19.7	1.4	0.0	5.0	2.5	0.0	8.7	3.9	0.0	11.3
7	Region 35	0.7	0.0	1.4	1.2	0.3	2.2	1.8	0.8	3.1	0.0	0.0	0.0	0.1	0.0	0.2	1.9	0.8	3.1	0.2	0.0	0.6	0.2	0.0	0.8	0.4	0.0	0.9
13	Region 36	4.2	0.7	10.2	2.1	0.1	9.5	6.3	1.2	11.5	0.1	0.0	0.4	0.4	0.0	2.7	6.7	1.3	14.1	1.0	0.0	4.6	3.0	0.0	6.2	4.0	0.7	9.3
458	**Ave. White**	**4.5**			**1.5**			**6.0**			**0.1**			**0.4**			**6.4**			**1.5**			**2.5**			**4.0**		
	Min. white		**0.0**			**0.0**			**0.6**			**0.0**			**0.0**			**0.8**			**0.0**			**0.0**			**0.0**	
	Max. white			**26.0**			**9.5**			**28.7**			**2.1**			**7.0**			**29.2**			**16.3**			**18.2**			**20.0**

TABLE 7: RSA GRADING OF YELLOW MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	% Defective Kernels						%			%			%			%			%			%		
		Above 6.35 mm sieve			Below 6.35 mm sieve			Total defective			Foreign matter			Other Colour			Combined Deviations			Diplodia Kernels			Fusarium Kernels			Cobrot Kernels		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: YM1																												
371	Ave. YM1	3.0			1.7			4.7			0.0			0.0			4.8			1.1			1.7			2.8		
	Min. YM1		0.0			0.1			0.7			0.0			0.0			0.8			0.0			0.0			0.0	
	Max. YM1			7.7			4.0			9.0			0.3			1.8			9.0			6.1			7.3			9.6
GRADE: YM2																												
119	Ave. YM2	7.8			2.8			10.6			0.1			0.2			10.8			2.6			4.5			7.1		
	Min. YM2		0.2			0.0			0.7			0.0			0.0			1.1			0.0			0.0			0.0	
	Max. YM2			16.7			6.9			18.1			0.5			4.9			18.2			15.1			14.4			16.2
GRADE: YM3																												
18	Ave. YM3	13.3			5.2			18.5			0.3			0.4			19.2			5.5			7.4			12.9		
	Min. YM3		0.3			0.6			4.4			0.0			0.0			5.2			0.0			0.0			0.3	
	Max. YM3			26.5			23.1			29.2			0.7			3.6			29.3			16.5			21.6			26.4
GRADE: COM																												
34	Ave. COM	8.4			3.1			11.5			0.8			0.6			12.9			3.3			4.0			7.3		
	Min. COM		0.1			0.7			2.4			0.0			0.0			2.6			0.0			0.0			0.0	
	Max. COM			30.1			31.4			34.0			3.2			20.0			34.0			25.2			22.5			29.9
542	Ave. Yellow	4.7			2.1			6.9			0.1			0.1			7.1			1.7			2.6			4.4		
	Min.Yellow		0.0			0.0			0.7			0.0			0.0			0.8			0.0			0.0			0.0	
	Max. Yellow			30.1			31.4			34.0			3.2			20.0			34.0			25.2			22.5			29.9
1000	Ave. Maize	4.6			1.8			6.4			0.1			0.2			6.8			1.6			2.6			4.2		
	Min. Maize		0.0			0.0			0.6			0.0			0.0			0.8			0.0			0.0			0.0	
	Max. Maize			30.1			31.4			34.0			3.2			20.0			34.0			25.2			22.5			29.9

TABLE 7: RSA GRADING OF YELLOW MAIZE ACCORDING TO GRADE (2024/25) (continue)

***The following yellow maize samples were downgraded to Class Other Maize due to the presence of poisonous seeds exceeding the maximum allowance**

Region	Number of Poisonous seeds (*Crotolaria* spp., *Datura* spp., *Ricinis communis*) Max. allowance 1 seed/1000 g	Number of Poisonous seeds (*Argemone mexicana* L., *Convolvulus* spp., *Ipomoea purpurea* Roth., *Lolium temulentum, Xanthium* spp.) Max. allowance 7 seeds/1000 g
24	4 *Datura*	0
24	25 *Datura*	0
24	55 *Datura*	0
26	6 *Datura*	2 *Xanthium Strumarium*

TABLE 8: RSA GRADING OF YELLOW MAIZE ACCORDING TO REGION (2024/25)

Number of samples	Region	% Defective Kernels						% Total defective			% Foreign matter			% Other Colour			% Combined Deviations			% Diplodia Kernels			% Fusarium Kernels			% Cobrot Kernels		
		Above 6.35 mm sieve			Below 6.35 mm sieve																							
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: YELLOW																												
2	Region 5	0.3	0.2	0.5	3.5	3.2	3.7	3.8	3.4	4.2	0.0	0.0	0.0	0.0	0.0	0.0	3.8	3.4	4.2	0.1	0.0	0.3	0.0	0.0	0.0	0.1	0.0	0.3
5	Region 6	2.1	0.0	8.8	2.0	0.7	3.6	4.1	1.3	12.4	0.0	0.0	0.2	0.0	0.0	0.0	4.2	1.3	12.4	0.5	0.0	2.2	1.2	0.0	6.1	1.7	0.0	8.3
31	Region 10	1.1	0.1	5.6	2.3	0.1	6.4	3.4	2.0	6.7	0.0	0.0	0.2	0.0	0.0	0.2	3.4	2.0	6.7	0.4	0.0	3.0	0.3	0.0	1.5	0.6	0.0	3.1
16	Region 11	1.2	0.4	3.2	2.5	0.8	6.9	3.7	2.0	9.5	0.1	0.0	0.4	0.0	0.0	0.0	3.8	2.0	9.6	0.2	0.0	1.0	0.5	0.0	3.0	0.6	0.0	3.0
2	Region 15	4.4	0.3	8.4	10.0	4.4	15.7	14.4	12.8	16.0	0.1	0.0	0.3	0.2	0.0	0.3	14.7	13.1	16.2	0.1	0.0	0.3	3.4	0.0	6.8	3.5	0.3	6.8
2	Region 16	2.8	1.4	4.2	1.8	1.1	2.5	4.6	2.5	6.7	2.1	0.9	3.2	0.0	0.0	0.0	6.6	3.4	9.9	1.3	1.2	1.4	1.5	0.0	3.0	2.8	1.4	4.2
14	Region 18	5.5	1.0	16.3	2.7	0.7	5.0	8.2	1.7	17.5	0.3	0.0	1.6	0.1	0.0	0.8	8.6	1.9	17.5	2.3	0.5	8.2	3.1	0.0	7.9	5.5	1.0	16.2
5	Region 21	3.0	1.1	5.0	1.2	0.3	3.3	4.2	2.7	5.8	0.1	0.0	0.4	0.2	0.0	0.9	4.4	2.7	5.8	1.5	0.0	3.8	1.1	0.0	3.7	2.6	0.9	4.5
5	Region 23	1.3	0.3	2.1	1.5	0.9	2.6	2.8	1.3	4.5	0.2	0.0	0.4	0.6	0.0	2.9	3.6	1.4	6.0	0.8	0.0	1.6	0.4	0.0	1.0	1.2	0.3	1.8
22	Region 24	3.9	0.0	25.2	2.2	0.7	3.8	6.1	1.4	27.0	0.2	0.0	1.1	0.1	0.0	0.5	6.3	1.6	27.3	0.9	0.0	3.9	2.8	0.0	21.3	3.7	0.0	25.2
34	Region 25	3.9	0.0	15.3	3.8	0.4	31.4	7.6	1.5	31.8	0.2	0.0	0.9	0.1	0.0	3.6	7.9	1.7	32.5	1.3	0.0	9.3	2.2	0.0	10.4	3.5	0.0	15.2
37	Region 26	7.1	1.1	26.5	1.9	0.5	4.5	9.1	3.5	29.2	0.2	0.0	2.5	0.0	0.0	1.3	9.3	3.9	29.3	1.7	0.0	7.5	5.3	0.9	21.6	6.9	0.9	26.4
21	Region 27	4.8	0.4	23.1	2.0	0.4	4.0	6.8	1.4	24.1	0.2	0.0	2.4	0.2	0.0	3.3	7.1	1.4	27.4	2.0	0.0	10.1	2.8	0.0	12.8	4.8	0.0	22.9
77	Region 28	5.1	0.4	26.0	1.7	0.2	4.8	6.8	0.7	27.3	0.1	0.0	1.0	0.0	0.0	0.4	6.9	1.0	27.3	1.3	0.0	7.0	3.6	0.0	15.7	4.9	0.2	22.7
36	Region 29	5.2	1.5	16.7	1.8	0.4	6.5	7.0	2.3	18.1	0.0	0.0	0.2	0.0	0.0	0.4	7.1	2.3	18.1	2.9	0.0	15.1	2.2	0.2	8.6	5.1	0.2	16.1
58	Region 30	4.8	0.3	30.1	1.5	0.2	4.7	6.3	0.8	30.8	0.0	0.0	1.0	0.1	0.0	4.9	6.4	0.8	31.0	2.1	0.0	10.2	2.3	0.0	21.6	4.5	0.3	29.9
47	Region 31	6.5	0.5	27.7	1.9	0.0	4.9	8.5	1.2	30.3	0.1	0.0	1.1	0.0	0.0	1.1	8.6	1.2	30.4	4.2	0.0	25.2	1.7	0.0	11.0	5.8	0.0	27.7
42	Region 32	3.2	0.5	9.8	1.7	0.3	4.1	4.8	1.6	12.6	0.0	0.0	0.5	0.1	0.0	1.7	4.9	1.6	12.6	1.6	0.0	6.1	1.4	0.0	7.0	2.9	0.0	9.5
25	Region 33	4.5	0.3	19.4	2.4	0.1	6.9	6.9	2.3	24.6	0.1	0.0	1.6	0.9	0.0	20.0	7.8	2.3	24.6	0.6	0.0	4.1	3.7	0.0	17.5	4.3	0.0	19.4
24	Region 34	4.7	0.5	13.1	2.3	0.8	10.1	7.1	1.9	15.5	0.1	0.0	0.6	0.2	0.0	1.8	7.4	2.0	15.5	1.4	0.0	4.8	2.7	0.2	11.7	4.1	0.3	12.9
3	Region 35	0.7	0.6	0.7	2.3	0.4	4.7	3.0	1.1	5.4	0.1	0.0	0.2	0.4	0.0	1.2	3.5	2.3	5.5	0.0	0.0	0.0	0.2	0.0	0.5	0.2	0.0	0.5
34	Region 36	8.5	1.6	29.9	2.7	0.5	6.1	11.2	4.5	34.0	0.1	0.0	0.6	0.0	0.0	0.9	11.3	4.7	34.0	2.2	0.0	15.7	4.8	0.0	22.5	7.0	1.6	25.5
542	**Ave. YELLOW**	**4.7**			**2.1**			**6.9**			**0.1**			**0.1**			**7.1**			**1.7**			**2.6**			**4.4**		
	Min. YELLOW		**0.0**			**0.0**			**0.7**			**0.0**			**0.0**			**0.8**			**0.0**			**0.0**			**0.0**	
	Max. YELLOW			**30.1**			**31.4**			**34.0**			**3.2**			**20.0**			**34.0**			**25.2**			**22.5**			**29.9**

TABLE 9: RSA GRADING OF WHITE MAIZE PER PROVINCE (2024/25)

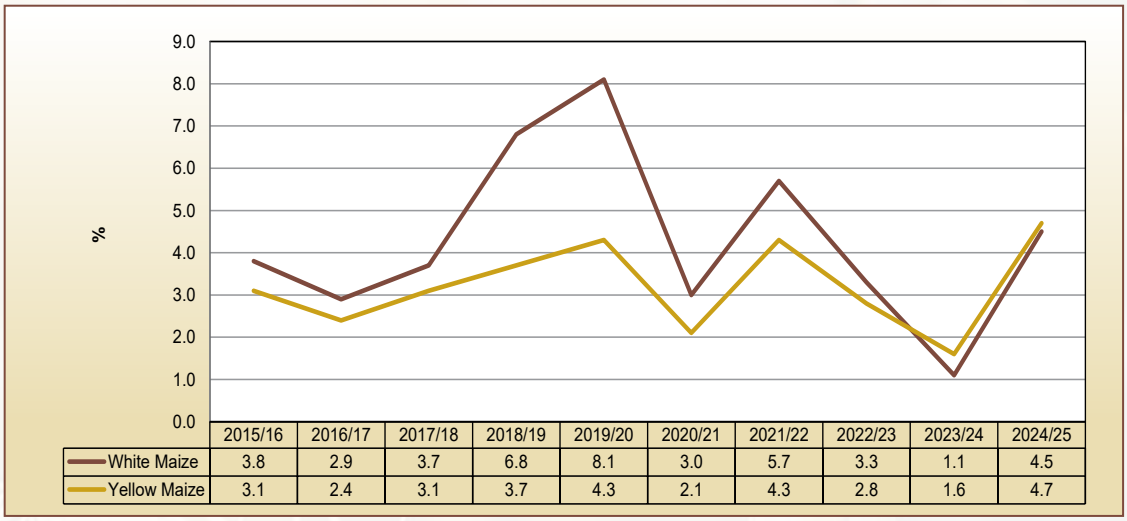
Number of samples	Province	% Defective Kernels						% Total defective			% Foreign matter			% Other Colour			% Combined Deviations			% Diplodia Kernels			% Fusarium Kernels			% Cobrot Kernels		
		Above 6.35 mm sieve			Below 6.35 mm sieve																							
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	Western Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	Northern Cape	0.3	0.2	0.5	0.6	0.4	0.8	0.9	0.6	1.3	0.3	0.0	0.5	0.2	0.0	0.3	1.4	0.9	1.8	0.2	0.1	0.3	0.1	0.0	0.1	0.3	0.2	0.4
156	Free State	5.4	0.3	20.2	1.5	0.1	8.1	6.9	1.0	21.4	0.1	0.0	1.1	0.2	0.0	3.0	7.3	1.0	21.4	2.2	0.0	14.0	2.4	0.0	11.7	4.6	0.0	20.0
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	KwaZulu Natal	4.2	0.7	10.2	2.1	0.1	9.5	6.3	1.2	11.5	0.1	0.0	0.4	0.4	0.0	2.7	6.7	1.3	14.1	1.0	0.0	4.6	3.0	0.0	6.2	4.0	0.7	9.3
184	Mpumalanga	3.8	0.0	18.7	1.4	0.0	5.7	5.3	0.8	20.2	0.1	0.0	1.9	0.5	0.0	7.0	5.9	0.8	21.9	0.7	0.0	8.1	3.0	0.0	11.9	3.7	0.0	14.7
7	Limpopo	0.7	0.0	1.4	1.2	0.3	2.2	1.8	0.8	3.1	0.0	0.0	0.0	0.1	0.0	0.2	1.9	0.8	3.1	0.2	0.0	0.6	0.2	0.0	0.8	0.4	0.0	0.9
29	Gauteng	4.3	0.0	11.7	1.6	0.4	6.0	5.9	0.7	16.5	0.0	0.0	0.7	0.8	0.0	3.1	6.8	1.7	19.7	1.4	0.0	5.0	2.5	0.0	8.7	3.9	0.0	11.3
67	North West	4.7	0.0	26.0	1.4	0.2	6.2	6.2	1.0	28.7	0.2	0.0	2.1	0.1	0.0	2.4	6.5	1.0	29.2	2.1	0.0	16.3	1.7	0.0	18.2	3.8	0.0	19.5
458	**Ave. WHITE**	**4.5**			**1.5**			**6.0**			**0.1**			**0.4**			**6.4**			**1.5**			**2.5**			**4.0**		
	Min. WHITE		**0.0**			**0.0**			**0.6**			**0.0**			**0.0**			**0.8**			**0.0**			**0.0**			**0.0**	
	Max. WHITE			**26.0**			**9.5**			**28.7**			**2.1**			**7.0**			**29.2**			**16.3**			**18.2**			**20.0**

TABLE 10: RSA GRADING OF YELLOW MAIZE PER PROVINCE (2024/25)

Number of samples	Province	% Defective Kernels						% Total defective			% Foreign matter			% Other Colour			% Combined Deviations			% Diplodia Kernels			% Fusarium Kernels			% Cobrot Kernels		
		Above 6.35 mm sieve			Below 6.35 mm sieve																							
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
7	Western Cape	1.6	0.0	8.8	2.4	0.7	3.7	4.0	1.3	12.4	0.0	0.0	0.2	0.0	0.0	0.0	4.1	1.3	12.4	0.4	0.0	2.2	0.9	0.0	6.1	1.3	0.0	8.3
47	Northern Cape	1.1	0.1	5.6	2.4	0.1	6.9	3.5	2.0	9.5	0.0	0.0	0.4	0.0	0.0	0.2	3.5	2.0	9.6	0.3	0.0	3.0	0.3	0.0	3.0	0.6	0.0	3.1
201	Free State	4.9	0.0	26.5	2.2	0.2	31.4	7.1	0.7	31.8	0.2	0.0	2.5	0.1	0.0	3.6	7.3	1.0	32.5	1.4	0.0	10.1	3.4	0.0	21.6	4.7	0.0	26.4
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
34	KwaZulu Natal	8.5	1.6	29.9	2.7	0.5	6.1	11.2	4.5	34.0	0.1	0.0	0.6	0.0	0.0	0.9	11.3	4.7	34.0	2.2	0.0	15.7	4.8	0.0	22.5	7.0	1.6	25.5
208	Mpumalanga	4.9	0.3	30.1	1.8	0.0	6.9	6.7	0.8	30.8	0.1	0.0	1.6	0.2	0.0	20.0	6.9	0.8	31.0	2.4	0.0	25.2	2.1	0.0	21.6	4.5	0.0	29.9
3	Limpopo	0.7	0.6	0.7	2.3	0.4	4.7	3.0	1.1	5.4	0.1	0.0	0.2	0.4	0.0	1.2	3.5	2.3	5.5	0.0	0.0	0.0	0.2	0.0	0.5	0.2	0.0	0.5
24	Gauteng	4.7	0.5	13.1	2.3	0.8	10.1	7.1	1.9	15.5	0.1	0.0	0.6	0.2	0.0	1.8	7.4	2.0	15.5	1.4	0.0	4.8	2.7	0.2	11.7	4.1	0.3	12.9
18	North West	5.1	0.3	16.3	3.4	0.7	15.7	8.5	1.7	17.5	0.5	0.0	3.2	0.1	0.0	0.8	9.1	1.9	17.5	2.0	0.0	8.2	3.0	0.0	7.9	5.0	0.3	16.2
542	**Ave. YELLOW**	**4.7**			**2.1**			**6.9**			**0.1**			**0.1**			**7.1**			**1.7**			**2.6**			**4.4**		
	Min. YELLOW		**0.0**			**0.0**			**0.7**			**0.0**			**0.0**			**0.8**			**0.0**			**0.0**			**0.0**	
	Max. YELLOW			**30.1**			**31.4**			**34.0**			**3.2**			**20.0**			**34.0**			**25.2**			**22.5**			**29.9**

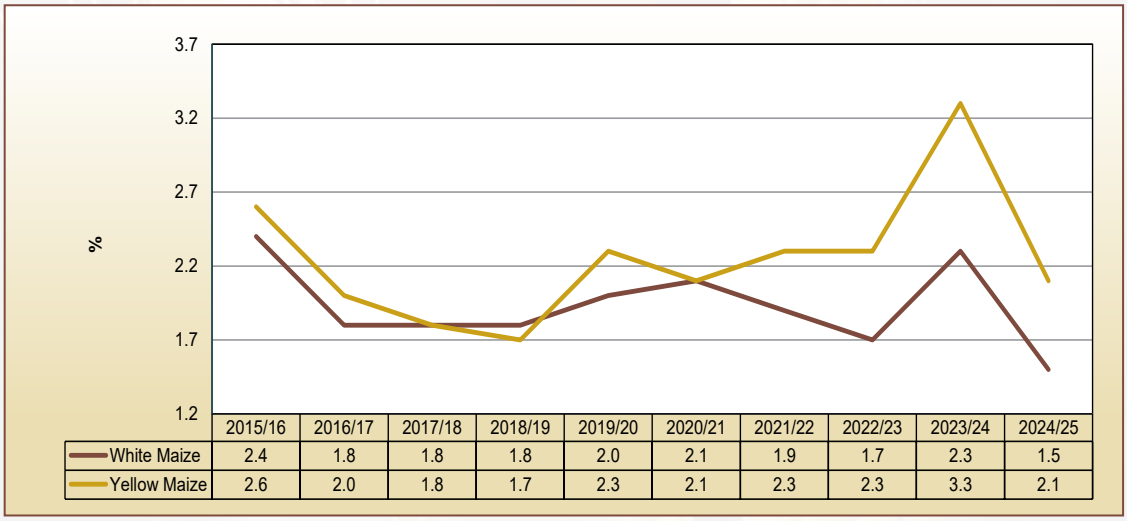
TABLE 11: GRADING QUALITY OF SOUTH AFRICAN WHITE AND YELLOW MAIZE OVER TEN SEASONS

Season	Number of samples	% Defective kernels above 6.35 mm sieve			% Defective kernels below 6.35 mm sieve			% Foreign matter			% Other colour			% Combined deviations		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
White Maize																
2015/16	415	3.8	0.7	79.9	2.4	0.0	14.5	0.2	0.0	2.2	0.4	0.0	8.0	6.7	1.9	91.5
2016/17	549	2.9	0.3	25.5	1.8	0.1	12.7	0.2	0.0	6.9	0.2	0.0	7.0	5.1	1.1	36.7
2017/18	451	3.7	0.2	38.6	1.8	0.0	20.7	0.1	0.0	3.0	0.3	0.0	6.2	5.9	0.3	46.2
2018/19	404	6.8	0.2	88.5	1.8	0.0	19.0	0.2	0.0	4.2	0.5	0.0	12.9	9.3	0.6	96.8
2019/20	516	8.1	0.3	95.9	2.0	0.0	18.3	0.2	0.0	7.1	0.4	0.0	18.3	10.7	0.8	98.8
2020/21	560	3.0	0.0	55.1	2.1	0.0	21.1	0.2	0.0	3.9	0.4	0.0	12.8	5.6	0.5	58.7
2021/22	524	5.7	0.2	31.0	1.9	0.0	10.1	0.2	0.0	4.7	0.2	0.0	5.2	8.0	0.3	33.6
2022/23	520	3.3	0.0	51.8	1.7	0.0	8.9	0.2	0.0	3.7	0.2	0.0	4.6	5.5	0.1	55.6
2023/24	518	1.1	0.1	19.5	2.3	0.0	18.5	0.2	0.0	4.0	0.2	0.0	12.1	3.8	0.2	24.7
2024/25	458	4.5	0.0	26.0	1.5	0.0	9.5	0.1	0.0	2.1	0.4	0.0	7.0	6.4	0.8	29.2
Weighted Average		**4.2**			**1.9**			**0.2**			**0.3**			**6.6**		
Minimum			**0.0**			**0.0**			**0.0**			**0.0**			**0.1**	
Maximum				**95.9**			**21.1**			**7.1**			**18.3**			**98.8**
Yellow Maize																
2015/16	505	3.1	0.5	24.4	2.6	0.0	18.1	0.2	0.0	1.7	0.2	0.0	4.5	6.0	0.6	32.4
2016/17	451	2.4	0.4	24.3	2.0	0.0	27.4	0.2	0.0	2.8	0.2	0.0	6.9	4.7	1.3	33.5
2017/18	449	3.1	0.2	21.2	1.8	0.0	13.5	0.1	0.0	1.3	0.1	0.0	6.2	5.1	0.8	28.0
2018/19	404	3.7	0.0	36.9	1.7	0.0	9.5	0.1	0.0	3.4	0.2	0.0	7.4	5.7	0.7	38.9
2019/20	374	4.3	0.1	85.6	2.3	0.0	11.7	0.1	0.0	5.9	0.2	0.0	17.2	6.9	0.3	86.9
2020/21	440	2.1	0.1	22.4	2.1	0.0	30.9	0.1	0.0	4.7	0.2	0.0	9.6	4.5	0.2	34.8
2021/22	476	4.3	0.2	24.0	2.3	0.0	12.7	0.1	0.0	5.5	0.1	0.0	3.2	6.9	0.3	30.9
2022/23	480	2.8	0.0	29.7	2.3	0.1	12.7	0.1	0.0	2.5	0.1	0.0	4.2	5.4	0.5	30.2
2023/24	482	1.6	0.0	20.3	3.3	0.0	26.9	0.2	0.0	5.1	0.1	0.0	3.9	5.3	0.2	30.9
2024/25	542	4.7	0.0	30.1	2.1	0.0	31.4	0.1	0.0	3.2	0.1	0.0	20.0	7.1	0.8	34.0
Weighted Average		**3.2**			**2.3**			**0.1**			**0.1**			**5.8**		
Minimum			**0.0**			**0.0**			**0.0**			**0.0**			**0.2**	
Maximum				**85.6**			**31.4**			**5.9**			**20.0**			**86.9**
White and Yellow Maize																
2015/16	920	3.4	0.5	79.9	2.5	0.0	18.1	0.2	0.0	2.2	0.3	0.0	8.0	6.3	0.6	91.5
2016/17	1000	2.6	0.3	25.5	1.9	0.0	27.4	0.2	0.0	6.9	0.2	0.0	7.0	4.9	1.1	36.7
2017/18	900	3.4	0.2	38.6	1.8	0.0	20.7	0.1	0.0	3.0	0.2	0.0	6.2	5.5	0.3	46.2
2018/19	808	5.3	0.0	88.5	1.8	0.0	19.0	0.1	0.0	4.2	0.4	0.0	12.9	7.5	0.6	96.8
2019/20	890	6.5	0.1	95.9	2.1	0.0	18.3	0.2	0.0	7.1	0.3	0.0	18.3	9.1	0.3	98.8
2020/21	1000	2.6	0.0	55.1	2.1	0.0	30.9	0.2	0.0	4.7	0.3	0.0	12.8	5.1	0.2	58.7
2021/22	1000	5.0	0.2	31.0	2.1	0.0	12.7	0.2	0.0	5.5	0.2	0.0	5.2	7.5	0.3	33.6
2022/23	1000	3.1	0.0	51.8	2.0	0.0	12.7	0.2	0.0	3.7	0.2	0.0	4.6	5.4	0.1	55.6
2023/24	1000	1.4	0.0	20.3	2.8	0.0	26.9	0.2	0.0	5.1	0.2	0.0	12.1	4.5	0.2	30.9
2024/25	1000	4.6	0.0	30.1	1.8	0.0	31.4	0.1	0.0	3.2	0.2	0.0	20.0	6.8	0.8	34.0
Weighted Average		**3.7**			**2.1**			**0.2**			**0.2**			**6.2**		
Minimum			**0.0**			**0.0**			**0.0**			**0.0**			**0.1**	
Maximum				**95.9**			**31.4**			**7.1**			**20.0**			**98.8**



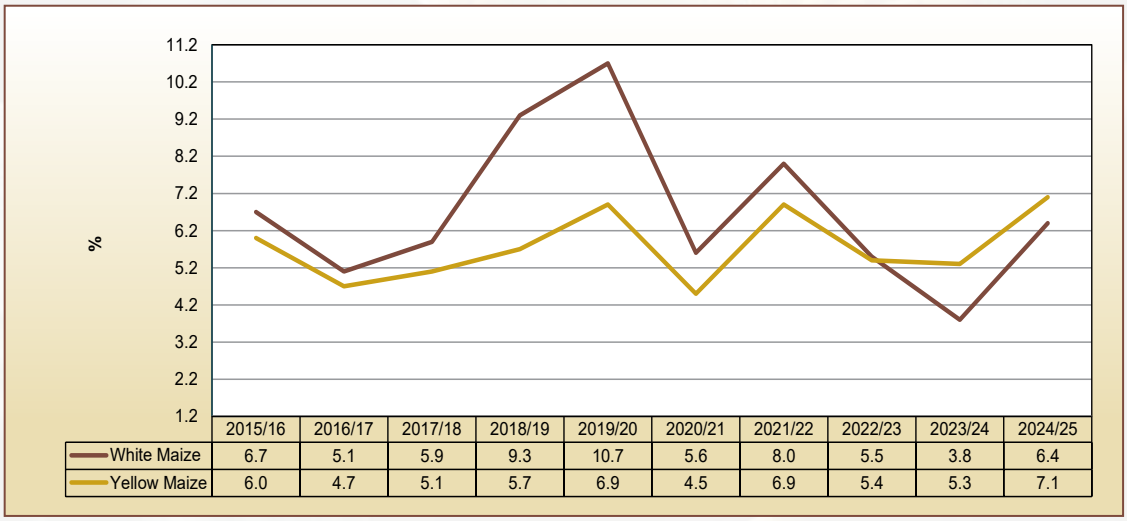
	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	3.8	2.9	3.7	6.8	8.1	3.0	5.7	3.3	1.1	4.5
Yellow Maize	3.1	2.4	3.1	3.7	4.3	2.1	4.3	2.8	1.6	4.7

Graph 38: Percentage Defective Kernels above the 6.35 mm sieve over 10 seasons



	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	2.4	1.8	1.8	1.8	2.0	2.1	1.9	1.7	2.3	1.5
Yellow Maize	2.6	2.0	1.8	1.7	2.3	2.1	2.3	2.3	3.3	2.1

Graph 39: Percentage Defective Kernels below the 6.35 mm sieve over 10 seasons



	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	6.7	5.1	5.9	9.3	10.7	5.6	8.0	5.5	3.8	6.4
Yellow Maize	6.0	4.7	5.1	5.7	6.9	4.5	6.9	5.4	5.3	7.1

Graph 40: Percentage Combined deviations over 10 seasons

TABLE 12: USA GRADING OF WHITE MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	Damaged kernels						% Broken corn and foreign material			Bushel weight (lbs)			% Other colour		
		% Heat damaged			% Total damaged											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: US No.1																
72	Ave. US No.1	0.0			1.9			0.4			59.7			0.1		
	Min. US No.1		0.0			0.5			0.0			56.2			0.0	
	Max. US No.1			0.1			3.0			1.9			63.2			1.1
GRADE: US No. 2																
77	Ave. US No.2	0.0			3.8			0.6			59.8			0.2		
	Min. US No.2		0.0			0.8			0.0			55.8			0.0	
	Max. US No.2			0.2			5.0			2.7			62.5			1.7
GRADE: US No. 3																
68	Ave. US No.3	0.0			6.0			0.6			59.5			0.2		
	Min. US No.3		0.0			2.3			0.0			53.4			0.0	
	Max. US No.3			0.0			7.0			4.0			62.3			1.3
GRADE: US No. 4																
70	Ave. US No.4	0.0			8.0			0.6			59.7			0.2		
	Min. US No.4		0.0			2.5			0.0			51.2			0.0	
	Max. US No.4			1.0			9.8			3.3			66.1			2.0
GRADE: US No. 5																
76	Ave. US No.5	0.0			12.2			0.6			59.5			0.3		
	Min. US No.5		0.0			10.1			0.0			53.4			0.0	
	Max. US No.5			0.1			15.0			3.4			63.4			1.9
GRADE: Sample Grade																
68	Ave. Sample Grade	0.2			20.5			0.7			59.5			0.2		
	Min. Sample Grade		0.0			3.3			0.1			55.8			0.0	
	Max. Sample Grade			8.5			39.8			3.6			64.2			1.9
GRADE: Mixed Corn																
27	Ave. Mixed Corn	0.0			13.2			0.5			58.8			3.0		
	Min. Mixed Corn		0.0			1.7			0.1			54.3			2.1	
	Max. Mixed Corn			1.1			25.7			1.9			61.5			7.0
458	Ave. White	0.0			8.9			0.6			59.6			0.4		
	Min. White		0.0			0.5			0.0			51.2			0.0	
	Max. White			8.5			39.8			4.0			66.1			7.0
1000	Ave. Maize	0.0			7.7			0.6			59.2			0.2		
	Min. Maize		0.0			0.0			0.0			51.2			0.0	
	Max. Maize			8.5			39.8			25.1			66.1			20.0

TABLE 13: USA GRADING OF YELLOW MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	Damaged kernels						% Broken corn and foreign material			Bushel weight (lbs)			% Other colour		
		% Heat damaged			% Total damaged											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: US No.1																
143	Ave. US No.1	0.0			1.7			0.5			59.6			0.1		
	Min. US No.1		0.0			0.0			0.0			56.0			0.0	
	Max. US No.1			0.0			3.0			2.0			62.4			2.9
GRADE: US No. 2																
107	Ave. US No.2	0.0			3.8			0.6			58.9			0.1		
	Min. US No.2		0.0			0.0			0.0			54.0			0.0	
	Max. US No.2			0.2			5.0			2.5			62.5			1.8
GRADE: US No. 3																
88	Ave. US No.3	0.0			5.6			0.7			58.6			0.1		
	Min. US No.3		0.0			0.0			0.0			52.9			0.0	
	Max. US No.3			0.2			7.0			4.0			61.3			3.6
GRADE: US No. 4																
81	Ave. US No.4	0.0			8.4			0.6			58.8			0.1		
	Min. US No.4		0.0			5.0			0.0			51.9			0.0	
	Max. US No.4			0.0			10.0			4.1			61.8			1.7
GRADE: US No. 5																
80	Ave. US No.5	0.0			11.9			0.7			58.9			0.1		
	Min. US No.5		0.0			1.9			0.0			55.8			0.0	
	Max. US No.5			0.2			14.7			7.0			61.5			4.9
GRADE: Sample Grade																
42	Ave. Sample Grade	0.2			19.9			1.7			58.3			0.1		
	Min. Sample Grade		0.0			0.3			0.0			53.2			0.0	
	Max. Sample Grade			7.9			34.1			25.1			60.4			3.3
GRADE: Mixed Corn																
1	Ave. Mixed Corn	0.0			2.3			0.4			58.7			20.0		
	Min. Mixed Corn		-			-			-			-			-	
	Max. Mixed Corn			-			-			-			-			-
542	Ave. Yellow	0.0			6.7			0.7			59.0			0.1		
	Min. Yellow		0.0			0.0			0.0			51.9			0.0	
	Max. Yellow			7.9			34.1			25.1			62.5			20.0
1000	Ave. Maize	0.0			7.7			0.6			59.2			0.2		
	Min. Maize		0.0			0.0			0.0			51.2			0.0	
	Max. Maize			8.5			39.8			25.1			66.1			20.0

TABLE 14: USA GRADING OF WHITE MAIZE PER PROVINCE (2024/25)

Number of samples	Province	Damaged kernels						% Broken corn and foreign material			Bushel weight (lbs)			% Other colour		
		% Heat damaged			% Total damaged											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	Western Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	Northern Cape	0.0	0.0	0.0	1.3	1.1	1.5	0.3	0.0	0.6	63.2	63.2	63.2	0.2	0.0	0.3
156	Free State	0.0	0.0	0.0	10.4	0.6	32.9	0.7	0.0	2.7	59.9	51.2	64.2	0.2	0.0	3.0
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	KwaZulu Natal	0.0	0.0	0.0	5.5	0.7	16.7	0.6	0.0	4.0	59.7	57.7	62.7	0.4	0.0	2.7
184	Mpumalanga	0.1	0.0	8.5	7.6	0.5	36.8	0.5	0.0	3.4	59.3	55.3	62.8	0.5	0.0	7.0
7	Limpopo	0.0	0.0	0.0	1.9	0.5	3.1	0.3	0.0	0.6	60.4	58.6	62.2	0.1	0.0	0.2
29	Gauteng	0.0	0.0	1.1	10.5	0.5	22.9	0.4	0.0	1.6	58.6	54.3	61.3	0.8	0.0	3.1
67	North West	0.0	0.0	1.0	10.0	1.2	39.8	0.7	0.0	3.6	59.8	56.2	66.1	0.1	0.0	2.4
458	**Ave. WHITE**	**0.0**			**8.9**			**0.6**			**59.6**			**0.4**		
	Min. WHITE		**0.0**			**0.5**			**0.0**			**51.2**			**0.0**	
	Max. WHITE			**8.5**			**39.8**			**4.0**			**66.1**			**7.0**

TABLE 15: USA GRADING OF YELLOW MAIZE PER PROVINCE (2024/25)

Number of samples	Province	Damaged kernels						% Broken corn and foreign material			Bushel weight (lbs)			% Other colour		
		% Heat damaged			% Total damaged											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
7	Western Cape	0.0	0.0	0.0	2.3	0.1	11.1	0.7	0.2	1.5	58.4	56.2	60.3	0.0	0.0	0.0
47	Northern Cape	0.0	0.0	0.0	1.6	0.2	6.4	0.5	0.0	2.0	60.8	58.4	62.1	0.0	0.0	0.2
201	Free State	0.0	0.0	7.9	7.5	0.0	29.5	0.8	0.0	25.1	58.7	53.0	62.4	0.1	0.0	3.6
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
34	KwaZulu Natal	0.0	0.0	0.9	10.4	2.4	28.9	0.9	0.1	3.7	59.2	57.2	61.0	0.0	0.0	0.9
208	Mpumalanga	0.0	0.0	0.1	6.8	0.0	34.1	0.6	0.0	7.0	58.9	51.9	62.5	0.2	0.0	20.0
3	Limpopo	0.0	0.0	0.0	1.2	0.7	1.6	0.4	0.1	1.1	59.3	59.0	59.7	0.4	0.0	1.2
24	Gauteng	0.0	0.0	0.0	7.0	0.9	16.3	0.6	0.1	3.2	58.4	52.9	60.2	0.2	0.0	1.8
18	North West	0.0	0.0	0.0	5.2	0.0	19.1	1.6	0.0	9.3	58.4	53.6	62.1	0.0	0.0	0.3
542	**Ave. YELLOW**	**0.0**			**6.7**			**0.7**			**59.0**			**0.1**		
	Min. YELLOW		**0.0**			**0.0**			**0.0**			**51.9**			**0.0**	
	Max. YELLOW			**7.9**			**34.1**			**25.1**			**62.5**			**20.0**

TABLE 16: STANDARDS FOR GRADES OF CLASS WHITE MAIZE AND CLASS YELLOW MAIZE							
Deviation		Maximum permissible deviation					
		White maize			Yellow maize		
		WM1	WM2	WM3	YM1	YM2	YM3
1	Foreign matter [regulation 15]	0.3%	0.5%	0.75%	0.3%	0.5%	0.75%
2	Other colour maize kernels [regulation 16]	3%	6%	10%	2%	5%	5%
3	Defective maize kernels, above and below the 6.35 mm round-hole sieve [regulation 17]	7%	13%	30%	*	*	*
4	Defective maize kernels that can pass through the 6.35 mm round-hole sieve [regulation 17(c)]	*	*	*	4%	10%	30%
5	Defective maize kernels that can not pass through the 6.35 mm round-hole sieve [regulation 17(e)]	*	*	*	9%	20%	30%
6	Deviations referred to in items 1, 2, 3, 4 and 5 collectively: Provided that the deviations are individually within the specified limits	8%	16%	30%	9%	20%	30%

*No spesifications

A consignment of maize shall be classified as Class Other Maize if the consignment does not comply with the standards for Class White Maize or Class Yellow Maize.

Regulations relating to the Grading, Packing and Marking of Maize intended for sale in the Republic of South Africa as published in Government Notices No. R. 4368 of 16 February 2024 and No. R. 4433 of 1 March 2024.

TABLE 17: GRADES AND GRADE REQUIREMENTS FOR CLASS WHITE AND YELLOW MAIZE ACCORDING TO USA GRADING REGULATIONS					
			Maximum limits of -		
			Damaged kernels		
Grades	Minimum test weight per bushel (pounds)		Heat damaged kernels (percent)	Total (percent)	Broken corn and foreign material (percent)
U.S. No. 1	56.0	72.1 kg/hl	0.1	3.0	2.0
U.S. No. 2	54.0	69.5 kg/hl	0.2	5.0	3.0
U.S. No. 3	52.0	66.9 kg/hl	0.5	7.0	4.0
U.S. No. 4	49.0	63.1 kg/hl	1.0	10.0	5.0
U.S. No. 5	46.0	59.2 kg/hl	3.0	15.0	7.0
U.S. Sample Grade	< 46.0	< 59.2 kg/hl	>3.0	>15.0	>7.0
U.S. Sample grade is corn that: a) Does not meet the requirements for the grades U.S. Nos. 1, 2, 3, 4 or 5; or b) Contains stones which have an aggregate weight in excess of 0.1 percent of the sample weight, 2 or more pieces of glass, 3 or more crotalaria seeds (*Crotalaria* spp.), 2 or more castor beans (*Ricinus communis* L.), 4 or more particles of an unknown foreign substance(s) or a commonly recognized harmful or toxic substance(s), 8 or more cockleburs (*Xanthium* spp.) or similar seeds singly or in combination, or animal filth in excess of 0.20 percent in 1,000 grams; or c) Has a musty, sour, or commercially objectionable foreign odor; or d) Is heating or otherwise of distinctly low quality.					
Mixed corn class	When % other colour in yellow maize samples > 5% and white maize samples > 2%				

Source: United States Department of Agriculture. Federal Grain Inspection Service. Grain Inspection Handbook - Book II Grain Grading Procedures, Chapter 4, October 2020.

TABLE 18: PHYSICAL QUALITY CHARACTERISTICS OF WHITE MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)			SAGL Milling index 2025			GYA		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WM1																															
282	Ave. WM1	76.7			36.6			26.2			62.9			10.8			0.8			0.7			5			78			64		
	Min. WM1		66.0			25.0			0.4			0.3			0.7			0.0			0.0			0			36			54	
	Max. WM1			81.3			45.3			86.2			82.4			57.7			6.5			3.7			25			100			70
GRADE: WM2																															
122	Ave. WM2	76.8			36.7			25.6			63.1			11.3			1.1			0.9			6			78			64		
	Min. WM2		69.9			21.6			1.8			33.1			1.7			0.0			0.0			0			40			55	
	Max. WM2			82.7			43.6			64.5			82.1			41.1			5.3			3.4			29			98			69
GRADE: WM3																															
39	Ave. WM3	75.9			37.7			35.3			56.6			8.1			1.4			1.1			4			76			64		
	Min. WM3		72.4			29.1			2.0			33.6			0.9			0.1			0.1			1			49			57	
	Max. WM3			79.5			43.6			64.0			79.3			40.8			2.8			2.2			17			95			68
GRADE: COM																															
15	Ave. COM	76.7			37.9			33.6			58.4			8.0			1.1			0.9			4			76			64		
	Min. COM		73.1			32.2			8.3			43.9			0.3			0.0			0.0			0			62			60	
	Max. COM			79.3			45.8			55.8			76.2			25.3			2.8			1.8			12			87			67
458	Ave. White	76.7			36.8			27.1			62.3			10.6			0.9			0.8			5			78			64		
	Min. White		66.0			21.6			0.4			0.3			0.3			0.0			0.0			0			36			54	
	Max. White			82.7			45.8			86.2			82.4			57.7			6.5			3.7			29			100			70
1000	Ave. Maize	76.2			35.1			18.5			62.7			18.8			1.0			0.8			4			75			63		
	Min. Maize		66.0			18.9			0.0			0.3			0.3			0.0			0.0			0			32			53	
	Max. Maize			82.7			48.9			86.2			87.3			70.8			7.1			5.7			29			100			70

TABLE 19: PHYSICAL QUALITY CHARACTERISTICS OF WHITE MAIZE ACCORDING TO REGION (2024/25)

Number of samples	Region	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)			SAGL Milling index 2025			GYA		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WHITE																															
2	Region 11	81.3	81.3	81.3	36.6	36.6	36.6	4.6	4.2	5.0	74.7	73.5	75.8	20.8	19.2	22.3	1.0	0.7	1.2	0.9	0.7	1.1	4	3	4	89	86	91	67	66	68
7	Region 14	77.2	73.2	79.7	37.4	31.4	41.7	35.6	2.1	56.2	54.9	40.7	74.2	9.5	2.9	23.7	0.6	0.3	0.8	0.6	0.3	0.8	2	0	5	68	62	83	62	60	65
31	Region 15	77.1	72.4	79.7	38.1	31.3	43.5	37.4	2.3	56.7	56.0	41.2	74.4	6.5	1.5	33.2	0.7	0.0	2.5	0.6	0.0	2.2	3	1	9	79	61	93	65	60	68
11	Region 16	76.3	72.7	79.3	36.2	30.7	41.8	30.1	5.9	49.7	59.9	44.9	73.1	10.0	3.5	21.0	1.1	0.0	2.8	0.9	0.0	1.8	3	1	5	82	62	94	65	60	68
4	Region 17	75.0	74.1	76.2	38.5	36.8	40.0	39.1	35.6	47.1	57.2	49.3	61.2	3.8	3.2	5.0	0.8	0.5	1.0	0.8	0.5	1.0	1	0	1	69	67	70	62	62	62
14	Region 18	77.1	73.1	79.3	35.6	25.2	39.0	24.8	9.8	50.1	65.1	47.9	75.3	10.1	2.0	24.3	1.4	0.2	2.8	0.9	0.0	2.0	4	1	12	78	64	89	64	61	67
12	Region 21	76.9	72.5	79.8	36.6	25.0	41.8	25.6	9.2	44.0	64.6	53.2	81.0	9.8	2.5	25.8	1.1	0.0	2.7	0.9	0.0	2.1	6	1	22	79	67	95	65	62	68
9	Region 22	78.5	75.9	80.3	39.2	37.2	42.3	38.1	30.3	49.4	57.3	46.7	65.4	4.6	3.1	8.4	0.7	0.1	2.4	0.6	0.1	1.8	1	0	3	82	73	95	65	63	68
43	Region 23	77.6	75.4	80.5	39.2	32.9	45.3	40.0	4.3	56.5	54.5	40.7	73.7	5.5	0.3	25.7	1.1	0.2	2.6	0.9	0.2	2.0	5	0	17	84	71	100	66	63	70
46	Region 24	76.9	66.0	80.1	37.3	25.0	43.4	34.6	2.6	64.5	56.3	33.1	74.9	9.2	0.7	37.5	0.9	0.0	2.5	0.8	0.0	1.9	4	0	13	77	36	97	64	54	69
3	Region 25	77.8	76.3	79.7	36.3	34.7	38.6	28.4	8.1	45.4	63.7	52.9	74.2	7.9	1.7	17.7	0.8	0.5	1.4	0.8	0.5	1.4	6	5	8	83	69	100	66	62	70
12	Region 26	75.4	68.8	80.3	36.5	27.2	42.0	25.4	9.4	42.9	66.1	52.5	80.9	8.5	3.2	28.5	0.8	0.0	2.7	0.7	0.0	2.1	4	1	8	76	45	97	64	56	69
11	Region 27	78.1	75.6	82.7	37.8	32.7	43.3	31.7	5.2	57.4	59.3	40.0	79.1	9.0	1.5	19.5	0.9	0.3	1.4	0.7	0.1	1.3	5	3	15	84	70	98	66	62	69
20	Region 28	76.6	71.9	80.3	36.5	29.4	42.9	30.1	5.2	52.8	58.4	45.0	77.1	11.6	1.8	36.2	1.0	0.0	5.3	0.7	0.0	3.4	6	0	29	73	40	88	63	55	67
28	Region 29	77.1	74.2	80.9	36.4	21.6	43.6	20.6	1.8	58.0	66.7	40.0	82.4	12.7	2.0	41.1	1.1	0.0	2.7	0.9	0.0	2.6	8	2	23	79	68	90	65	62	67
42	Region 30	75.2	71.1	79.9	34.7	28.5	40.1	19.8	1.9	56.7	68.0	40.8	77.4	12.2	2.5	36.6	1.3	0.1	6.5	1.0	0.1	3.7	6	0	21	73	46	88	63	56	67
16	Region 31	77.7	73.7	79.9	37.3	32.6	42.6	14.6	4.8	27.0	71.9	62.7	82.1	13.5	6.4	20.3	0.6	0.0	1.3	0.5	0.0	1.3	3	0	9	78	66	92	64	61	68
29	Region 32	76.6	73.1	79.6	37.8	29.8	45.8	25.4	2.0	58.2	63.7	38.6	78.4	10.9	2.7	40.8	1.1	0.4	2.3	1.0	0.3	2.0	6	1	20	77	66	95	64	61	68
69	Region 33	76.3	72.3	79.9	35.8	25.6	41.8	22.1	5.2	86.2	65.4	0.3	79.1	12.5	2.6	57.7	0.7	0.0	2.7	0.6	0.0	2.2	4	0	19	76	53	91	64	58	67
29	Region 34	75.5	69.9	78.9	36.8	25.5	41.6	23.9	5.4	47.3	64.7	49.1	80.0	11.4	3.5	27.4	1.0	0.0	3.2	0.7	0.0	2.0	7	0	17	78	64	93	64	61	68
7	Region 35	77.8	75.5	80.0	33.7	26.6	36.6	12.0	0.4	32.3	64.9	51.1	78.8	23.1	4.3	48.5	0.5	0.1	1.1	0.5	0.1	1.1	3	1	6	78	65	94	64	61	68
13	Region 36	76.8	74.3	80.8	33.7	27.8	38.5	13.4	5.9	51.5	66.8	40.5	74.8	19.8	8.0	33.4	1.1	0.1	2.3	0.9	0.1	2.3	5	0	12	77	69	90	64	62	67
458	**Ave. White**	**76.7**			**36.8**			**27.1**			**62.3**			**10.6**			**0.9**			**0.8**			**5**			**78**			**64**		
	Min. White		**66.0**			**21.6**			**0.4**			**0.3**			**0.3**			**0.0**			**0.0**			**0**			**36**			**54**	
	Max. White			**82.7**			**45.8**			**86.2**			**82.4**			**57.7**			**6.5**			**3.7**			**29**			**100**			**70**

TABLE 20: PHYSICAL QUALITY CHARACTERISTICS OF YELLOW MAIZE ACCORDING TO GRADE (2024/25)

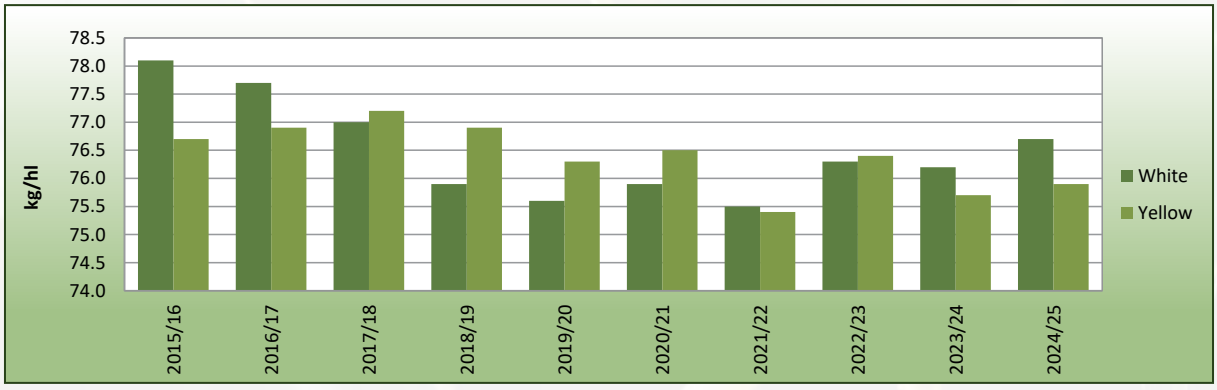
Number of samples	Region	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)			SAGL Milling index 2025			GYA		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: YM1																															
371	Ave. YM1	76.1			34.2			12.0			63.8			24.2			0.9			0.7			3			73			63		
	Min. YM1		66.9			24.2			0.0			31.6			1.9			0.0			0.0			0			32			53	
	Max. YM1			80.5			48.9			56.9			87.3			67.2			7.1			5.7			20			97			69
GRADE: YM2																															
119	Ave. YM2	75.9			32.8			9.2			61.6			29.2			1.1			0.8			5			72			63		
	Min. YM2		70.9			20.9			0.0			31.4			3.1			0.0			0.0			0			34			54	
	Max. YM2			79.3			43.2			42.2			76.7			68.2			3.6			2.6			17			91			67
GRADE: YM3																															
18	Ave. YM3	74.7			31.0			12.1			56.8			31.1			1.8			1.1			5			69			62		
	Min. YM3		68.6			18.9			0.6			27.2			1.8			0.5			0.4			0			45			56	
	Max. YM3			77.1			40.4			56.0			74.5			70.8			5.3			1.8			12			81			65
GRADE: COM																															
34	Ave. COM	74.4			32.7			9.3			64.4			26.3			1.7			1.1			5			70			62		
	Min. COM		68.5			23.2			0.5			42.7			4.0			0.2			0.0			0			53			58	
	Max. COM			79.7			40.1			38.9			76.6			56.1			4.2			3.0			14			87			67
542	Ave. Yellow	75.9			33.7			11.2			63.1			25.7			1.1			0.8			4			72			63		
	Min. Yellow		66.9			18.9			0.0			27.2			1.8			0.0			0.0			0			32			53	
	Max. Yellow			80.5			48.9			56.9			87.3			70.8			7.1			5.7			20			97			69
1000	Ave. Maize	76.2			35.1			18.5			62.7			18.8			1.0			0.8			4			75			63		
	Min. Maize		66.0			18.9			0.0			0.3			0.3			0.0			0.0			0			32			53	
	Max. Maize			82.7			48.9			86.2			87.3			70.8			7.1			5.7			29			100			70

TABLE 21: PHYSICAL QUALITY CHARACTERISTICS OF YELLOW MAIZE ACCORDING TO REGION (2024/25)

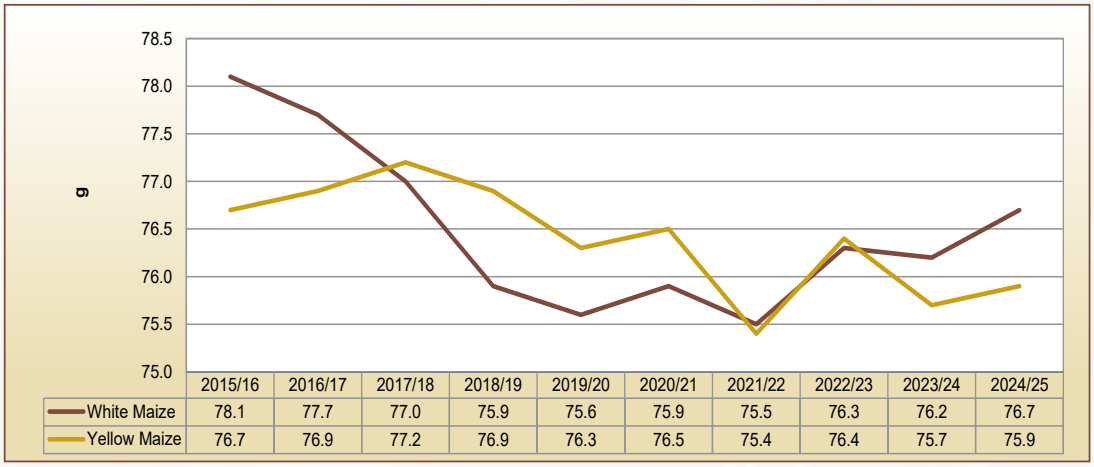
Number of samples	Region	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)			SAGL Milling index 2025			GYA		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: YELLOW																															
2	Region 05	75.5	75.4	75.6	32.9	31.8	34.0	2.1	1.4	2.8	62.2	59.0	65.3	35.8	31.9	39.6	1.3	1.0	1.6	0.5	0.2	0.8	1	0	2	54	54	55	59	58	59
5	Region 06	75.0	72.3	77.7	36.2	34.2	41.2	7.1	1.0	25.2	62.9	58.0	67.1	30.0	7.7	40.6	0.7	0.2	1.1	0.3	0.2	0.6	2	2	3	76	65	83	64	61	66
31	Region 10	78.4	75.2	79.9	35.6	25.8	40.0	1.8	0.0	4.3	57.2	36.9	71.5	40.9	25.2	61.1	1.2	0.1	2.9	1.0	0.0	2.7	1	0	6	75	54	85	64	59	66
16	Region 11	77.8	76.5	78.6	34.5	28.1	38.1	1.6	0.2	4.1	55.3	33.8	66.5	43.1	32.4	65.9	1.5	0.5	2.7	1.2	0.3	2.0	3	0	8	73	59	77	63	60	64
2	Region 15	73.9	70.9	76.9	34.6	28.7	40.4	26.3	2.4	50.2	50.3	48.0	52.5	23.5	1.8	45.1	2.8	2.0	3.6	2.1	1.8	2.4	4	2	6	69	59	79	62	60	65
2	Region 16	76.2	76.1	76.2	36.4	32.7	40.1	6.2	4.3	8.1	74.7	73.2	76.2	19.1	18.7	19.5	2.7	1.8	3.5	2.1	1.4	2.7	5	5	5	73	69	76	63	62	64
14	Region 18	75.2	69.0	79.9	33.4	29.9	38.6	4.0	0.0	7.7	66.0	56.7	73.3	30.0	19.9	41.4	1.4	0.2	2.5	1.0	0.2	2.0	4	0	8	65	52	80	61	58	65
5	Region 21	75.3	74.3	76.5	30.3	28.1	33.0	11.3	6.5	17.3	66.1	61.4	74.2	22.5	14.2	32.1	1.0	0.7	1.3	0.7	0.2	1.2	6	1	17	74	70	77	63	62	64
5	Region 23	77.4	74.9	79.3	34.1	27.0	38.0	9.3	1.0	23.8	62.6	55.6	72.0	28.1	15.0	43.0	0.4	0.1	0.6	0.4	0.1	0.6	4	2	7	78	70	86	64	62	66
22	Region 24	75.7	72.8	80.3	32.8	27.8	40.0	12.7	2.1	56.0	64.5	39.0	74.8	22.8	5.0	38.5	0.7	0.2	1.7	0.6	0.1	1.7	4	1	13	66	47	86	61	57	66
34	Region 25	75.5	68.5	78.5	33.2	18.9	38.7	8.5	1.4	34.6	64.0	27.2	78.8	27.5	3.1	70.8	1.1	0.0	5.3	0.7	0.0	1.9	3	0	14	75	67	86	64	62	66
37	Region 26	75.3	68.2	78.3	33.3	26.8	39.8	13.2	1.2	45.4	64.8	42.7	74.9	22.0	6.0	56.1	0.6	0.0	2.0	0.5	0.0	1.6	4	0	12	75	32	97	64	53	69
21	Region 27	76.3	73.9	77.9	33.4	26.1	48.9	9.2	0.6	32.1	64.0	46.6	75.9	26.8	10.3	46.4	0.9	0.0	2.1	0.7	0.0	1.4	4	0	10	71	62	77	63	60	64
77	Region 28	75.2	70.8	77.7	33.4	27.6	43.2	12.3	0.0	39.6	64.7	43.8	76.7	23.0	3.3	55.4	1.1	0.0	7.1	0.8	0.0	4.5	5	0	17	72	51	85	63	58	66
36	Region 29	77.0	74.4	79.3	36.3	30.9	41.7	17.0	2.2	39.2	65.6	55.4	76.8	17.4	5.0	38.3	0.9	0.0	2.8	0.7	0.0	2.1	4	0	16	78	59	90	64	60	67
58	Region 30	74.9	68.3	80.5	33.8	22.5	45.7	17.6	0.0	56.9	63.7	31.6	79.3	18.6	1.9	67.2	1.0	0.0	6.3	0.8	0.0	5.7	4	0	20	72	53	87	63	58	67
47	Region 31	76.2	71.4	80.3	33.9	23.2	44.4	10.4	0.0	40.0	63.3	43.7	75.3	26.3	4.2	53.6	1.1	0.0	4.2	0.8	0.0	3.0	5	0	14	73	54	91	63	58	67
42	Region 32	75.6	66.9	77.8	33.8	28.7	39.4	14.5	1.4	33.0	63.3	48.0	87.3	22.1	4.4	49.9	0.9	0.0	3.4	0.7	0.0	2.8	4	0	12	73	49	86	63	57	66
25	Region 33	75.9	72.4	79.1	30.8	20.9	38.1	15.4	1.2	38.9	61.4	40.4	71.8	23.1	4.0	58.2	0.6	0.0	1.6	0.4	0.0	1.0	3	0	10	71	51	86	63	58	66
24	Region 34	75.1	68.0	77.5	32.7	22.7	38.9	10.0	0.4	25.0	62.9	31.4	77.0	27.1	6.1	68.2	1.2	0.2	3.3	0.8	0.0	1.8	5	1	18	75	59	85	63	60	66
3	Region 35	76.3	75.9	76.9	32.7	26.5	39.6	19.9	0.0	56.0	47.2	40.4	59.0	32.9	3.6	57.9	2.0	0.6	3.7	1.4	0.6	2.6	2	0	3	61	34	80	60	54	65
34	Region 36	76.3	73.6	78.5	33.7	27.6	38.4	4.0	0.5	19.4	61.2	45.9	71.3	34.7	14.4	53.5	1.6	0.0	3.9	1.2	0.0	2.6	4	0	11	66	45	87	61	56	67
542	**Ave. Yellow**	**75.9**			**33.7**			**11.2**			**63.1**			**25.7**			**1.1**			**0.8**			**4**			**72**			**63**		
	Min. Yellow		**66.9**			**18.9**			**0.0**			**27.2**			**1.8**			**0.0**			**0.0**			**0**			**32**			**53**	
	Max. Yellow			**80.5**			**48.9**			**56.9**			**87.3**			**70.8**			**7.1**			**5.7**			**20**			**97**			**69**

TABLE 22: PHYSICAL QUALITY CHARACTERISTICS OF WHITE AND YELLOW MAIZE OVER 10 SEASONS

Season	Number of samples	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve					
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
White Maize																									
2015/16	415	78.1	68.5	83.9	32.4	20.8	40.8	15.2	0.3	99.4	66.7	0.1	89.5	18.2	0.0	63.8	0.9	0.0	7.2	0.4	0.0	4.3	5	0	30
2016/17	549	77.7	70.0	81.8	35.0	22.8	43.8	22.1	1.8	64.2	64.1	13.6	82.4	13.7	0.7	62.6	1.2	0.0	9.9	0.8	0.0	9.0	8	0	42
2017/18	451	77.0	63.4	81.7	34.3	18.3	45.8	26.2	1.5	58.7	62.8	39.8	83.7	11.0	1.5	32.1	1.0	0.0	3.8	0.7	0.0	2.7	11	1	30
2018/19	404	75.9	61.0	83.6	33.4	18.7	51.1	24.6	0.0	93.8	63.4	5.8	79.9	12.0	0.4	46.8	1.6	0.0	7.9	1.2	0.0	5.6	17	1	58
2019/20	516	75.6	63.4	82.0	34.9	19.3	44.7	27.8	1.0	63.7	62.0	34.8	83.8	10.2	1.2	49.4	1.1	0.0	6.3	0.8	0.0	4.1	16	2	58
2020/21	560	75.9	68.5	81.1	33.3	18.9	42.6	21.6	0.0	55.1	65.1	41.8	83.6	13.3	1.3	55.7	0.8	0.0	4.3	0.6	0.0	3.3	12	1	41
2021/22	524	75.5	66.1	81.0	35.1	14.6	45.9	28.2	0.0	68.6	61.8	29.2	81.6	10.0	0.2	41.2	1.2	0.0	20.2	0.9	0.0	9.2	11	0	50
2022/23	520	76.3	69.1	81.0	35.3	23.8	53.8	24.5	1.5	62.2	62.9	36.7	80.4	12.5	0.4	39.6	1.1	0.0	10.6	0.9	0.0	6.1	8	0	63
2023/24	518	76.2	66.9	81.5	31.4	15.1	42.7	18.8	0.0	62.7	62.3	0.6	95.5	18.9	1.6	79.9	0.9	0.0	4.7	0.7	0.0	3.6	4	0	35
2024/25	458	76.7	66.0	82.7	36.8	21.6	45.8	27.1	0.4	86.2	62.3	0.3	82.4	10.6	0.3	57.7	0.9	0.0	6.5	0.8	0.0	3.7	5	0	29
Weighted Average		**76.5**			**34.2**			**23.7**			**63.3**			**13.0**			**1.1**			**0.8**			**10**		
Minimum			**61.0**			**14.6**			**0.0**			**0.1**			**0.0**			**0.0**			**0.0**			**0**	
Maximum				**83.9**			**53.8**			**99.4**			**95.5**			**79.9**			**20.2**			**9.2**			**63**
Yellow Maize																									
2015/16	505	76.7	59.8	81.7	31.8	17.1	43.1	11.8	0.3	34.1	66.6	15.6	93.6	21.6	0.2	77.9	1.0	0.0	4.5	0.5	0.0	4.1	5	0	31
2016/17	451	76.9	67.6	82.4	33.5	18.4	43.3	11.4	0.0	71.9	65.6	13.0	90.9	23.0	1.6	69.7	1.1	0.1	8.6	0.8	0.0	5.3	8	0	50
2017/18	449	77.2	59.6	82.5	31.5	15.6	40.7	11.1	0.0	72.4	66.7	24.2	82.2	22.2	2.5	62.0	0.9	0.0	4.7	0.7	0.0	3.3	9	1	38
2018/19	404	76.9	69.0	83.3	30.6	19.5	41.4	8.3	0.0	33.2	66.4	24.2	85.2	25.3	4.7	74.5	1.0	0.0	6.5	0.7	0.0	3.9	13	2	39
2019/20	374	76.3	63.9	82.4	30.4	15.0	39.3	8.4	0.0	30.1	65.1	30.2	82.1	26.5	6.1	68.5	1.0	0.0	6.0	0.7	0.0	3.7	13	2	48
2020/21	440	76.5	70.7	82.6	31.2	19.9	43.8	7.4	0.0	32.5	65.9	5.6	81.8	26.7	6.1	88.1	0.8	0.0	3.5	0.6	0.0	2.5	12	1	49
2021/22	476	75.4	61.5	80.8	31.1	19.0	42.1	9.4	0.0	54.0	65.7	14.1	82.1	24.9	2.9	85.9	1.1	0.0	4.4	0.9	0.0	3.4	11	0	46
2022/23	480	76.4	69.1	82.2	31.6	22.2	39.6	7.0	0.0	37.0	62.1	17.4	81.1	30.9	2.8	82.2	1.4	0.0	69.0	1.0	0.0	67.3	8	0	57
2023/24	482	75.7	66.8	81.4	28.7	16.3	40.5	5.8	0.0	36.1	57.0	6.0	80.4	37.2	3.7	94.0	1.1	0.0	5.2	0.8	0.0	4.6	5	0	42
2024/25	542	75.9	66.9	80.5	33.7	18.9	48.9	11.2	0.0	56.9	63.1	27.2	87.3	25.7	1.8	70.8	1.1	0.0	7.1	0.8	0.0	5.7	4	0	20
Weighted Average		**76.4**			**31.5**			**9.2**			**64.3**			**26.4**			**1.1**			**0.8**			**8**		
Minimum			**59.6**			**15.0**			**0.0**			**5.6**			**0.2**			**0.0**			**0.0**			**0**	
Maximum				**83.3**			**48.9**			**72.4**			**93.6**			**94.0**			**69.0**			**67.3**			**57**
White & Yellow Maize																									
2015/16	920	77.3	59.8	83.9	32.1	17.1	43.1	13.3	0.3	99.4	66.7	0.1	93.6	20.0	0.0	77.9	1.0	0.0	7.2	0.5	0.0	4.3	5	0	31
2016/17	1000	77.3	67.6	82.4	34.3	18.4	43.8	17.3	0.0	71.9	64.8	13.0	90.9	17.9	0.7	69.7	1.2	0.0	9.9	0.8	0.0	9.0	11	0	40
2017/18	900	77.1	59.6	82.5	32.9	15.6	45.8	18.7	0.0	72.4	64.7	24.2	83.7	16.6	1.5	62.0	1.0	0.0	4.7	0.7	0.0	3.3	10	1	38
2018/19	808	76.4	61.0	83.6	32.0	18.7	51.1	16.4	0.0	93.8	64.9	5.8	85.2	18.7	0.4	74.5	1.3	0.0	7.9	0.9	0.0	5.6	15	1	58
2019/20	890	75.9	63.4	82.4	33.0	15.0	44.7	19.7	0.0	63.7	63.3	30.2	83.8	17.1	1.2	68.5	1.1	0.0	6.3	0.8	0.0	4.1	15	2	58
2020/21	1000	76.2	68.5	82.6	32.4	18.9	43.8	15.4	0.0	55.1	65.5	5.6	83.6	19.2	1.3	88.1	0.8	0.0	4.3	0.6	0.0	3.3	12	1	49
2021/22	1000	75.4	61.5	81.0	33.2	14.6	45.9	19.3	0.0	68.6	63.7	14.1	82.1	17.1	0.2	85.9	1.2	0.0	20.2	0.9	0.0	9.2	11	0	50
2022/23	1000	76.3	69.1	82.2	33.5	22.2	53.8	16.1	0.0	62.2	62.6	17.4	81.1	21.3	0.4	82.2	1.2	0.0	69.0	1.0	0.0	67.3	8	0	63
2023/24	1000	75.9	66.8	81.5	30.1	15.1	42.7	12.5	0.0	62.7	59.7	0.6	95.5	27.7	1.6	94.0	1.0	0.0	5.2	0.8	0.0	4.6	4	0	42
2024/25	1000	76.2	66.0	82.7	35.1	18.9	48.9	18.5	0.0	86.2	62.7	0.3	87.3	18.8	0.3	70.8	1.0	0.0	7.1	0.8	0.0	5.7	4	0	29
Weighted Average		**76.4**			**32.9**			**16.7**			**63.8**			**19.5**			**1.1**			**0.8**			**9**		
Minimum			**59.6**			**14.6**			**0.0**			**0.1**			**0.0**			**0.0**			**0.0**			**0**	
Maximum				**83.9**			**53.8**			**99.4**			**95.5**			**94.0**			**69.0**			**67.3**			**63**

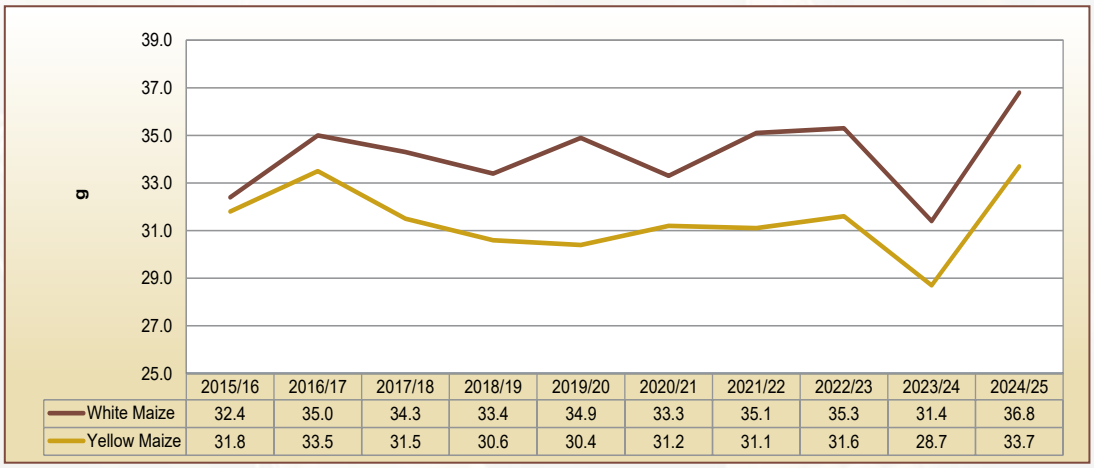


Graph 41: Test weight of white and yellow maize over 10 seasons



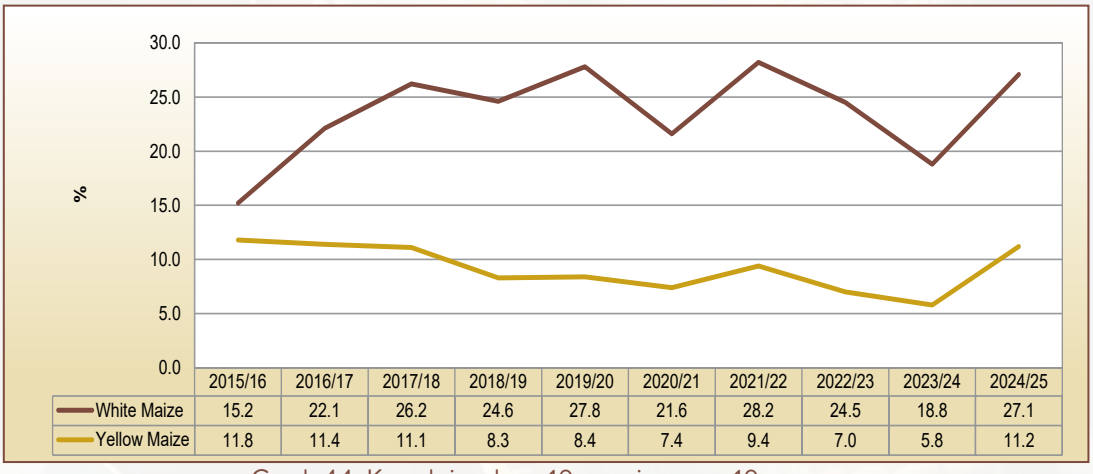
	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	78.1	77.7	77.0	75.9	75.6	75.9	75.5	76.3	76.2	76.7
Yellow Maize	76.7	76.9	77.2	76.9	76.3	76.5	75.4	76.4	75.7	75.9

Graph 42: Test weight over 10 seasons



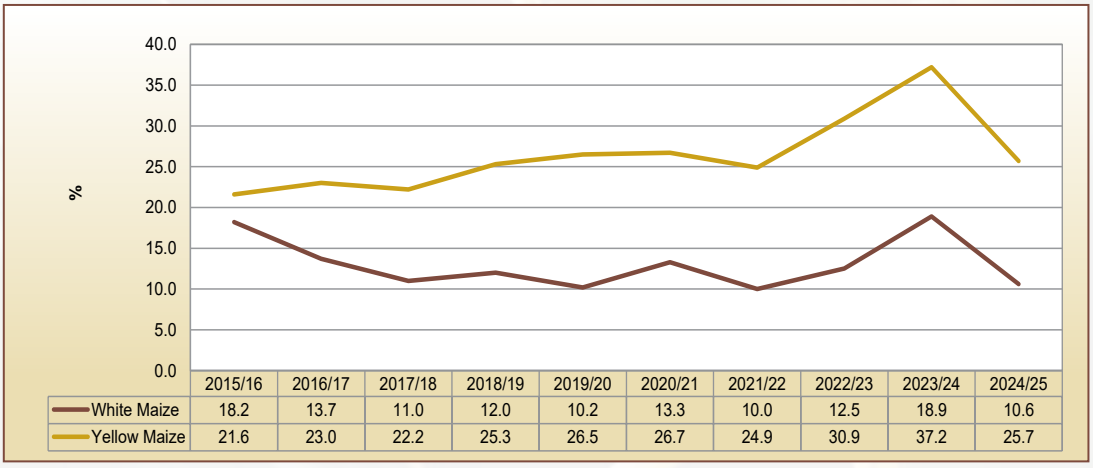
	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	32.4	35.0	34.3	33.4	34.9	33.3	35.1	35.3	31.4	36.8
Yellow Maize	31.8	33.5	31.5	30.6	30.4	31.2	31.1	31.6	28.7	33.7

Graph 43: Kernel size above 10 mm sieve over 10 seasons



	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	15.2	22.1	26.2	24.6	27.8	21.6	28.2	24.5	18.8	27.1
Yellow Maize	11.8	11.4	11.1	8.3	8.4	7.4	9.4	7.0	5.8	11.2

Graph 44: Kernel size above 10 mm sieve over 10 seasons



	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	18.2	13.7	11.0	12.0	10.2	13.3	10.0	12.5	18.9	10.6
Yellow Maize	21.6	23.0	22.2	25.3	26.5	26.7	24.9	30.9	37.2	25.7

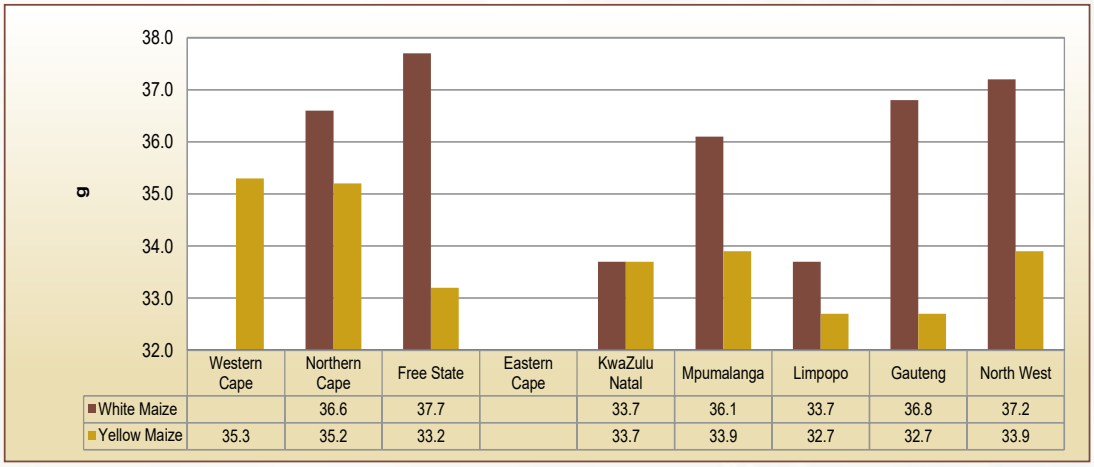
Graph 45: Kernel size below 8 mm sieve over 10 seasons

TABLE 23: PHYSICAL QUALITY CHARACTERISTICS OF WHITE MAIZE PER PROVINCE (2024/25)

Number of samples	Province	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)			SAGL Milling index 2025			GYA		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	Western Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	Northern Cape	81.3	81.3	81.3	36.6	36.6	36.6	4.6	4.2	5.0	74.6	73.5	75.8	20.8	19.2	22.3	1.0	0.7	1.2	0.9	0.7	1.1	4	3	4	89	86	91	67	66	68
156	Free State	77.1	66.0	82.7	37.7	25.0	45.3	34.0	2.6	64.5	57.8	33.1	81.0	8.2	0.3	37.5	1.0	0.0	5.3	0.8	0.0	3.4	5	0	29	79	36	100	65	54	70
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	KwaZulu Natal	76.8	74.3	80.8	33.7	27.8	38.5	13.4	5.9	51.5	66.8	40.5	74.8	19.8	8.0	33.4	1.1	0.1	2.3	0.9	0.1	2.3	5	0	12	77	69	90	64	62	67
184	Mpumalanga	76.3	71.1	80.9	36.1	21.6	45.8	21.2	1.8	86.2	66.5	0.3	82.4	12.3	2.0	57.7	0.9	0.0	6.5	0.8	0.0	3.7	5	0	23	76	46	95	64	56	68
7	Limpopo	77.8	75.5	80.0	33.7	26.6	36.6	12.0	0.4	32.3	64.9	51.1	78.8	23.1	4.3	48.5	0.5	0.1	1.1	0.5	0.1	1.1	3	1	6	78	65	94	64	61	68
29	Gauteng	75.5	69.9	78.9	36.8	25.5	41.6	23.9	5.4	47.3	64.7	49.1	80.0	11.4	3.5	27.4	1.0	0.0	3.2	0.7	0.0	2.0	7	0	17	78	64	93	64	61	68
67	North West	76.8	72.4	79.7	37.2	25.2	43.5	33.5	2.1	56.7	58.5	40.7	75.3	8.0	1.5	33.2	0.9	0.0	2.8	0.7	0.0	2.2	3	0	12	78	61	95	64	60	68
458	**Ave. WHITE**	**76.7**			**36.8**			**27.1**			**62.3**			**10.6**			**0.9**			**0.8**			**5**			**78**			**64**		
	Min. WHITE		**66.0**			**21.6**			**0.4**			**0.3**			**0.3**			**0.0**			**0.0**			**0**			**36**			**54**	
	Max. WHITE			**82.7**			**45.8**			**86.2**			**82.4**			**57.7**			**6.5**			**3.7**			**29**			**100**			**70**

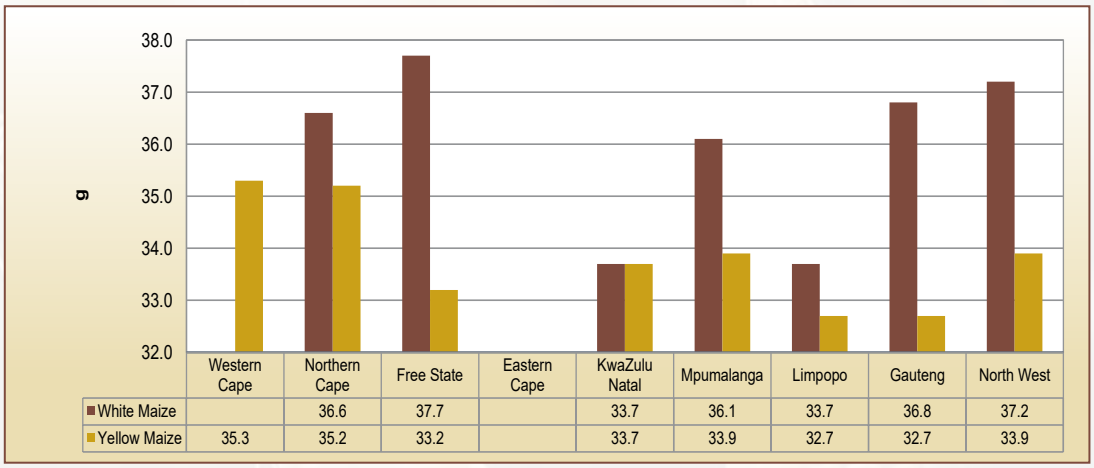
TABLE 24: PHYSICAL QUALITY CHARACTERISTICS OF YELLOW MAIZE PER PROVINCE (2024/25)

Number of samples	Province	Test weight (kg/hl)			100 kernel mass (g)			Kernel size (%)									Breakage susceptibility (%)						Stress cracks (%)			SAGL Milling index 2025			GYA		
								Above 10 mm sieve			Above 8 mm sieve			Below 8 mm sieve			< 6.35 mm sieve			< 4.75 mm sieve											
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
7	Western Cape	75.2	72.3	77.7	35.3	31.8	41.2	5.6	1.0	25.2	62.7	58.0	67.1	31.6	7.7	40.6	0.9	0.2	1.6	0.4	0.2	0.8	2	0	3	70	54	83	62	58	66
47	Northern Cape	78.2	75.2	79.9	35.2	25.8	40.0	1.7	0.0	4.3	56.6	33.8	71.5	41.7	25.2	65.9	1.3	0.1	2.9	1.1	0.0	2.7	2	0	8	74	54	85	63	59	66
201	Free State	75.5	68.2	80.3	33.2	18.9	48.9	11.4	0.0	56.0	64.6	27.2	78.8	24.0	3.1	70.8	0.9	0.0	7.1	0.7	0.0	4.5	4	0	17	73	32	97	63	53	69
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-	-	-	-	-	-
34	KwaZulu Natal	76.3	73.6	78.5	33.7	27.6	38.4	4.0	0.5	19.4	61.2	45.9	71.3	34.7	14.4	53.5	1.6	0.0	3.9	1.2	0.0	2.6	4	0	11	66	45	87	62	56	67
208	Mpumalanga	75.8	66.9	80.5	33.9	20.9	45.7	15.0	0.0	56.9	63.6	31.6	87.3	21.4	1.9	67.2	0.9	0.0	6.3	0.7	0.0	5.7	4	0	20	73	49	91	63	57	67
3	Limpopo	76.3	75.9	76.9	32.7	26.5	39.6	19.9	0.0	56.0	47.2	40.4	59.0	32.9	3.6	57.9	2.0	0.6	3.7	1.4	0.6	2.6	2	0	3	61	34	80	60	54	65
24	Gauteng	75.1	68.0	77.5	32.7	22.7	38.9	10.0	0.4	25.0	62.9	31.4	77.0	27.1	6.1	68.2	1.2	0.2	3.3	0.8	0.0	1.8	5	1	18	75	60	85	63	60	66
18	North West	75.2	69.0	79.9	33.9	28.7	40.4	6.7	0.0	50.2	65.2	48.0	76.2	28.0	1.8	45.1	1.7	0.2	3.6	1.2	0.2	2.7	4	0	8	67	52	80	62	58	65
542	**Ave. YELLOW**	**75.9**			**33.7**			**11.2**			**63.1**			**25.7**			**1.1**			**0.8**			**4**			**72**			**63**		
	Min. YELLOW		**66.9**			**18.9**			**0.0**			**27.2**			**1.8**			**0.0**			**0.0**			**0**			**32**			**53**	
	Max. YELLOW			**80.5**			**48.9**			**56.9**			**87.3**			**70.8**			**7.1**			**5.7**			**20**			**97**			**69**



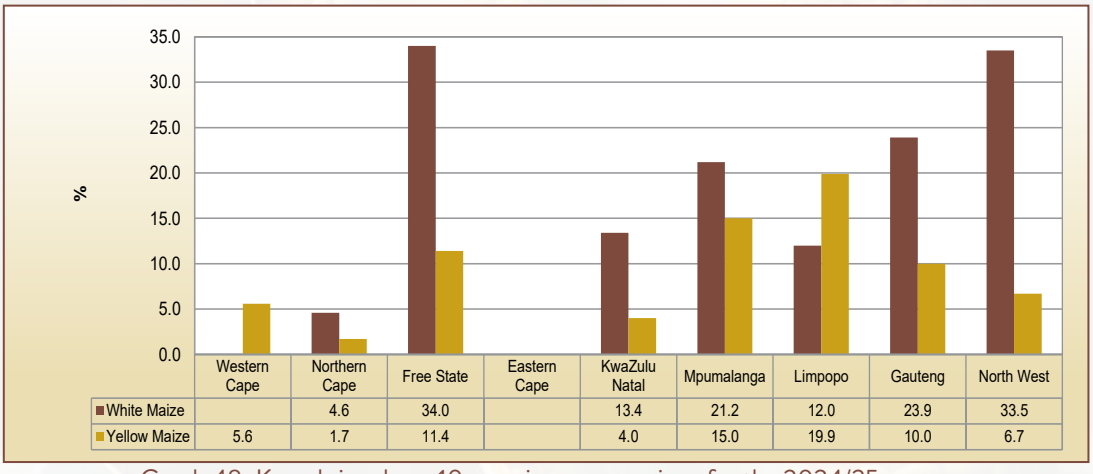
	Western Cape	Northern Cape	Free State	Eastern Cape	KwaZulu Natal	Mpumalanga	Limpopo	Gauteng	North West
White Maize		36.6	37.7		33.7	36.1	33.7	36.8	37.2
Yellow Maize	35.3	35.2	33.2		33.7	33.9	32.7	32.7	33.9

Graph 46: Test weight per province for the 2024/25 season



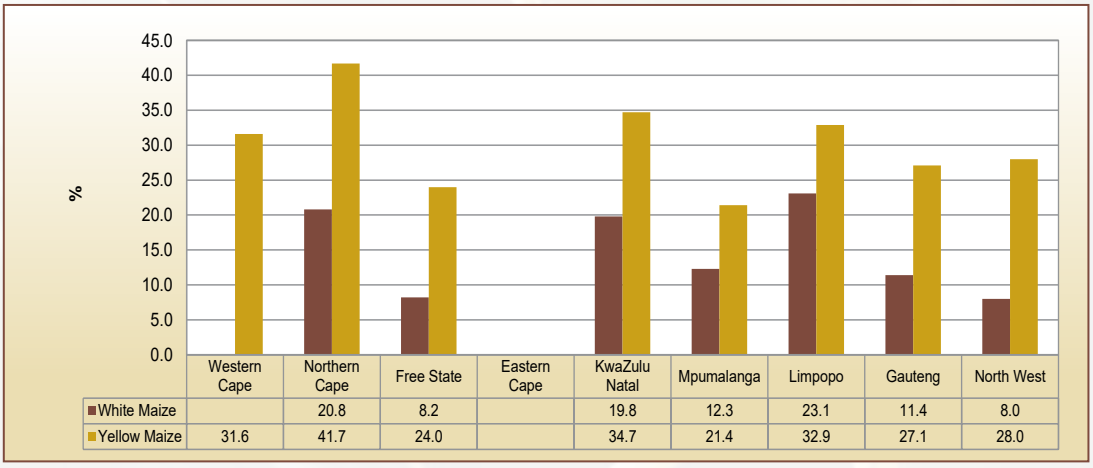
	Western Cape	Northern Cape	Free State	Eastern Cape	KwaZulu Natal	Mpumalanga	Limpopo	Gauteng	North West
White Maize		36.6	37.7		33.7	36.1	33.7	36.8	37.2
Yellow Maize	35.3	35.2	33.2		33.7	33.9	32.7	32.7	33.9

Graph 47: 100 Kernel mass per province for the 2024/25 season



	Western Cape	Northern Cape	Free State	Eastern Cape	KwaZulu Natal	Mpumalanga	Limpopo	Gauteng	North West
White Maize		4.6	34.0		13.4	21.2	12.0	23.9	33.5
Yellow Maize	5.6	1.7	11.4		4.0	15.0	19.9	10.0	6.7

Graph 48: Kernel size above 10 mm sieve per province for the 2024/25 season



	Western Cape	Northern Cape	Free State	Eastern Cape	KwaZulu Natal	Mpumalanga	Limpopo	Gauteng	North West
White Maize		20.8	8.2		19.8	12.3	23.1	11.4	8.0
Yellow Maize	31.6	41.7	24.0		34.7	21.4	32.9	27.1	28.0

Graph 49: Kernel size below 8 mm sieve per province for the 2024/25 season

TABLE 25: ROFF MILLING AND WHITENESS INDEX OF WHITE MAIZE ACCORDING TO GRADE (2024/25)

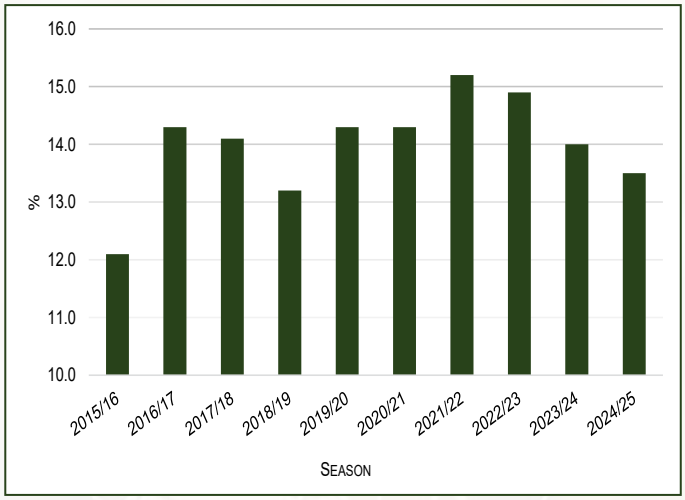
Number of samples	Region	Roff Milling																Whiteness index					
		Break 1, %			Break 2, %			Break 3, %			Grits, %			Chop, %			Extraction, % (Total meal)			Whiteness index unsifted			Whiteness index sifted 87:13		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WM1																									
106	Ave. WM1	13.5			7.8			11.2			43.9			23.3			76.4			32.4			30.1		
	Min. WM1		8.9			6.6			8.0			36.9			0.0			72.3			21.8			18.3	
	Max. WM1			17.9			10.7			12.6			59.2			27.7			84.2			42.5			42.6
GRADE: WM2																									
64	Ave. WM2	13.5			7.9			11.3			43.6			23.7			76.3			29.9			27.9		
	Min. WM2		9.7			6.9			9.4			34.0			21.3			71.7			18.2			17.8	
	Max. WM2			18.1			14.4			12.5			49.2			28.3			78.7			37.6			36.2
GRADE: WM3																									
22	Ave. WM3	13.1			7.8			11.3			44.3			23.6			76.4			28.3			26.6		
	Min. WM3		9.2			6.8			10.6			35.8			21.7			73.5			19.9			16.6	
	Max. WM3			17.4			9.1			12.3			50.3			26.5			78.3			34.2			32.3
GRADE: COM																									
9	Ave. COM	13.7			7.9			11.4			43.2			23.9			76.1			30.2			27.3		
	Min.COM		12.0			7.5			11.0			37.5			22.1			73.3			26.3			24.1	
	Max. COM			16.1			8.3			12.1			47.1			26.7			77.9			37.0			32.3
201	Ave. White	13.5			7.8			11.3			43.8			23.5			76.4			31.1			28.9		
	Min. White		8.9			6.6			8.0			34.0			0.0			71.7			18.2			16.6	
	Max. White			18.1			11.4			12.6			59.2			28.3			84.2			42.5			42.6

TABLE 26: ROFF MILLING AND WHITENESS INDEX OF WHITE MAIZE PER PROVINCE (2024/25)

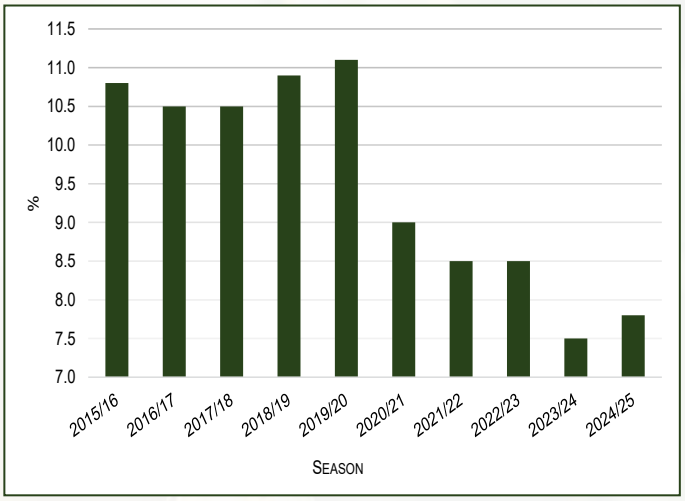
Number of samples	Province	Roff Milling																Whiteness index					
		Break 1, %			Break 2, %			Break 3, %			Grits, %			Chop, %			Extraction, % (Total meal)			Whiteness index unsifted			Whiteness index sifted 87:13		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	Western Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	Northern Cape	11.8	11.7	12.0	7.0	6.9	7.1	11.6	11.5	11.7	46.3	46.2	46.3	23.3	23.2	23.4	76.7	76.6	76.8	33.7	33.2	34.2	30.4	29.7	31.1
73	Free State	13.1	8.9	17.9	7.7	6.6	8.6	11.3	8.6	12.4	44.8	36.9	59.2	22.8	0.0	26.8	76.9	73.2	84.2	31.1	23.9	40.4	29.3	20.0	37.7
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
9	KwaZulu Natal	14.3	11.8	16.2	7.8	7.3	8.5	11.5	11.1	12.5	42.7	40.4	46.3	23.8	21.5	25.2	76.2	74.8	78.5	32.8	28.3	38.3	30.1	23.4	35.4
71	Mpumalanga	13.8	10.6	18.1	8.1	7.0	11.4	11.3	8.0	12.6	42.7	34.0	48.7	24.1	21.0	28.3	75.9	71.7	79.0	30.9	18.2	39.1	28.7	17.8	39.5
4	Limpopo	14.3	12.5	16.1	7.4	6.8	8.1	10.8	8.6	11.5	42.7	40.2	45.3	24.8	23.2	27.0	75.2	73.0	76.8	37.7	33.3	42.5	36.0	30.4	42.6
-	Gauteng	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
42	North West	13.3	9.2	17.4	7.8	7.0	9.1	11.3	9.9	12.1	44.1	38.2	50.3	23.5	22.0	26.0	76.5	74.0	78.0	30.0	19.9	37.3	27.6	16.6	34.1
201	Ave. White	13.5			7.8			11.3			43.8			23.5			76.4			31.1			28.9		
	Min. White		8.9			6.6			8.0			34.0			0.0			71.7			18.2			16.6	
	Max. White			18.1			11.4			12.6			59.2			28.3			84.2			42.5			42.6

TABLE 27: ROFF MILLING AND WHITENESS INDEX OF WHITE MAIZE ACCORDING TO REGION (2024/25)

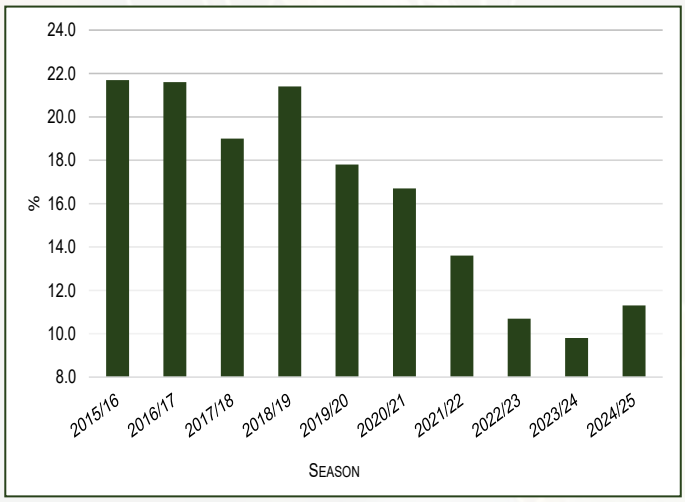
Number of samples	Region	Roff Milling																		Whiteness index					
		Break 1, %			Break 2, %			Break 3, %			Grits, %			Chop, %			Extraction, % (Total meal)			Whiteness index unsifted			Whiteness index sifted 87:13		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
WHITE																									
2	Region 11	11.8	11.7	12.0	7.0	6.9	7.1	11.6	11.5	11.7	46.3	46.2	46.3	23.3	23.3	23.4	76.7	76.6	76.8	33.7	33.2	34.2	30.4	29.7	31.1
-	Region 12	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	Region 13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
3	Region 14	15.0	13.9	17.1	8.1	8.0	8.4	11.9	11.6	12.1	41.0	38.9	42.6	23.9	23.5	24.4	76.1	75.6	76.5	34.7	32.6	36.6	31.8	30.3	33.6
16	Region 15	12.5	10.3	14.2	7.6	7.2	8.0	11.1	9.9	11.6	45.0	42.4	46.8	23.8	22.0	26.0	76.2	74.0	78.0	31.4	24.8	34.3	29.4	24.8	34.1
6	Region 16	12.7	9.2	17.4	7.6	7.2	8.1	10.9	10.5	11.4	45.8	41.6	50.3	23.0	22.4	24.0	77.0	76.0	77.6	28.3	25.3	32.0	25.8	22.1	28.9
3	Region 17	16.4	15.8	17.2	8.8	8.7	9.1	11.8	11.6	12.0	39.6	38.8	40.3	23.5	23.2	23.9	76.5	76.1	76.8	31.5	26.2	34.3	29.6	25.9	31.7
14	Region 18	13.5	10.6	16.2	7.6	7.0	8.5	11.5	10.8	12.1	44.0	38.2	49.2	23.3	22.2	25.7	76.7	74.3	77.8	27.7	19.9	37.3	24.9	16.6	32.4
-	Region 19	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	Region 20	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4	Region 21	14.2	11.3	17.9	7.7	7.2	8.5	11.1	10.8	11.4	42.0	36.9	47.5	24.9	22.7	26.8	75.1	73.2	77.3	34.7	23.9	40.4	31.8	20.6	37.7
8	Region 22	12.7	11.3	14.2	7.9	7.4	8.5	11.6	11.0	12.1	45.1	43.4	47.1	22.7	20.9	24.4	77.3	75.6	79.1	29.4	24.8	31.9	27.7	23.5	31.5
38	Region 23	13.0	10.0	15.1	7.6	6.6	8.6	11.4	10.6	12.3	45.1	41.6	51.8	22.3	0.0	25.6	77.1	74.4	79.5	31.1	25.4	38.4	29.2	20.0	36.2
17	Region 24	13.2	9.7	17.2	7.8	6.8	8.2	11.0	8.6	11.8	44.5	39.6	49.2	23.6	21.7	26.5	76.4	73.5	78.3	31.2	25.5	36.4	29.6	24.3	34.3
1	Region 25	8.9	8.9	8.9	7.2	7.2	7.2	8.9	8.9	8.9	59.2	59.2	59.2	15.8	15.8	15.8	84.2	84.2	84.2	24.0	24.0	24.0	23.4	23.4	23.4
-	Region 26	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
-	Region 27	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
5	Region 28	14.4	13.3	16.1	7.9	7.6	8.1	11.5	9.4	12.4	42.1	40.0	44.3	24.0	22.5	26.4	76.0	73.6	77.5	32.9	29.2	37.6	30.6	26.0	35.0
-	Region 29	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
22	Region 30	14.5	11.7	18.1	8.2	7.6	9.1	11.0	8.0	12.2	41.4	34.0	46.3	24.9	21.0	28.3	75.1	71.7	79.0	31.6	24.2	37.0	30.1	20.5	36.2
15	Region 31	12.9	10.8	14.8	7.7	7.0	8.4	11.3	10.5	11.9	44.6	40.4	47.4	23.5	22.0	25.7	76.5	74.3	78.0	28.4	18.2	37.1	25.4	17.8	34.3
24	Region 32	13.7	10.6	16.2	8.4	7.3	11.4	11.4	10.5	12.6	43.2	40.5	48.7	23.3	21.3	25.2	76.7	74.8	78.7	31.6	26.9	39.1	29.0	22.0	39.5
10	Region 33	14.0	12.6	15.7	7.8	7.6	8.2	11.4	11.0	11.8	41.4	37.0	44.1	25.3	23.2	27.7	74.7	72.3	76.8	31.7	28.0	35.2	29.7	26.6	35.3
-	Region 34	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
4	Region 35	14.3	12.5	16.1	7.4	6.8	8.1	10.8	8.6	11.5	42.7	40.2	45.3	24.8	23.2	27.0	75.2	73.0	76.8	37.7	33.3	42.5	36.0	30.4	42.6
9	Region 36	14.3	11.8	16.2	7.8	7.3	8.5	11.5	11.1	12.5	42.7	40.4	46.3	23.8	21.5	25.2	76.2	74.8	78.5	32.8	28.3	38.3	30.1	23.4	35.4
201	**Ave. White**	**13.5**			**7.8**			**11.3**			**43.8**			**23.5**			**76.4**			**31.1**			**28.9**		
	Min. White		**8.9**			**6.6**			**8.0**			**34.0**			**0.0**			**71.7**			**18.2**			**16.6**	
	Max. White			**18.1**			**11.4**			**12.6**			**59.2**			**28.3**			**84.2**			**42.5**			**42.6**



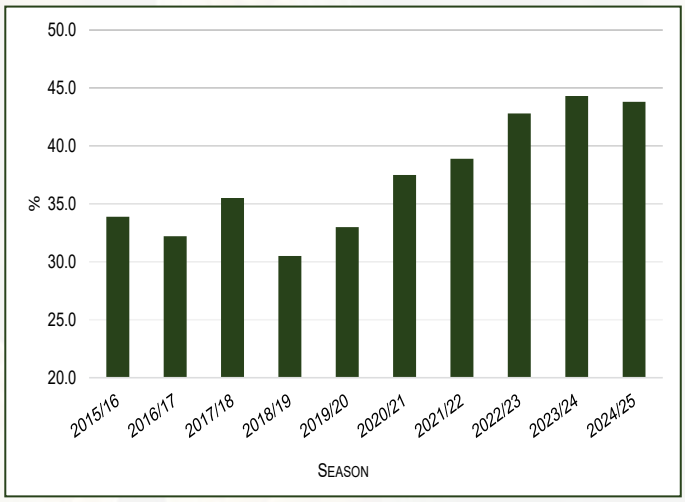
Graph 50: Average Roff Mill Break 1 meal fraction % since 2015/16



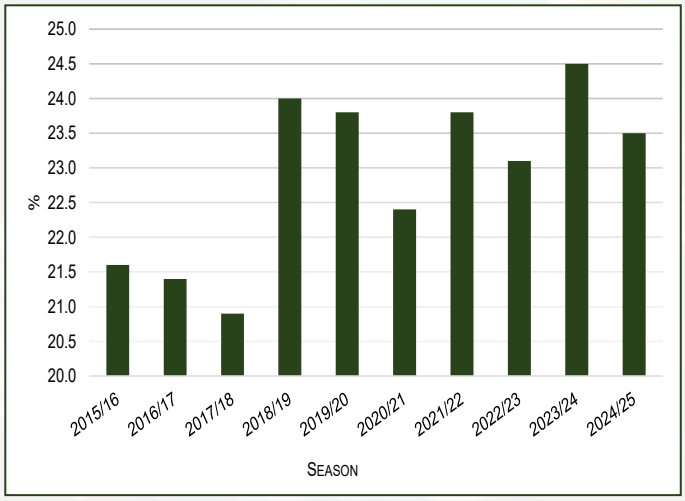
Graph 51: Average Roff Mill Break 2 meal fraction % since 2015/16



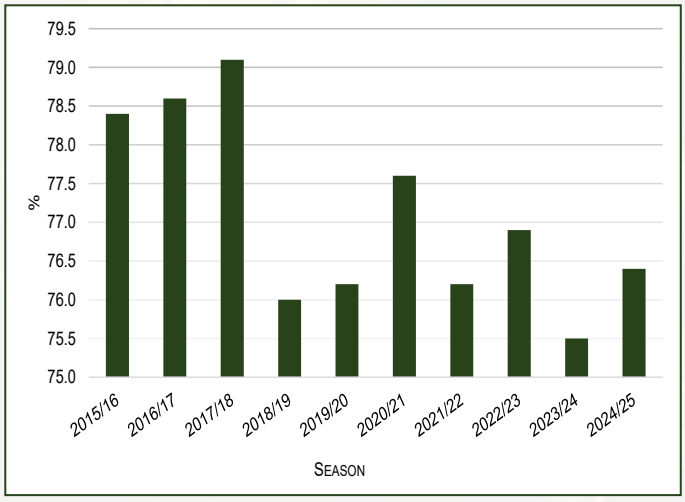
Graph 52: Average Roff Mill Break 3 meal fraction % since 2015/16



Graph 53: Average Roff Mill Grits fraction % since 2015/16



Graph 54: Average Roff Mill Chop fraction % since 2015/16



Graph 55: Average Roff Mill Total meal extraction % since 2015/16

Figures provided by the CEC.

TABLE 28: BÜHLER MCKA MILLING AND WHITENESS INDEX

Number of samples	Region	MCKA																					
		DEGERMER OVERS, %			DEGERMER THRUS, %			B1,%			B2,%			B3,%			C1,%			C2,%			C3,%		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WM1																									
282	Ave. WM1	20.6			81.7			13.1			8.0			1.7			40.8			1.0			0.4		
	Min. WM1		10.3			7.9			10.2			6.2			0.9			28.3			0.6			0.1	
	Max. WM1			30.4			92.9			16.4			9.6			4.6			46.7			2.0			0.7
GRADE: WM2																									
120	Ave. WM2	20.8			81.9			12.8			7.9			1.7			40.7			1.0			0.3		
	Min. WM2		8.5			71.7			10.5			6.1			1.3			30.3			0.5			0.2	
	Max. WM2			31.5			104.0			18.5			10.0			2.6			47.6			1.8			0.6
GRADE: WM3																									
39	Ave. WM3	20.3			82.4			13.0			7.8			1.8			40.8			1.0			0.3		
	Min. WM3		12.3			72.8			11.4			6.7			1.3			32.7			0.6			0.2	
	Max. WM3			32.0			91.2			14.9			8.9			2.3			45.7			1.7			0.7
GRADE: COM																									
15	Ave. COM	19.8			82.9			13.5			7.9			1.8			41.1			0.9			0.3		
	Min. COM		14.2			77.6			10.9			7.2			1.4			36.6			0.7			0.2	
	Max. COM			26.1			89.1			16.1			9.2			2.0			45.5			1.5			0.5
456	Ave. White	20.6			81.9			13.0			7.9			1.7			40.8			1.0			0.4		
	Min. White		8.5			7.9			10.2			6.1			0.9			28.3			0.5			0.1	
	Max. White			32.0			104.0			18.5			10.0			4.6			47.6			2.0			0.7

TABLE 29: BÜHLER MCKA MILLING AND WHITENESS INDEX

Number of samples	Province	MCKA																					
		DEGERMER OVERS, %			DEGERMER THRUS, %			B1,%			B2,%			B3,%			C1,%			C2,%			C3,%		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	Western Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2	Northern Cape	21.3	20.7	21.8	78.3	77.8	78.9	12.1	12.0	12.3	7.1	6.7	7.4	1.6	1.6	1.7	40.7	40.3	41.0	1.0	0.9	1.2	0.4	0.3	0.5
155	Free State	19.3	8.5	32.0	83.4	72.8	94.0	13.4	10.6	16.4	8.0	6.2	10.0	1.7	1.3	4.6	41.3	28.3	47.6	1.0	0.5	1.9	0.3	0.2	0.7
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
13	KwaZulu Natal	22.6	19.5	26.5	79.8	76.3	83.6	12.3	11.1	13.4	7.7	6.6	8.3	1.6	1.3	2.0	39.8	38.0	41.4	0.9	0.6	1.2	0.4	0.2	0.4
184	Mpumalanga	22.4	11.2	30.9	79.8	7.9	92.9	12.6	10.2	15.8	7.9	6.1	9.2	1.7	1.3	2.2	40.1	32.3	46.7	0.9	0.5	1.8	0.4	0.2	0.7
7	Limpopo	21.7	19.5	23.7	81.4	78.5	83.8	13.1	11.7	14.6	7.7	6.7	8.9	1.5	1.3	1.9	39.5	35.9	43.0	0.9	0.7	1.1	0.4	0.3	0.5
29	Gauteng	21.1	15.8	25.3	81.1	77.7	88.0	12.7	11.2	14.9	8.0	7.3	8.9	1.6	1.3	2.0	41.6	37.8	45.4	0.9	0.7	1.1	0.4	0.2	0.6
66	North West	18.1	12.0	27.9	85.0	74.6	104.0	14.0	12.1	18.5	8.0	6.4	9.0	1.8	0.9	2.6	41.5	34.8	45.1	1.0	0.6	2.0	0.3	0.1	0.5
456	Ave. White	20.6			81.9			13.0			7.9			1.7			40.8			1.0			0.4		
	Min. White		8.5			7.9			10.2			6.1			0.9			28.3			0.5			0.1	
	Max. White			32.0			104.0			18.5			10.0			4.6			47.6			2.0			0.7

OF WHITE MAIZE ACCORDING TO GRADE (2024/25)

Milling																					Whiteness Index					
G1, %			G2, %			G3, %			Fraction B1 - B3, %			Fraction C1 - C3, %			Grits (Fraction G3), %			Germ/Bran (Degermers + G1 + G2), %			TOTAL of all meal fractions, %			Unsifted			Sifted 87:13		
ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
0.1	0.0	0.8	2.0	0.9	4.6	12.4	9.1	19.1	22.8	19.4	26.1	42.1	30.4	48.3	12.4	9.1	19.1	22.7	11.9	35.7	77.3	64.3	88.1	15.7	1.6	25.0	14.5	1.9	26.7
0.1	0.0	0.7	1.9	1.0	3.9	12.8	8.8	17.7	22.4	19.4	27.5	42.0	31.4	48.9	12.8	8.8	17.7	22.8	10.9	36.2	77.2	63.8	89.1	12.6	-2.0	22.1	11.2	-3.6	22.1
0.1	0.0	0.4	1.9	1.3	3.5	13.0	8.6	18.2	22.6	20.9	24.4	42.1	33.8	47.0	13.0	8.6	18.2	22.3	13.8	35.8	77.7	64.2	86.2	11.5	0.9	22.2	10.6	-0.7	20.1
0.1	0.0	0.3	2.1	1.3	3.2	12.5	10.9	15.0	23.2	20.5	27.2	42.4	38.0	46.4	12.5	10.9	15.0	22.0	15.9	28.4	78.0	71.6	84.1	14.2	9.3	24.0	13.2	6.4	25.7
0.1	0.0	0.8	2.0	0.9	4.6	12.5	8.6	19.1	22.7	19.4	27.5	42.1	30.4	48.9	12.5	8.6	19.1	22.7	10.9	36.2	77.3	63.8	89.1	14.5	-2.0	25.0	13.2	-3.6	26.7

OF WHITE MAIZE ACCORDING TO PROVINCE (2024/25)

Milling																					Whiteness Index					
G1, %			G2, %			G3, %			Fraction B1 - B3, %			Fraction C1 - C3, %			Grits (Fraction G3), %			Germ/Bran (Degermers + G1 + G2), %			TOTAL of all meal fractions, %			Unsifted			Sifted 87:13		
ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
0.0	0.0	0.0	1.6	1.5	1.6	14.1	14.0	14.3	20.8	20.7	21.0	42.2	41.6	42.7	14.1	14.0	14.3	22.8	22.4	23.3	77.2	76.7	77.6	17.4	17.1	17.6	16.3	15.2	17.3
0.1	0.0	0.7	1.8	0.9	4.6	13.0	8.6	19.1	23.1	19.8	27.2	42.7	30.4	48.9	13.0	8.6	19.1	21.2	10.9	36.2	78.8	63.8	89.1	13.8	-2.0	24.6	12.7	-3.6	25.1
-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
0.1	0.0	0.1	2.0	1.7	2.5	12.6	11.4	14.4	21.7	19.5	22.7	41.1	39.2	42.8	12.6	11.4	14.4	24.6	21.5	28.5	75.4	71.5	78.5	16.7	11.7	24.4	15.3	11.1	22.5
0.1	0.0	0.8	2.1	1.0	3.6	11.9	9.4	15.1	22.1	19.4	26.0	41.4	34.0	48.3	11.9	9.4	15.1	24.6	14.0	34.2	75.4	65.8	86.0	13.9	-1.3	21.8	12.6	-2.1	20.7
0.0	0.0	0.1	2.1	1.6	2.9	13.1	11.0	15.8	22.3	21.0	23.2	40.7	37.0	44.0	13.1	11.0	15.8	23.8	21.2	26.6	76.2	73.4	78.8	15.8	10.7	22.9	14.9	9.6	22.1
0.1	0.0	0.2	1.9	1.3	2.8	11.7	10.3	13.6	22.3	20.2	25.0	42.9	38.9	46.8	11.7	10.3	13.6	23.0	18.1	27.3	77.0	72.7	81.9	15.6	2.0	23.5	14.3	-0.7	21.4
0.0	0.0	0.1	1.9	1.2	2.8	13.5	9.8	18.2	23.7	20.7	27.5	42.8	35.6	46.3	13.5	9.8	18.2	20.0	13.8	30.0	80.0	70.0	86.2	13.8	0.9	25.0	12.8	2.3	26.7
0.1	0.0	0.8	2.0	0.9	4.6	12.5	8.6	19.1	22.7	19.4	27.5	42.1	30.4	48.9	12.5	8.6	19.1	22.7	10.9	36.2	77.3	63.8	89.1	14.5	-2.0	25.0	13.2	-3.6	26.7

TABLE 30: BÜHLER MCKA MILLING AND WHITENESS INDEX

Number of samples	Region	MCKA																					
		DEGERMER OVERS, %			DEGERMER THRUS, %			B1,%			B2,%			B3,%			C1,%			C2,%			C3,%		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
WHITE																									
2	Region 11	21.3	20.7	21.8	78.3	77.8	78.9	12.1	12.0	12.3	7.1	6.7	7.4	1.6	1.6	1.7	40.7	40.3	41.0	1.0	0.9	1.2	0.4	0.3	0.5
7	Region 14	19.3	15.8	24.0	83.0	78.1	85.6	14.2	13.0	16.2	8.1	7.5	8.5	1.6	1.5	1.8	41.1	38.9	42.9	0.9	0.8	1.1	0.4	0.3	0.4
31	Region 15	16.5	12.0	20.3	86.7	82.4	92.2	14.1	12.1	15.8	8.2	7.4	9.0	1.7	1.3	2.3	42.5	39.9	45.1	1.0	0.6	2.0	0.3	0.1	0.5
11	Region 16	18.0	12.3	27.9	85.0	75.8	90.9	13.5	12.2	15.3	7.7	6.7	8.4	1.7	0.9	2.2	41.4	36.6	44.6	1.0	0.7	1.5	0.3	0.2	0.3
4	Region 17	21.7	20.8	22.6	80.6	79.9	81.9	14.9	13.7	15.8	7.6	7.2	8.2	1.7	1.4	2.0	38.9	37.9	41.5	0.9	0.7	1.1	0.3	0.3	0.4
13	Region 18	20.2	16.5	25.8	83.6	74.6	104.0	13.4	12.4	18.5	7.7	6.4	8.4	1.9	1.5	2.6	40.2	34.8	42.9	0.9	0.6	1.3	0.3	0.2	0.5
12	Region 21	20.5	13.1	27.8	82.6	76.2	87.8	13.1	11.0	14.5	7.8	7.0	8.7	1.6	1.4	2.1	40.6	35.6	43.8	1.0	0.7	1.5	0.4	0.3	0.5
9	Region 22	16.0	14.4	19.4	86.5	83.5	88.0	13.7	12.8	14.9	8.3	7.6	9.4	1.8	1.6	2.0	43.6	42.0	45.7	1.0	0.8	1.4	0.3	0.2	0.4
43	Region 23	18.3	14.3	24.2	84.2	77.9	89.3	13.2	11.7	16.1	7.9	7.3	9.2	1.8	1.5	2.2	42.0	38.7	45.9	1.1	0.7	1.9	0.3	0.2	0.6
45	Region 24	19.8	10.0	30.4	83.0	74.5	93.1	13.7	11.3	16.4	8.1	6.2	10.0	1.8	1.4	4.6	40.7	28.3	46.2	1.0	0.5	1.4	0.3	0.2	0.7
3	Region 25	17.8	13.8	22.2	83.4	76.8	88.6	13.3	12.3	14.1	8.1	7.7	8.5	1.8	1.7	2.1	42.0	39.5	43.3	0.9	0.6	1.3	0.4	0.2	0.5
12	Region 26	20.2	8.5	32.0	82.7	72.8	94.0	13.5	12.0	15.4	8.0	6.7	8.7	1.5	1.3	1.9	40.7	32.7	47.6	0.9	0.6	1.5	0.4	0.3	0.5
11	Region 27	16.4	11.6	22.3	86.1	81.5	90.6	13.2	11.4	15.6	8.4	7.7	8.9	1.8	1.6	2.0	43.8	39.9	46.7	0.9	0.7	1.1	0.4	0.3	0.6
20	Region 28	22.5	17.5	31.5	80.4	74.3	85.2	13.1	10.6	15.5	7.9	6.7	8.8	1.6	1.3	2.3	39.7	30.3	43.8	0.9	0.6	1.1	0.4	0.3	0.5
28	Region 29	20.9	11.2	24.3	81.3	76.2	92.9	12.1	10.5	14.1	8.1	7.1	9.2	1.7	1.4	2.2	42.0	38.2	46.7	0.9	0.5	1.3	0.4	0.2	0.6
42	Region 30	23.3	17.4	30.9	79.4	71.7	86.4	12.7	10.9	14.3	7.8	6.1	8.7	1.6	1.3	2.1	39.0	32.3	43.9	1.0	0.6	1.7	0.4	0.2	0.7
16	Region 31	21.3	16.5	26.8	76.2	7.9	86.0	12.1	10.7	13.8	7.8	6.9	8.5	1.9	1.5	2.2	40.3	36.8	42.7	1.1	0.8	1.8	0.4	0.2	0.5
29	Region 32	22.0	16.1	27.7	80.3	75.3	87.3	12.3	10.5	13.8	7.9	6.9	8.5	1.7	1.4	1.9	40.2	36.9	44.0	1.0	0.7	1.8	0.3	0.2	0.6
69	Region 33	22.7	15.0	28.6	79.9	73.9	86.0	12.9	10.2	15.8	7.9	6.8	9.0	1.6	1.3	2.1	39.9	35.1	43.2	0.9	0.5	1.7	0.4	0.2	0.6
29	Region 34	21.1	15.8	25.3	81.1	77.7	88.0	12.7	11.2	14.9	8.0	7.3	8.9	1.6	1.3	2.0	41.6	37.8	45.4	0.9	0.7	1.1	0.4	0.2	0.6
7	Region 35	21.7	19.5	23.7	81.4	78.5	83.8	13.1	11.7	14.6	7.7	6.7	8.9	1.5	1.3	1.9	39.5	35.9	43.0	0.9	0.7	1.1	0.4	0.3	0.5
13	Region 36	22.6	19.5	26.5	79.8	76.3	83.6	12.3	11.1	13.4	7.7	6.6	8.3	1.6	1.3	2.0	39.8	38.0	41.4	0.9	0.6	1.2	0.4	0.2	0.4
456	**Ave. White**	**20.6**			**81.9**			**13.0**			**7.9**			**1.7**			**40.8**			**1.0**			**0.4**		
	Min. White	**8.5**			**7.9**			**10.2**			**6.1**			**0.9**			**28.3**			**0.5**			**0.1**		
	Max. White			**32.0**			**104.0**			**18.5**			**10.0**			**4.6**			**47.6**			**2.0**			**0.7**

OF WHITE MAIZE ACCORDING TO REGION (2024/25)

Milling																					Whiteness Index					
G1, %			G2, %			G3, %			Fraction B1 - B3, %			Fraction C1 - C3, %			Grits (Fraction G3), %			Germ/Bran (Degermer overs + G1 + G2), %			TOTAL of all meal fractions, %			Unsifted			Sifted 87:13		
ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
0.0	0.0	0.0	1.6	1.5	1.6	14.1	14.0	14.3	20.8	20.7	21.0	42.2	41.6	42.7	14.1	14.0	14.3	22.8	22.4	23.3	77.2	76.7	77.6	17.4	17.1	17.6	16.3	15.2	17.3
0.0	0.0	0.0	2.0	1.7	2.3	12.2	10.9	14.8	24.0	22.8	26.0	42.4	40.0	44.4	12.2	10.9	14.8	21.4	17.4	26.2	78.6	73.8	82.6	18.8	16.0	22.2	17.0	13.5	22.4
0.0	0.0	0.1	1.8	1.2	2.7	13.7	11.0	17.5	24.1	22.0	26.1	43.8	41.1	46.3	13.7	11.0	17.5	18.3	14.3	22.3	81.7	77.7	85.7	13.9	0.9	21.7	12.8	2.9	19.3
0.0	0.0	0.0	1.9	1.5	2.4	14.4	10.8	18.2	22.9	20.7	25.6	42.7	38.5	45.9	14.4	10.8	18.2	20.0	13.8	30.0	80.0	70.0	86.2	13.5	3.4	25.0	12.6	2.3	26.7
0.1	0.1	0.1	2.3	1.9	2.8	11.5	11.0	12.2	24.2	23.3	25.5	40.2	39.3	42.5	11.5	11.0	12.2	24.1	22.8	25.1	75.9	74.9	77.2	13.8	10.8	16.9	13.1	9.2	17.3
0.1	0.0	0.1	1.8	1.3	2.3	13.5	9.8	16.3	23.0	21.4	27.5	41.4	35.6	43.9	13.5	9.8	16.3	22.1	18.0	27.9	77.9	72.1	82.0	11.2	1.6	22.1	10.6	2.3	22.8
0.0	0.0	0.1	2.0	1.1	2.9	12.9	10.9	15.8	22.6	20.1	24.0	41.9	36.7	45.3	12.9	10.9	15.8	22.6	15.0	30.7	77.4	69.3	85.0	15.0	8.2	24.5	14.2	4.7	25.1
0.0	0.0	0.1	1.6	1.4	1.9	13.7	11.6	15.3	23.7	22.8	25.3	44.9	43.3	47.0	13.7	11.6	15.3	17.6	15.8	21.2	82.4	78.8	84.2	13.3	10.8	17.5	11.1	7.9	15.7
0.0	0.0	0.1	1.7	0.9	2.5	13.7	11.1	16.5	22.9	21.3	27.2	43.4	39.8	47.5	13.7	11.1	16.5	20.0	15.9	25.8	80.0	74.2	84.1	15.0	8.0	24.6	14.0	6.4	24.3
0.1	0.0	0.7	1.7	1.1	4.6	12.8	9.6	17.8	23.6	21.3	25.7	42.0	30.4	48.1	12.8	9.6	17.8	21.6	11.2	35.7	78.4	64.3	88.8	14.1	4.1	23.9	13.4	3.5	24.2
0.0	0.0	0.1	1.6	1.0	2.2	14.0	10.0	19.1	23.3	22.0	24.2	43.2	41.4	44.3	14.0	10.0	19.1	19.4	14.8	24.5	80.6	75.5	85.2	9.1	1.7	19.4	9.5	1.9	19.2
0.1	0.0	0.4	2.3	1.5	3.5	12.4	8.6	17.7	23.1	21.8	24.2	42.0	33.8	48.9	12.4	8.6	17.7	22.6	10.9	35.8	77.4	64.2	89.1	14.4	-1.5	22.6	12.8	-1.9	21.2
0.1	0.0	0.2	2.0	1.7	2.4	13.1	11.7	15.7	23.4	21.3	26.1	45.1	41.1	48.4	13.1	11.7	15.7	18.4	13.7	24.7	81.6	75.3	86.3	6.1	-2.0	12.9	5.1	-3.6	11.9
0.1	0.0	0.7	2.2	1.4	3.9	11.7	8.8	15.6	22.6	19.8	25.2	40.9	31.4	45.2	11.7	8.8	15.6	24.8	19.6	36.2	75.2	63.8	80.4	15.6	10.1	21.3	13.6	7.8	21.5
0.1	0.0	0.3	1.9	1.0	2.9	12.0	10.3	15.1	21.9	19.6	23.8	43.3	39.9	48.3	12.0	10.3	15.1	22.9	14.0	26.5	77.1	73.5	86.0	12.6	4.7	20.1	11.4	5.6	18.2
0.1	0.0	0.8	2.3	1.3	3.6	11.8	9.8	14.9	22.1	20.5	24.3	40.4	34.0	45.1	11.8	9.8	14.9	25.8	19.7	34.2	74.2	65.8	80.3	15.3	10.5	21.0	13.4	6.0	20.1
0.1	0.0	0.2	2.2	1.3	3.0	13.0	11.8	14.7	21.7	19.9	23.3	41.7	38.0	44.1	13.0	11.8	14.7	23.6	19.0	28.8	76.4	71.2	81.0	11.6	-1.3	19.1	10.3	-2.1	20.7
0.1	0.0	0.3	2.0	1.2	3.0	12.4	10.8	14.3	22.0	19.4	24.1	41.5	38.8	45.1	12.4	10.8	14.3	24.2	18.3	28.9	75.8	71.1	81.7	13.3	3.6	19.4	11.7	3.8	17.9
0.1	0.0	0.5	2.2	1.2	3.5	11.5	9.4	13.7	22.4	19.4	26.0	41.1	36.2	44.4	11.5	9.4	13.7	25.0	17.1	32.6	75.0	67.4	82.9	16.7	4.8	21.8	15.6	5.4	20.5
0.1	0.0	0.2	1.9	1.3	2.8	11.7	10.3	13.6	22.3	20.2	25.0	42.9	38.9	46.8	11.7	10.3	13.6	23.0	18.1	27.3	77.0	72.7	81.9	15.6	2.0	23.5	14.3	-0.7	21.4
0.0	0.0	0.1	2.1	1.6	2.9	13.1	11.0	15.8	22.3	21.0	23.2	40.7	37.0	44.0	13.1	11.0	15.8	23.8	21.2	26.6	76.2	73.4	78.8	18.4	10.7	22.9	17.4	9.6	22.1
0.1	0.0	0.1	2.0	1.7	2.5	12.6	11.4	14.4	21.7	19.5	22.7	41.1	39.2	42.8	12.6	11.4	14.4	24.6	21.5	28.5	75.4	71.5	78.5	16.7	11.7	24.4	15.3	11.1	22.5
0.1			2.0			12.5			22.7			42.1			12.5			22.7			77.3			14.5			13.2		
	0.0			0.9			8.6			19.4			30.4			8.6			10.9			63.8			-2.0			-3.6	
		0.8			4.6			19.1			27.5			48.9			19.1			36.2			89.1			25.0			26.7

TABLE 31: NUTRITIONAL VALUES OF WHITE MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: WM1													
282	Ave. WM1	4.0			8.8			74.3			2.1		
	Min. WM1		3.5			7.0			70.7			1.9	
	Max. WM1			4.8			11.1			76.5			2.5
GRADE: WM2													
122	Ave. WM2	3.9			9.0			73.8			2.1		
	Min. WM2		3.5			6.6			69.1			1.9	
	Max. WM2			4.5			12.7			76.0			2.6
GRADE: WM3													
39	Ave. WM3	3.8			9.1			73.6			2.1		
	Min. WM3		3.3			7.0			70.2			2.0	
	Max. WM3			4.4			11.3			75.5			2.5
GRADE: COM													
15	Ave. COM	4.0			9.2			73.7			2.2		
	MIN. COM		3.7			7.8			70.7			2.0	
	Max. COM			4.5			10.9			76.5			2.4
458	Ave. White	4.0			8.9			74.0			2.1		
	Min. White		3.3			6.6			69.1			1.9	
	Max. White			4.8			12.7			76.5			2.6
1000	Ave. Maize	4.0			8.9			73.8			2.2		
	Min. Maize		3.2			6.6			69.1			1.9	
	Max. Maize			5.0			12.7			76.5			2.6

TABLE 32: NUTRITIONAL VALUES OF YELLOW MAIZE ACCORDING TO GRADE (2024/25)

Number of samples	Region	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
GRADE: YM1													
371	Ave. YM1	4.0			8.8			73.7			2.2		
	Min. YM1		3.2			7.3			69.8			1.9	
	Max. YM1			5.0			11.6			76.5			2.5
GRADE: YM2													
119	Ave. YM2	3.9			8.8			73.5			2.2		
	Min. YM2		3.5			6.8			70.0			1.9	
	Max. YM2			4.9			11.3			76.0			2.5
GRADE: YM3													
18	Ave. YM3	3.7			8.7			73.5			2.2		
	Min. YM3		3.4			7.8			71.9			2.0	
	Max. YM3			4.1			10.5			74.5			2.5
GRADE: COM													
34	Ave. COM	4.0			8.8			73.5			2.2		
	MIN. COM		3.4			7.6			70.9			2.1	
	Max. COM			5.0			10.5			75.3			2.5
542	Ave. Yellow	3.9			8.8			73.6			2.2		
	Min. Yellow		3.2			6.8			69.8			1.9	
	Max. Yellow			5.0			11.6			76.5			2.5
1000	Ave. Maize	4.0			8.9			73.8			2.2		
	Min. Maize		3.2			6.6			69.1			1.9	
	Max. Maize			5.0			12.7			76.5			2.6

TABLE 33: NUTRITIONAL VALUES OF WHITE AND YELLOW MAIZE ACCORDING TO REGION (2024/25)

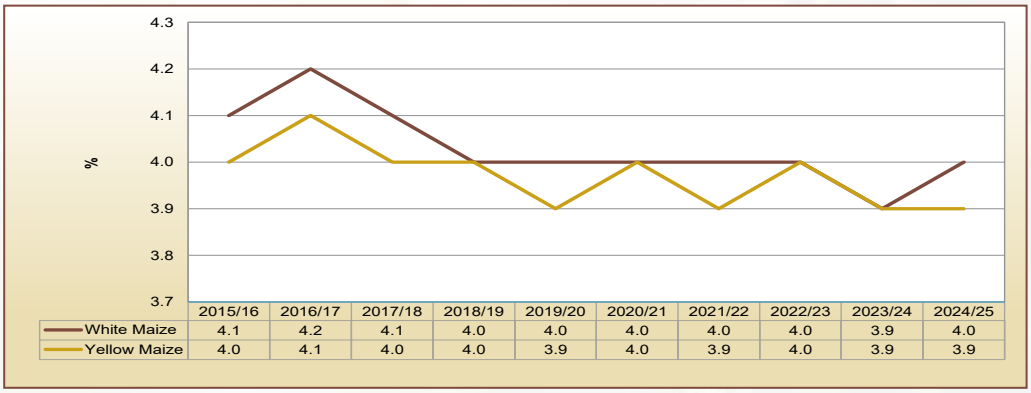
Number of samples	Region	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
WHITE													
2	Region 11	4.0	4.0	4.0	8.7	8.4	9.0	74.5	74.4	74.7	2.0	2.0	2.0
7	Region 14	4.1	3.9	4.5	8.7	7.4	10.1	74.4	71.7	76.3	2.3	2.1	2.4
31	Region 15	4.0	3.5	4.8	9.4	8.2	11.6	73.6	70.2	75.2	2.2	1.9	2.5
11	Region 16	4.1	3.8	4.4	9.6	8.0	10.9	73.3	71.7	76.5	2.2	2.0	2.3
4	Region 17	3.9	3.7	4.0	8.5	8.1	8.8	74.4	73.9	75.2	2.1	2.0	2.2
14	Region 18	3.9	3.3	4.3	8.9	7.9	9.8	74.0	72.9	75.6	2.1	2.0	2.2
12	Region 21	4.2	3.9	4.6	9.0	8.2	10.5	73.9	70.9	75.9	2.2	2.0	2.4
9	Region 22	4.0	3.7	4.3	10.0	9.4	11.3	72.4	70.6	73.7	2.3	2.2	2.5
43	Region 23	4.0	3.6	4.4	9.6	8.0	11.1	73.1	70.7	75.6	2.2	2.0	2.4
46	Region 24	4.0	3.5	4.5	8.9	7.0	11.4	74.1	70.9	76.5	2.2	1.9	2.5
3	Region 25	4.0	3.8	4.4	9.1	8.1	9.7	74.2	72.5	76.5	2.1	2.1	2.2
12	Region 26	4.1	3.8	4.4	9.0	7.0	12.7	74.1	69.1	76.0	2.2	2.0	2.6
11	Region 27	4.0	3.7	4.4	9.8	8.7	10.9	72.6	70.7	75.0	2.1	2.0	2.2
20	Region 28	3.9	3.6	4.2	8.6	6.6	9.8	74.3	72.6	75.8	2.1	1.9	2.4
28	Region 29	3.9	3.5	4.5	9.0	7.9	10.7	73.8	70.9	76.2	2.1	1.9	2.4
42	Region 30	4.0	3.5	4.5	8.3	7.3	9.3	74.7	72.5	75.9	2.1	2.0	2.3
16	Region 31	4.0	3.7	4.5	8.8	8.0	9.7	73.9	72.2	75.2	2.1	2.0	2.3
29	Region 32	3.9	3.5	4.5	8.9	7.8	10.5	74.0	72.1	75.9	2.1	1.9	2.3
69	Region 33	4.0	3.5	4.4	8.4	7.5	9.8	74.8	72.7	76.1	2.1	1.9	2.3
29	Region 34	3.9	3.5	4.5	8.9	7.9	11.0	74.2	71.2	75.5	2.1	1.9	2.5
7	Region 35	4.1	3.8	4.7	8.5	8.1	8.7	74.5	72.9	75.0	2.1	1.9	2.3
13	Region 36	4.0	3.7	4.2	8.4	7.9	9.5	74.7	73.3	76.0	2.1	2.0	2.2
458	**Ave. white**	**4.0**			**8.9**			**74.0**			**2.1**		
	Min. white		**3.3**			**6.6**			**69.1**			**1.9**	
	Max. white			**4.8**			**12.7**			**76.5**			**2.6**
YELLOW													
2	Region 5	3.6	3.6	3.7	7.9	7.8	8.0	75.5	75.3	75.6	2.2	2.2	2.2
5	Region 6	4.0	3.7	4.7	8.7	8.1	9.9	74.1	71.6	75.9	2.1	1.9	2.2
31	Region 10	3.8	3.5	4.1	8.5	7.7	9.7	75.0	73.7	76.0	2.0	1.9	2.2
16	Region 11	3.8	3.6	3.9	8.5	8.1	9.1	75.2	74.5	76.0	2.1	2.1	2.2
2	Region 15	3.8	3.7	3.8	9.1	8.8	9.4	73.2	72.4	73.9	2.3	2.1	2.4
2	Region 16	4.2	4.2	4.3	9.0	8.6	9.4	73.1	72.4	73.7	2.3	2.3	2.3
14	Region 18	3.9	3.6	4.3	8.7	7.7	9.4	73.9	72.7	75.5	2.3	2.1	2.5
5	Region 21	4.0	3.8	4.1	8.7	8.0	9.7	73.2	72.0	74.3	2.2	2.1	2.3
5	Region 23	4.1	3.6	4.4	9.5	9.0	10.2	72.7	71.8	73.7	2.2	2.1	2.2
22	Region 24	3.8	3.4	4.3	9.0	8.3	10.5	73.3	71.7	74.6	2.2	2.0	2.5
34	Region 25	4.0	3.6	4.5	8.9	7.6	10.3	73.7	70.4	76.5	2.2	1.9	2.5
37	Region 26	4.0	3.5	5.0	9.1	7.8	11.3	72.9	69.8	75.2	2.3	2.0	2.5
21	Region 27	3.9	3.6	4.2	8.8	7.9	10.1	73.5	71.9	75.3	2.2	2.0	2.4
77	Region 28	4.0	3.6	4.4	8.8	7.3	10.1	73.4	71.3	75.3	2.2	1.9	2.5
36	Region 29	4.0	3.5	4.8	9.3	7.9	10.2	72.9	71.9	74.4	2.1	1.9	2.4
58	Region 30	4.2	3.2	5.0	8.8	7.5	9.9	73.2	70.0	75.2	2.2	2.0	2.5
47	Region 31	3.8	3.4	4.4	8.8	7.9	10.1	73.7	71.7	75.9	2.2	1.9	2.4
42	Region 32	4.0	3.2	4.6	8.9	8.1	9.8	73.3	71.8	75.9	2.2	1.9	2.4
25	Region 33	3.8	3.3	4.7	8.5	6.8	10.0	74.0	72.2	75.3	2.1	1.9	2.4
24	Region 34	3.8	3.5	4.3	9.2	8.3	10.5	73.4	71.7	74.3	2.2	2.0	2.4
3	Region 35	3.9	3.8	4.0	8.5	7.8	9.4	74.1	72.1	75.3	2.3	2.1	2.5
34	Region 36	3.8	3.4	4.2	8.4	7.7	9.0	74.3	72.9	75.6	2.2	1.9	2.4

TABLE 33: NUTRITIONAL VALUES OF WHITE AND YELLOW MAIZE ACCORDING TO REGION (2024/25) (continue)

Number of samples	Region	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
YELLOW													
542	**Ave. white**	**3.9**			**8.8**			**73.6**			**2.2**		
	Min. white		**3.2**			**6.8**			**69.8**			**1.9**	
	Max. white			**5.0**			**11.6**			**76.5**			**2.5**
WHITE AND YELLOW													
2	Region 05	3.6	3.6	3.7	7.9	7.8	8.0	75.5	75.3	75.6	2.2	2.2	2.2
5	Region 06	4.0	3.7	4.7	8.7	8.1	9.9	74.1	71.6	75.9	2.1	1.9	2.2
31	Region 10	3.8	3.5	4.1	8.5	7.7	9.7	75.0	73.7	76.0	2.0	1.9	2.2
18	Region 11	3.8	3.6	4.0	8.6	8.1	9.1	75.1	74.4	76.0	2.1	2.0	2.2
7	Region 14	4.1	3.9	4.5	8.7	7.4	10.1	74.4	71.7	76.3	2.3	2.1	2.4
33	Region 15	4.0	3.5	4.8	9.4	8.2	11.6	73.6	70.2	75.2	2.2	1.9	2.5
13	Region 16	4.1	3.8	4.4	9.5	8.0	10.9	73.3	71.7	76.5	2.2	2.0	2.3
4	Region 17	3.9	3.7	4.0	8.5	8.1	8.8	74.4	73.9	75.2	2.1	2.0	2.2
28	Region 18	3.9	3.3	4.3	8.8	7.7	9.8	74.0	72.7	75.6	2.2	2.0	2.5
17	Region 21	4.1	3.8	4.6	8.9	8.0	10.5	73.7	70.9	75.9	2.2	2.0	2.4
9	Region 22	4.0	3.7	4.3	10.0	9.4	11.3	72.4	70.6	73.7	2.3	2.2	2.5
48	Region 23	4.0	3.6	4.4	9.6	8.0	11.1	73.1	70.7	75.6	2.2	2.0	2.4
68	Region 24	4.0	3.4	4.5	8.9	7.0	11.4	73.8	70.9	76.5	2.2	1.9	2.5
37	Region 25	4.0	3.6	4.5	8.9	7.6	10.3	73.8	70.4	76.5	2.2	1.9	2.5
49	Region 26	4.1	3.5	5.0	9.1	7.0	12.7	73.2	69.1	76.0	2.2	2.0	2.6
32	Region 27	3.9	3.6	4.4	9.1	7.9	10.9	73.2	70.7	75.3	2.2	2.0	2.4
97	Region 28	4.0	3.6	4.4	8.8	6.6	10.1	73.6	71.3	75.8	2.2	1.9	2.5
64	Region 29	4.0	3.5	4.8	9.2	7.9	10.7	73.3	70.9	76.2	2.1	1.9	2.4
100	Region 30	4.1	3.2	5.0	8.5	7.3	9.9	73.8	70.0	75.9	2.2	2.0	2.5
63	Region 31	3.9	3.4	4.5	8.8	7.9	10.1	73.7	71.7	75.9	2.1	1.9	2.4
71	Region 32	4.0	3.2	4.6	8.9	7.8	10.5	73.6	71.8	75.9	2.2	1.9	2.4
94	Region 33	3.9	3.3	4.7	8.4	6.8	10.0	74.6	72.2	76.1	2.1	1.9	2.4
53	Region 34	3.8	3.5	4.5	9.0	7.9	11.0	73.8	71.2	75.5	2.2	1.9	2.5
10	Region 35	4.0	3.8	4.7	8.5	7.8	9.4	74.3	72.1	75.3	2.2	1.9	2.5
47	Region 36	3.9	3.4	4.2	8.4	7.7	9.5	74.4	72.9	76.0	2.2	1.9	2.4
1000	**Ave. maize**	**4.0**			**8.9**			**73.8**			**2.2**		
	Min. maize		**3.2**			**6.6**			**69.1**			**1.9**	
	Max. maize			**5.0**			**12.7**			**76.5**			**2.6**

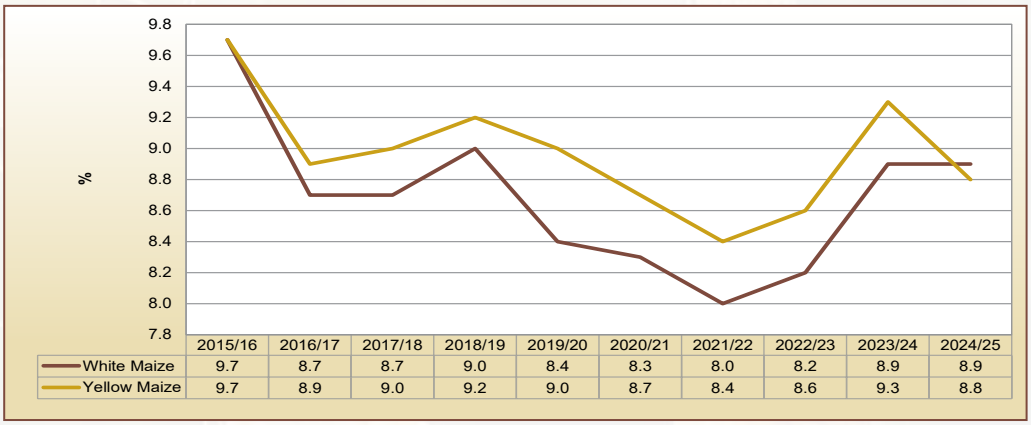
TABLE 34: NUTRITIONAL VALUES OF SOUTH AFRICAN WHITE AND YELLOW MAIZE OVER 10 SEASONS

Season	Number of samples	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
White Maize													
2015/16	415	4.1	3.5	5.2	9.7	7.5	12.2	72.6	69.8	76.3	-	-	-
2016/17	549	4.2	3.4	5.3	8.7	6.8	11.5	74.1	69.8	75.9	-	-	-
2017/18	451	4.1	3.4	5.0	8.7	6.8	11.2	73.2	69.4	74.8	-	-	-
2018/19	404	4.0	3.0	5.3	9.0	7.4	12.3	73.6	69.7	75.4	1.9	1.7	2.8
2019/20	516	4.0	3.4	5.0	8.4	6.7	11.7	73.2	69.6	74.9	1.9	1.6	2.6
2020/21	560	4.0	3.4	5.1	8.3	6.0	11.3	75.5	71.4	77.3	2.3	2.1	2.5
2021/22	524	4.0	3.3	5.2	8.0	6.1	10.0	76.0	72.8	76.9	2.2	1.7	2.7
2022/23	520	4.0	3.4	5.3	8.2	6.4	10.5	75.1	71.1	76.7	2.1	1.8	2.4
2023/24	518	3.9	3.4	5.2	8.9	6.7	11.1	74.3	70.5	77.4	2.2	1.8	2.5
2024/25	458	4.0	3.3	4.8	8.9	6.6	12.7	74.0	69.1	76.5	2.1	1.9	2.6
Weighted Average		**4.0**			**8.6**			**74.2**			**2.1**		
Minimum			**3.0**			**6.0**			**69.1**			**1.6**	
Maximum				**5.3**			**12.7**			**77.4**			**2.8**
Yellow Maize													
2015/16	505	4.0	3.3	5.1	9.7	7.7	12.6	72.3	70.0	75.3	-	-	-
2016/17	451	4.1	3.3	5.1	8.9	7.1	10.8	73.7	71.3	76.2	-	-	-
2017/18	449	4.0	3.2	5.0	9.0	6.7	11.3	72.0	68.5	74.6	-	-	-
2018/19	404	4.0	3.3	5.0	9.2	6.7	11.4	72.7	70.2	75.2	2.0	1.6	2.3
2019/20	374	3.9	3.3	4.6	9.0	7.0	10.9	72.3	68.3	74.9	1.9	1.6	2.5
2020/21	440	4.0	3.2	5.1	8.7	7.1	10.3	74.7	71.9	76.5	2.3	2.0	2.6
2021/22	476	3.9	3.3	4.7	8.4	6.4	10.0	75.1	72.4	76.8	2.3	1.7	2.7
2022/23	480	4.0	3.3	4.9	8.6	6.6	10.6	73.9	70.8	76.5	2.2	1.8	2.6
2023/24	482	3.9	3.2	4.8	9.3	7.5	11.6	73.5	70.0	77.0	2.2	1.8	2.6
2024/25	542	3.9	3.2	5.0	8.8	6.8	11.6	73.6	69.8	76.5	2.2	1.9	2.5
Weighted Average		**4.0**			**9.0**			**73.4**			**2.2**		
Minimum			**3.2**			**6.4**			**68.3**			**1.6**	
Maximum				**5.1**			**12.6**			**77.0**			**2.7**
White and Yellow Maize													
2015/16	920	4.1	3.3	5.2	9.7	7.5	12.6	72.4	69.8	76.3	-	-	-
2016/17	1000	4.1	3.3	5.3	8.8	6.8	11.5	73.9	69.8	76.2	-	-	-
2017/18	900	4.0	3.2	5.0	8.8	6.7	11.3	72.6	68.5	74.8	-	-	-
2018/19	808	4.0	3.0	5.3	9.1	6.7	12.3	73.2	69.7	75.4	1.9	1.6	2.8
2019/20	890	4.0	3.3	5.0	8.7	6.7	11.7	72.8	68.3	74.9	1.9	1.6	2.6
2020/21	1000	4.0	3.2	5.1	8.5	6.0	11.3	75.2	71.4	77.3	2.3	2.0	2.6
2021/22	1000	3.9	3.3	5.2	8.2	6.1	10.0	75.6	72.4	76.9	2.2	1.7	2.7
2022/23	1000	4.0	3.3	5.3	8.4	6.4	10.6	74.5	70.8	76.7	2.1	1.8	2.6
2023/24	1000	3.9	3.2	5.2	9.1	6.7	11.6	73.9	70.0	77.4	2.2	1.8	2.6
2024/25	1000	4.0	3.2	5.0	8.9	6.6	12.7	73.8	69.1	76.5	2.2	1.9	2.6
Weighted Average		**4.0**			**8.8**			**73.8**			**2.1**		
Minimum			**3.0**			**6.0**			**68.3**			**1.6**	
Maximum				**5.3**			**12.7**			**77.4**			**2.8**



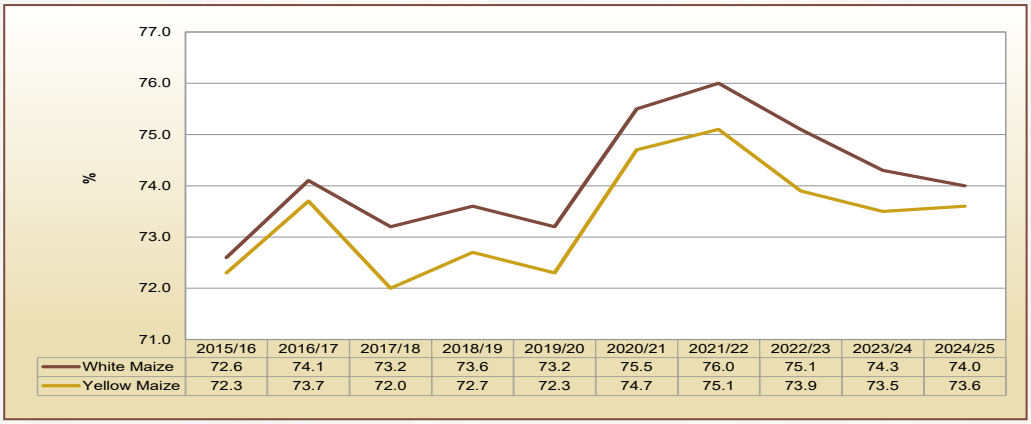
	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	4.1	4.2	4.1	4.0	4.0	4.0	4.0	4.0	3.9	4.0
Yellow Maize	4.0	4.1	4.0	4.0	3.9	4.0	3.9	4.0	3.9	3.9

Graph 56: Fat content of white and yellow maize over 10 seasons



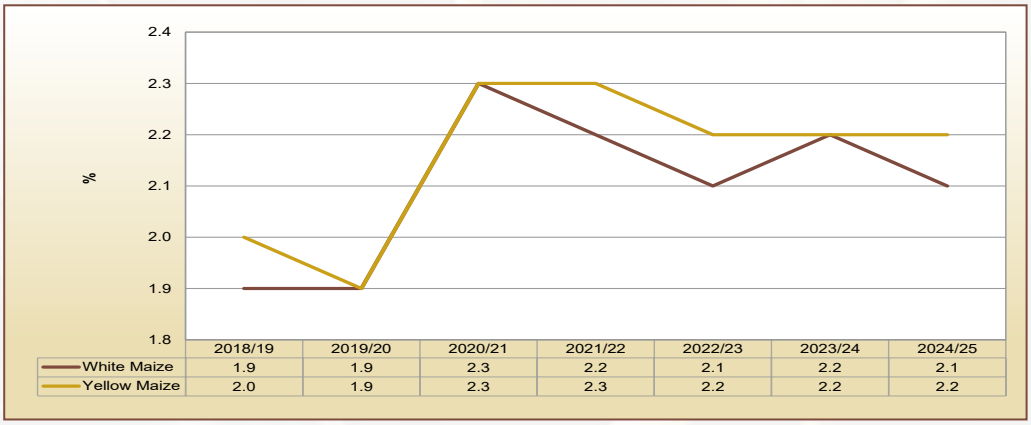
	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	9.7	8.7	8.7	9.0	8.4	8.3	8.0	8.2	8.9	8.9
Yellow Maize	9.7	8.9	9.0	9.2	9.0	8.7	8.4	8.6	9.3	8.8

Graph 57: Protein content of white and yellow over 10 seasons



	2015/16	2016/17	2017/18	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	72.6	74.1	73.2	73.6	73.2	75.5	76.0	75.1	74.3	74.0
Yellow Maize	72.3	73.7	72.0	72.7	72.3	74.7	75.1	73.9	73.5	73.6

Graph 58: Starch content of white and yellow maize over 10 seasons



	2018/19	2019/20	2020/21	2021/22	2022/23	2023/24	2024/25
White Maize	1.9	1.9	2.3	2.2	2.1	2.2	2.1
Yellow Maize	2.0	1.9	2.3	2.3	2.2	2.2	2.2

Graph 59: Crude Fibre of white and yellow maize over 7 seasons

TABLE 35: NUTRITIONAL VALUES OF WHITE MAIZE PER PROVINCE (2024/25)

Number of samples	Province	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
-	Western Cape	-	-	-	-	-	-	-	-	-	-	-	-
2	Northern Cape	4.0	4.0	4.0	8.7	8.4	9.0	74.5	74.4	74.7	2.0	2.0	2.0
156	Free State	4.0	3.5	4.6	9.2	6.6	12.7	73.6	69.1	76.5	2.2	1.9	2.6
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-
13	KwaZulu Natal	4.0	3.7	4.2	8.4	7.9	9.5	74.7	73.3	76.0	2.1	2.0	2.2
184	Mpumalanga	3.9	3.5	4.5	8.6	7.3	10.7	74.4	70.9	76.2	2.1	1.9	2.4
7	Limpopo	4.1	3.8	4.7	8.5	8.1	8.7	74.5	72.9	75.0	2.1	1.8	2.3
29	Gauteng	3.9	3.5	4.5	8.9	7.8	11.0	74.2	71.2	75.5	2.1	1.9	2.5
67	North West	4.0	3.3	4.8	9.2	7.4	11.6	73.8	70.2	76.5	2.2	1.9	2.5
458	**Ave. WHITE**	**4.0**			**8.9**			**74.1**			**2.1**		
	Min. WHITE		**3.3**			**6.6**			**69.1**			**1.9**	
	Max. WHITE			**4.8**			**12.7**			**76.5**			**2.6**

TABLE 36: NUTRITIONAL VALUES OF YELLOW MAIZE PER PROVINCE (2024/25)

Number of samples	Province	Fat % (db)			Protein % (db)			Starch % (db)			Crude Fibre % (db)		
		ave.	min.	max.	ave.	min.	max.	ave.	min.	max.	ave.	min.	max.
7	Western Cape	3.9	3.6	4.7	8.5	7.8	9.8	74.5	71.6	75.9	2.1	1.9	2.2
47	Northern Cape	3.8	3.5	4.1	8.5	7.7	9.7	75.1	73.7	76.0	2.1	1.9	2.2
201	Free State	4.0	3.4	5.0	8.9	7.3	11.6	73.3	69.8	76.5	2.2	1.9	2.5
-	Eastern Cape	-	-	-	-	-	-	-	-	-	-	-	-
34	KwaZulu Natal	3.8	3.4	4.2	8.4	7.7	9.0	74.3	72.9	75.6	2.2	1.9	2.4
208	Mpumalanga	4.0	3.2	5.0	8.9	6.8	10.2	73.4	70.0	75.9	2.2	1.9	2.5
3	Limpopo	3.9	3.8	4.0	8.5	7.8	9.4	74.1	72.1	75.3	2.3	2.1	2.5
24	Gauteng	3.8	3.5	4.3	9.2	8.3	10.5	73.4	71.7	74.3	2.2	2.0	2.4
18	North West	3.9	3.6	4.3	8.8	7.7	9.4	73.8	72.4	75.5	2.3	2.0	2.5
542	**Ave. YELLOW**	**3.9**			**8.8**			**73.6**			**2.2**		
	Min. YELLOW		**3.2**			**6.8**			**69.8**			**1.9**	
	Max. YELLOW			**5.0**			**11.6**			**76.5**			**2.5**

Mycotoxins

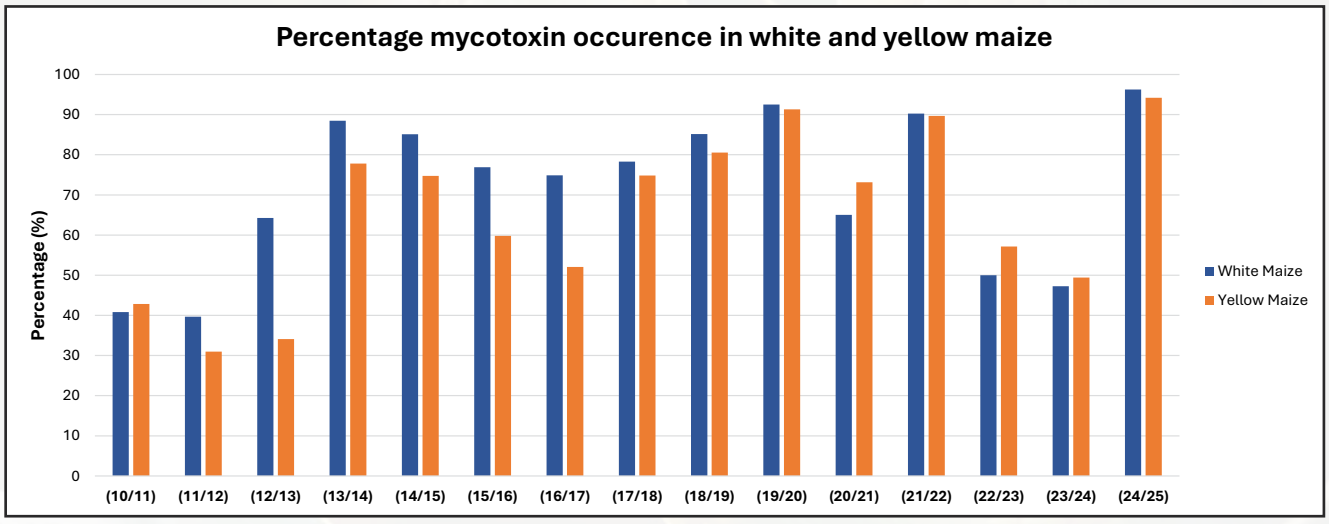
A total of fourteen mycotoxins, including aflatoxin (AFLA) B_1, B_2, G_1 and G_2, fumonisin (FUM) B_1, B_2 and B_3, deoxynivalenol (DON), 15-acetyl-deoxynivalenol (15-ADON), ochratoxin A, T2-toxin, H-T2 toxin, zearalenone (ZON), and diplodiatoxin were analysed in 350 maize samples selected from the 1 000 maize crop quality samples of the 2024/25 season. This report presents the concentrations for total AFLA (sum of B_1, B_2, G_1 and G_2), total FUM (sum of B_1, B_2), DON, ZON, and diplodiatoxin. Levels of 15-ADON, the acetylated derivative of DON, are commonly associated with DON levels and its individual levels are omitted from this report. Additionally, none of the samples analysed during the current season contained detectable levels of aflatoxins, ochratoxin A, T-2 toxin, or HT-2 toxin. It should be noted that the levels for diplodiatoxin should be seen as indicative values due to the lack of certified reference materials for this mycotoxin

Number of samples analysed over the fifteen seasons

Since 2010, a total of 4 477 maize samples have been analysed in the maize quality monitoring program. During the first three seasons fewer samples were analysed, the number of samples was increased to 350 per year from the 2013/14 season. The majority of samples were analysed from the Mpumalanga, Free State, and North West production regions. More white maize samples were analysed from Free State, North West, Gauteng, and Limpopo, while more yellow maize samples were analysed for the Mpumalanga, KwaZulu Natal, and Northern Cape production regions. The fewest samples were analysed form the Western and Limpopo regions. No maize samples were submitted and analysed for the Eastern Cape (region 7-9).

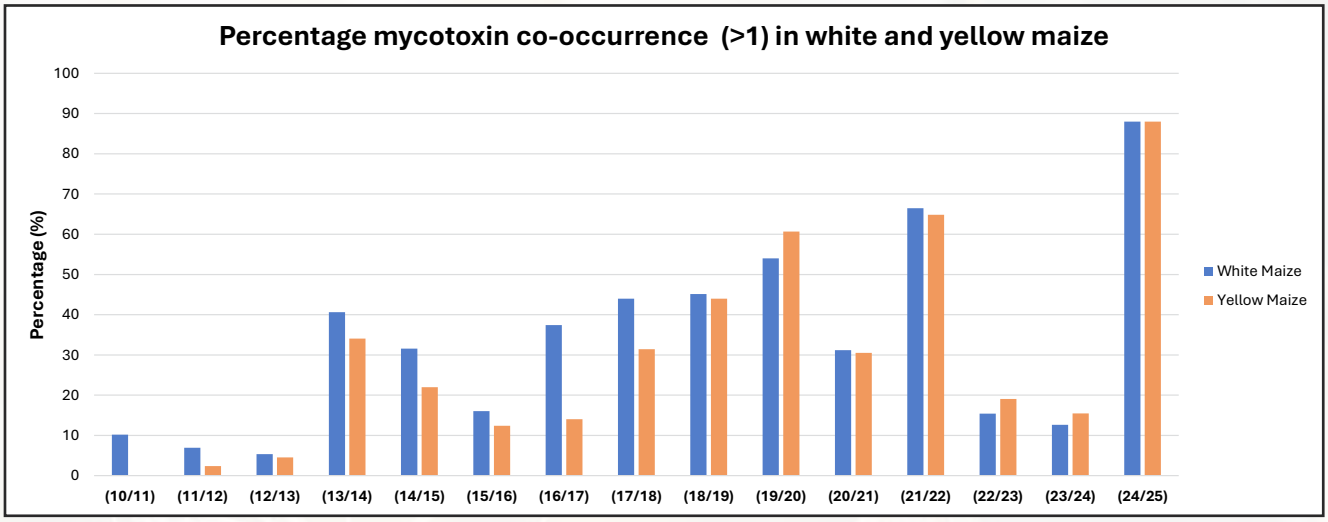
Number of samples that tested positive for mycotoxins

The percentages of white and yellow maize samples testing positive for at least one mycotoxin during the current production season were the highest since the 2010/11 season (see Graph 60). Compared to the previous season (2023/24), occurrence increased from 47% to 96% in white maize and from 49% to 94% in yellow maize.



Graph 60: The percentage white and yellow maize tested positive for at least one mycotoxin over fifteen seasons from 2010 to 2025

The co-occurrence rate (samples containing more than one mycotoxin) was 88% for both white and yellow maize (see Graph 62), representing the highest percentage reported for all seasons. Compared with last season (2023/24), co-occurrence increased from 13% to 88% in white maize and from 15% to 88% in yellow maize.



Graph 61: The percentage white and yellow maize tested positive for more than one mycotoxin over fifteen seasons from 2010 to 2025

The following sections present the mean mycotoxin concentrations in white and yellow maize, calculated only for samples that tested positive. A summary of overall production regions is presented first, followed by a provincial analysis across each of the nine provinces. Note that diplodiatoxin was only included in the analytical scope from the 2018/19 season.

All production regions

The mean mycotoxin concentrations in white and yellow maize across all the production regions over fifteen seasons from 2010 to 2025 are shown in Graph 62. The percentage samples testing positive for specific mycotoxins in white maize and yellow maize are shown in Graph 63. Maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are presented in Tables 37 and 38, respectively.

None of the samples analysed in the current season contained detectable aflatoxins, ochratoxin A, T2-toxin, or H-T2 toxin. The mean total FUM concentration for white maize was 811 µg/kg, the highest for all seasons. The mean total FUM concentration for yellow maize was 836 µg/kg, which is higher than the previous two seasons. FUM was detected in 53% of the white maize and 34% of the yellow maize samples. The mean DON concentration was 1 580 µg/kg in white maize and 972 µg/kg in yellow maize. These levels were higher than levels reported for all seasons. DON was prevalent in 84% of the white maize and 88% for yellow maize samples. The mean ZON concentration in white maize was 131 µg/kg, higher than the previous twelve seasons. In yellow maize, the mean ZON concentration was 90 µg/kg, remaining within the historical eleven season range of 33 to 131 µg/kg. An increase in the percentage maize samples containing ZON was observed for both white (59%) and yellow maize (57%), compared to the previous season of 4% and 3% for the respective maize.

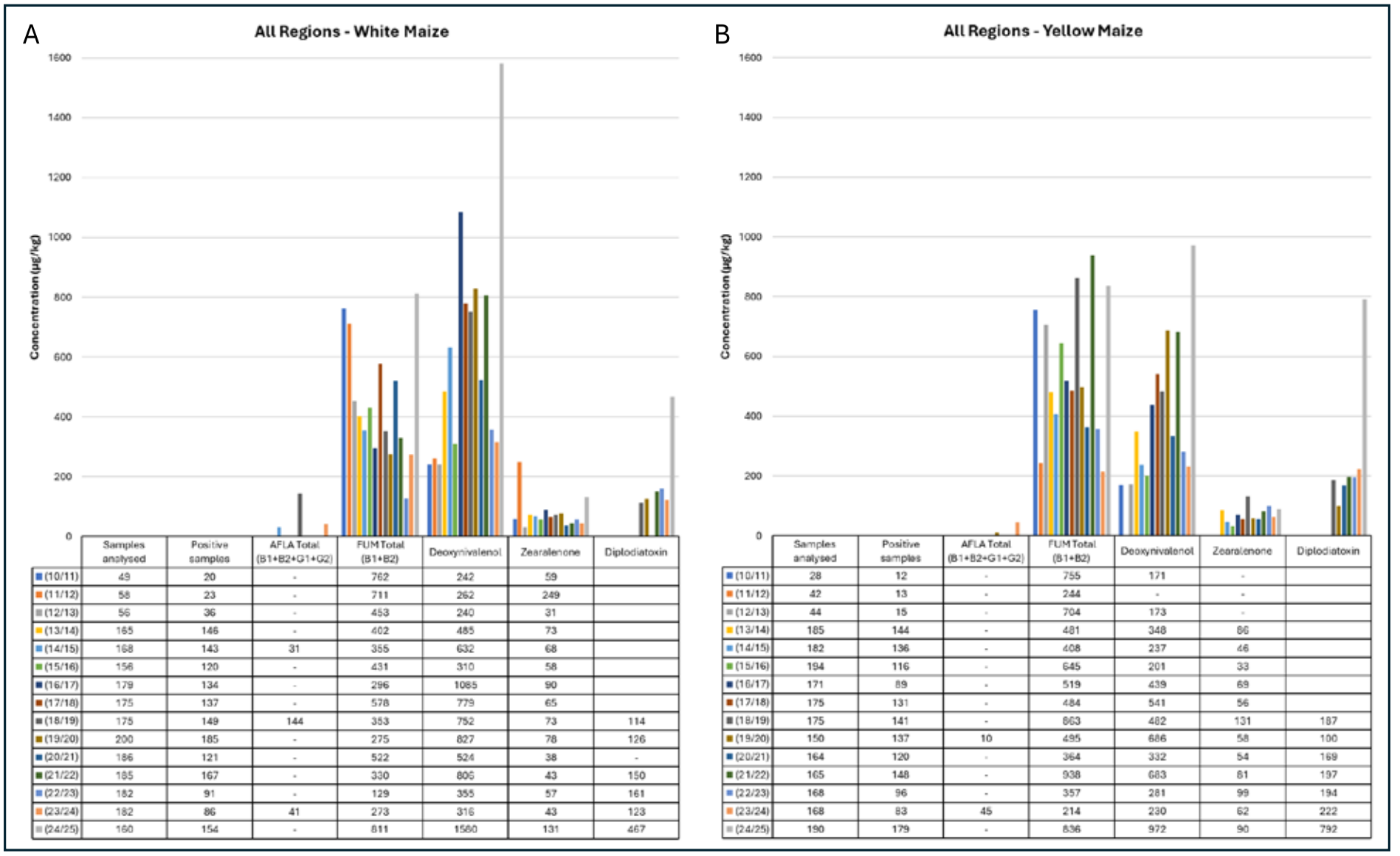
The mean diplodiatoxin concentration was 467 µg/kg in white maize and 792 µg/kg in yellow maize. Mean concentrations for the current season were notably higher than all previous seasons. Diplodiatoxin was detected in 67% of white maize samples and 74% of yellow maize samples.

Table 37: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for all production regions

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	49	-	1341	883	187	
(11/12)	58	-	4197	485	297	
(12/13)	56	-	1507	617	41	
(13/14)	165	-	2775	6134	445	
(14/15)	168	48	1695	9736	337	
(15/16)	156	-	6366	1585	127	
(16/17)	179	-	3500	7698	399	
(17/18)	175	-	7943	3510	361	
(18/19)	175	144	7040	11181	271	319
(19/20)	200	-	3635	7700	539	663
(20/21)	186	-	5069	3256	101	-
(21/22)	185	-	1277	3934	143	595
(22/23)	182	-	523	2061	107	560
(23/24)	182	41	1709	908	107	402
(24/25)	160	-	13243	10717	611	5230

Table 38: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for all production regions

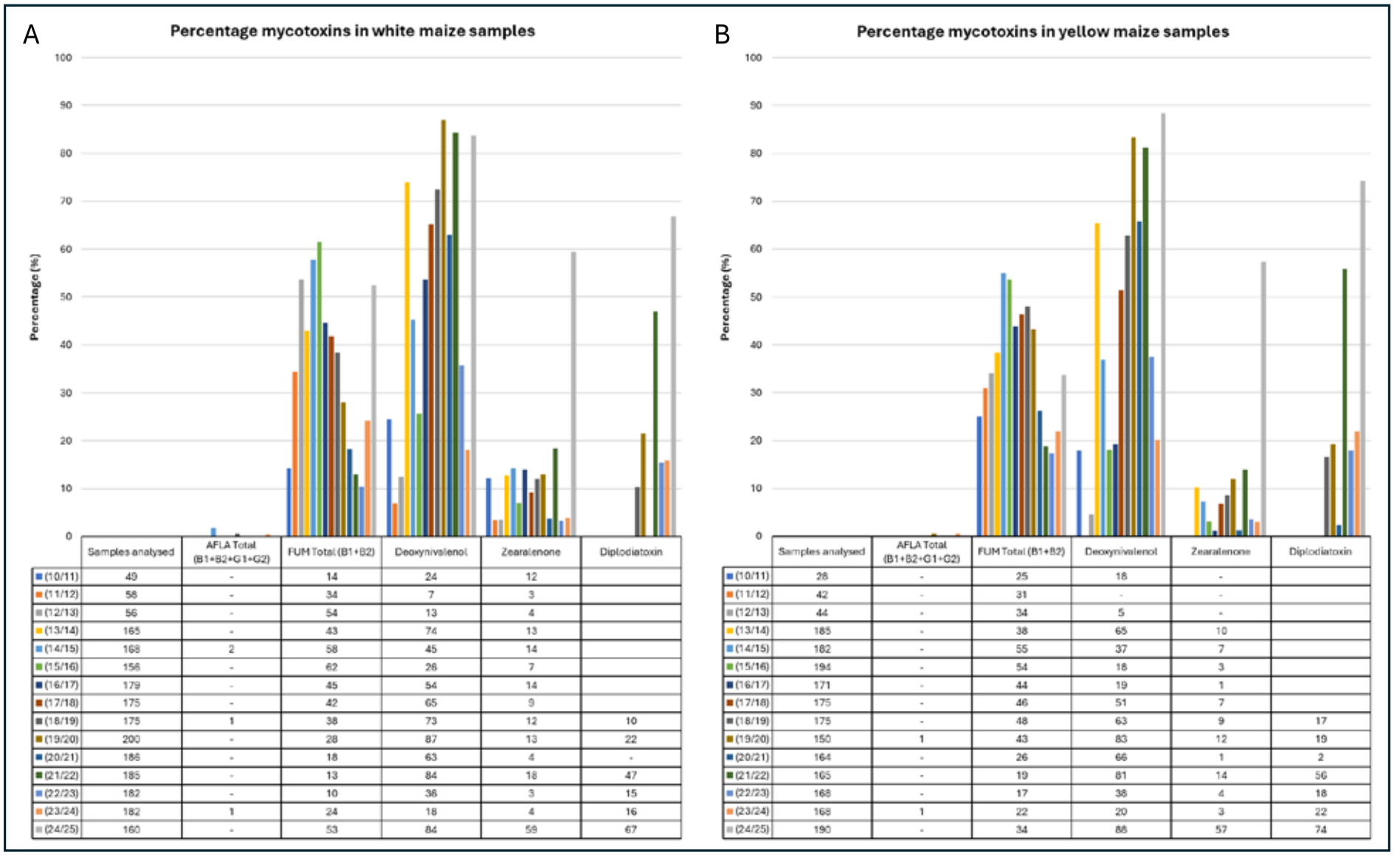
Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	28	-	1401	222	-	
(11/12)	42	-	674	-	-	
(12/13)	44	-	4055	184	-	
(13/14)	185	-	5056	2601	354	
(14/15)	182	-	3219	851	124	
(15/16)	194	-	10746	640	44	
(16/17)	171	-	5551	1552	113	
(17/18)	175	-	5645	2348	121	
(18/19)	175	-	30189	3256	957	1235
(19/20)	150	10	5555	5060	243	360
(20/21)	164	-	2459	2169	56	312
(21/22)	165	-	17195	6879	428	1347
(22/23)	168	-	2946	2205	328	777
(23/24)	168	45	1278	741	113	2389
(24/25)	190	-	3779	5919	543	8627



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	49	20	-	762	242	59	
(11/12)	58	23	-	711	262	249	
(12/13)	56	36	-	453	240	31	
(13/14)	165	146	-	402	485	73	
(14/15)	168	143	31	355	632	68	
(15/16)	156	120	-	431	310	58	
(16/17)	179	134	-	296	1085	90	
(17/18)	175	137	-	578	779	65	
(18/19)	175	149	144	353	752	73	114
(19/20)	200	185	-	275	827	78	126
(20/21)	186	121	-	522	524	38	-
(21/22)	185	167	-	330	805	43	150
(22/23)	182	91	-	129	355	57	161
(23/24)	182	86	41	273	316	43	123
(24/25)	160	154	-	811	1560	131	467

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	28	12	-	755	171	-	
(11/12)	42	13	-	244	-	-	
(12/13)	44	15	-	704	173	-	
(13/14)	185	144	-	481	348	86	
(14/15)	182	136	-	408	237	46	
(15/16)	194	116	-	645	201	33	
(16/17)	171	89	-	519	439	69	
(17/18)	175	131	-	484	541	56	
(18/19)	175	141	-	863	482	131	187
(19/20)	150	137	10	495	686	58	100
(20/21)	164	120	-	364	332	54	169
(21/22)	165	148	-	938	683	81	197
(22/23)	168	96	-	357	281	99	194
(23/24)	168	83	45	214	230	62	222
(24/25)	190	179	-	836	972	90	792

Graph 62: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from all production regions over fifteen seasons from 2010 to 2025



	Samples analysed	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	49	-	14	24	12	
(11/12)	58	-	34	7	3	
(12/13)	56	-	54	13	4	
(13/14)	165	-	43	74	13	
(14/15)	168	2	58	45	14	
(15/16)	156	-	62	26	7	
(16/17)	179	-	45	54	14	
(17/18)	175	-	42	65	9	
(18/19)	175	1	38	73	12	10
(19/20)	200	-	28	87	13	22
(20/21)	186	-	18	63	4	-
(21/22)	185	-	13	84	18	47
(22/23)	182	-	10	36	3	15
(23/24)	182	1	24	18	4	16
(24/25)	160	-	53	84	59	67

	Samples analysed	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	28	-	25	18	-	
(11/12)	42	-	31	-	-	
(12/13)	44	-	34	5	-	
(13/14)	185	-	38	65	10	
(14/15)	182	-	55	37	7	
(15/16)	194	-	54	18	3	
(16/17)	171	-	44	19	1	
(17/18)	175	-	46	51	7	
(18/19)	175	-	48	63	9	17
(19/20)	150	1	43	83	12	19
(20/21)	164	-	26	66	1	2
(21/22)	165	-	19	81	14	56
(22/23)	168	-	17	38	4	18
(23/24)	168	1	22	20	3	22
(24/25)	190	-	34	88	57	74

Graph 63: Percentage of samples testing positive for overall and specific mycotoxins in white maize (A) and yellow maize (B) from all production regions over fifteen seasons from 2010 to 2025

Western Cape (Region 1 - 6) and Eastern Cape (Region 7 - 9)

The mean mycotoxin concentrations in yellow maize from the Western Cape and Eastern Cape regions over fifteen seasons from 2010 to 2025 are shown in Graph 64, and the maximum mycotoxin concentrations (µg/kg) in yellow maize samples are presented in Tables 39 and 40, respectively. No maize samples were analysed during the current season for the Eastern Cape region.

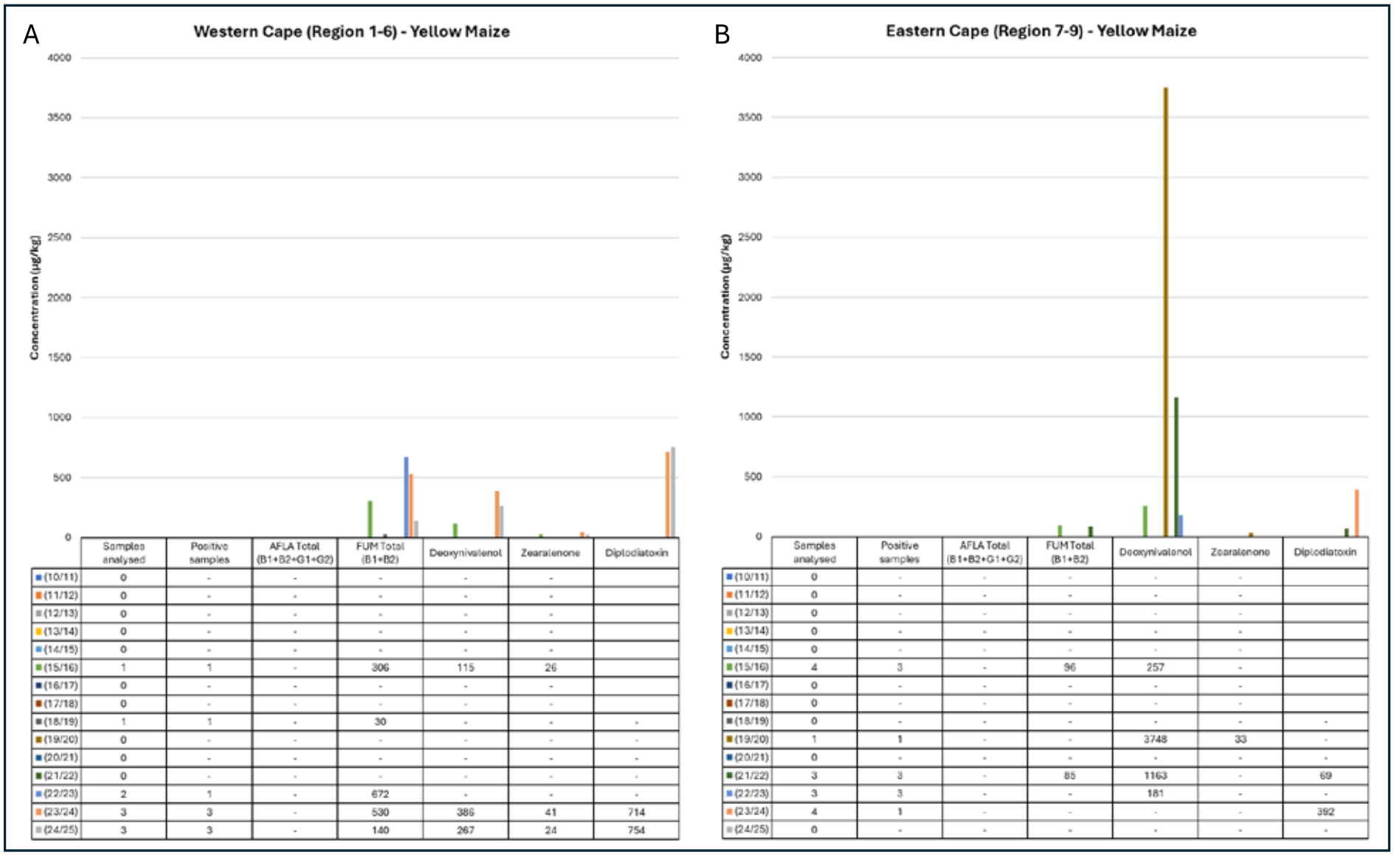
The mean concentrations for total FUM, DON, and ZON in the yellow maize samples for the Western Cape were 140 µg/kg, 267 µg/kg, and 24 µg/kg, respectively. The mean diplodiatoxin concentration was 754 µg/kg, which was similar to the previous production season (714 µg/kg).

Table 39: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for the Western Cape (Region 1-6)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	
(11/12)	0	-	-	-	-	
(12/13)	0	-	-	-	-	
(13/14)	0	-	-	-	-	
(14/15)	0	-	-	-	-	
(15/16)	1	-	306	115	26	
(16/17)	0	-	-	-	-	
(17/18)	0	-	-	-	-	
(18/19)	1	-	30	-	-	-
(19/20)	0	-	-	-	-	-
(20/21)	0	-	-	-	-	-
(21/22)	0	-	-	-	-	-
(22/23)	2	-	672	-	-	-
(23/24)	3	-	1278	708	41	714
(24/25)	3	-	156	414	24	754

Table 40: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for the Easten Cape (Region 7-9)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	
(11/12)	0	-	-	-	-	
(12/13)	0	-	-	-	-	
(13/14)	0	-	-	-	-	
(14/15)	0	-	-	-	-	
(15/16)	4	-	143	439	-	
(16/17)	0	-	-	-	-	
(17/18)	0	-	-	-	-	
(18/19)	0	-	-	-	-	-
(19/20)	1	-	-	3748	33	-
(20/21)	0	-	-	-	-	-
(21/22)	3	-	85	2001	-	69
(22/23)	3	-	-	241	-	-
(23/24)	4	-	-	-	-	392
(24/25)	0	-	-	-	-	-



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	-	
(11/12)	0	-	-	-	-	-	
(12/13)	0	-	-	-	-	-	
(13/14)	0	-	-	-	-	-	
(14/15)	0	-	-	-	-	-	
(15/16)	1	1	-	306	115	26	
(16/17)	0	-	-	-	-	-	
(17/18)	0	-	-	-	-	-	
(18/19)	1	1	-	30	-	-	-
(19/20)	0	-	-	-	-	-	-
(20/21)	0	-	-	-	-	-	-
(21/22)	0	-	-	-	-	-	-
(22/23)	2	1	-	672	-	-	-
(23/24)	3	3	-	530	386	41	714
(24/25)	3	3	-	140	267	24	754

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	-	
(11/12)	0	-	-	-	-	-	
(12/13)	0	-	-	-	-	-	
(13/14)	0	-	-	-	-	-	
(14/15)	0	-	-	-	-	-	
(15/16)	4	3	-	96	257	-	
(16/17)	0	-	-	-	-	-	
(17/18)	0	-	-	-	-	-	
(18/19)	0	-	-	-	-	-	-
(19/20)	1	1	-	-	3748	33	-
(20/21)	0	-	-	-	-	-	-
(21/22)	3	3	-	85	1163	-	69
(22/23)	3	3	-	-	181	-	-
(23/24)	4	1	-	-	-	-	392
(24/25)	0	-	-	-	-	-	-

Graph 64: The mean mycotoxin concentrations in yellow maize from the Western Cape (A) and Eastern Cape (B) regions over fifteen seasons from 2010 to 2025

Northern Cape (Region 10 - 11)

The mean mycotoxin concentrations in white and yellow maize from the Northern Cape regions over fifteen seasons from 2010 to 2025 are shown in Graph 65, and the maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are presented in Tables 41 and 42, respectively.

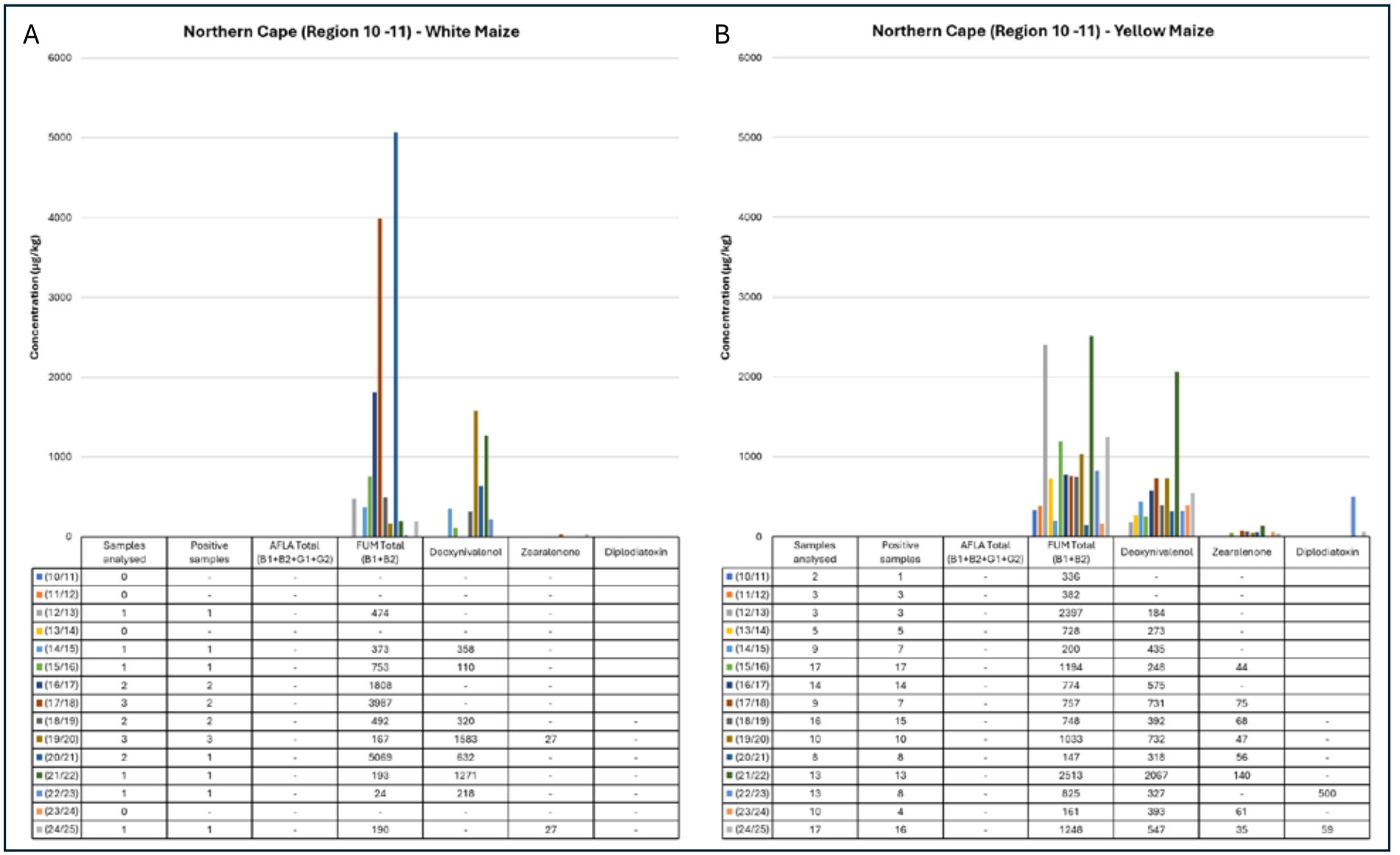
The single white maize sample analysed during this season contained FUM and ZON at 190 µg/kg and 27 µg/kg respectively. The mean total FUM concentration across seventeen yellow maize samples was 1 248 µg/kg, which was higher than the levels reported for the previous two production seasons. The mean DON concentration of 547 µg/kg was slightly higher than the previous two seasons, but lower than the mean concentration reported for the 2021/22 season. The mean ZON concentration in yellow maize was 35 µg/kg, which was lower than the previous season (61 µg/kg). Diplodiatoxin was detected only in yellow maize at a mean concentration of 50 µg/kg, which was lower than levels reported in the 2022/23 season.

Table 41: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for the Northern Cape (Region 10 -11)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	
(11/12)	0	-	-	-	-	
(12/13)	1	-	474	-	-	
(13/14)	0	-	-	-	-	
(14/15)	1	-	373	358	-	
(15/16)	1	-	753	110	-	
(16/17)	2	-	3500	-	-	
(17/18)	3	-	7943	-	-	
(18/19)	2	-	492	509	-	-
(19/20)	3	-	311	1915	27	-
(20/21)	2	-	5069	632	-	-
(21/22)	1	-	193	1271	-	-
(22/23)	1	-	24	218	-	-
(23/24)	0	-	-	-	-	-
(24/25)	1	-	190	-	27	-

Table 42: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for the Northern Cape (Region 10 -11)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	2	-	336	-	-	
(11/12)	3	-	670	-	-	
(12/13)	3	-	4055	184	-	
(13/14)	5	-	1731	391	-	
(14/15)	9	-	746	567	-	
(15/16)	17	-	7364	554	44	
(16/17)	14	-	2282	795	-	
(17/18)	9	-	2782	1822	75	
(18/19)	16	-	1900	1318	109	-
(19/20)	10	-	5555	1838	88	-
(20/21)	8	-	346	516	56	-
(21/22)	13	-	17195	6879	428	-
(22/23)	13	-	2946	642	-	500
(23/24)	10	-	235	559	61	-
(24/25)	17	-	3779	1362	59	59



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	-	
(11/12)	0	-	-	-	-	-	
(12/13)	1	1	-	474	-	-	
(13/14)	0	-	-	-	-	-	
(14/15)	1	1	-	373	358	-	
(15/16)	1	1	-	753	110	-	
(16/17)	2	2	-	1808	-	-	
(17/18)	3	2	-	3987	-	-	
(18/19)	2	2	-	492	320	-	-
(19/20)	3	3	-	167	1583	27	-
(20/21)	2	1	-	5069	632	-	-
(21/22)	1	1	-	193	1271	-	-
(22/23)	1	1	-	24	218	-	-
(23/24)	0	-	-	-	-	-	-
(24/25)	1	1	-	190	-	27	-

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	2	1	-	336	-	-	
(11/12)	3	3	-	382	-	-	
(12/13)	3	3	-	2397	184	-	
(13/14)	5	5	-	728	273	-	
(14/15)	9	7	-	200	435	-	
(15/16)	17	17	-	1194	248	44	
(16/17)	14	14	-	774	575	-	
(17/18)	9	7	-	757	731	75	
(18/19)	16	15	-	748	392	68	-
(19/20)	10	10	-	1033	732	47	-
(20/21)	8	8	-	147	318	56	-
(21/22)	13	13	-	2513	2067	140	-
(22/23)	13	8	-	825	327	-	500
(23/24)	10	4	-	161	393	61	-
(24/25)	17	16	-	1248	547	35	59

Graph 65: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the Northern Cape regions over fifteen seasons from 2010 to 2025

North West (Region 12 – 20)

The mean mycotoxin concentrations in white and yellow maize from the North West region over fifteen seasons (2010 to 2025) are shown in Graph 66. The maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are presented in Tables 43 and 44, respectively. Fewer white and yellow maize samples were analysed compared to previous production seasons.

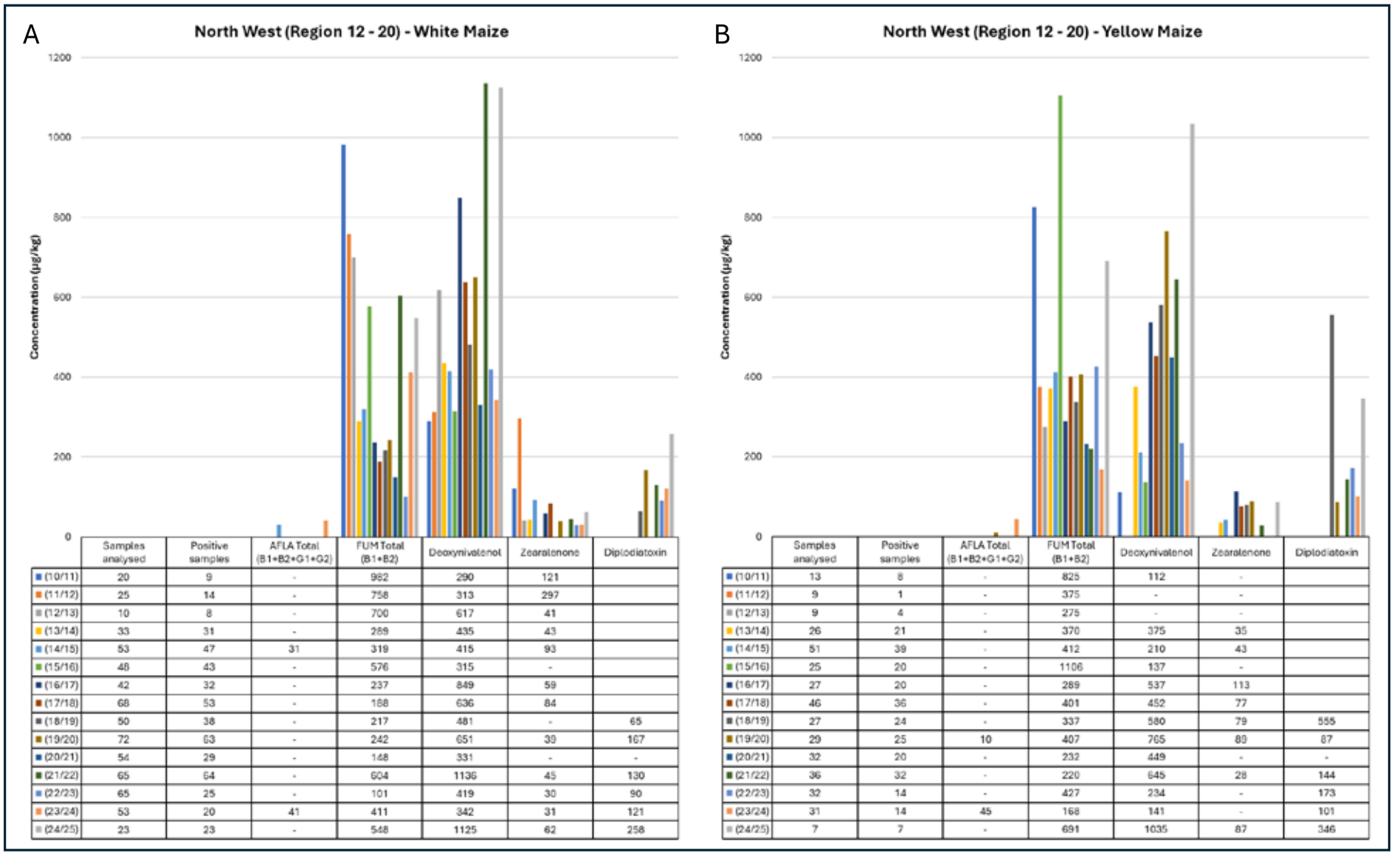
The mean concentration of total FUM in white maize was 548 µg/kg, which was higher than in the previous season (411 µg/kg). For yellow maize, the mean total FUM concentration was 691 µg/kg, which was higher than levels reported for the previous eight seasons. The mean DON concentration in white maize samples of 1 125 µg/kg was higher than in the previous season (342 µg/kg) and similar to levels reported for the 2021/22 season (1 136 µg/kg). In yellow maize, the mean DON concentration was 1 035 µg/kg, which was higher than levels reported for all previous seasons. The mean ZON concentration in white maize was 62 µg/kg, higher than in the previous season (31 µg/kg), while yellow maize recorded a mean concentration of 87 µg/kg. The mean diplodiatoxin concentration was 258 µg/kg for white maize and 346 µg/kg for yellow maize. Although diplodiatoxin levels in white maize were higher than in all previous seasons, the concentration in yellow maize remained lower than levels reported for the 2018/19 production season.

Table 43: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for the North West (Region 12 – 20)

Season	Samples analysed	AFLA Total ($B_1+B_2+G_1+G_2$)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	20	-	1341	883	187	
(11/12)	25	-	2140	485	297	
(12/13)	10	-	1507	617	41	
(13/14)	33	-	739	1837	64	
(14/15)	53	48	1351	1391	93	
(15/16)	48	-	6366	598	-	
(16/17)	42	-	1316	7698	65	
(17/18)	68	-	740	3016	84	
(18/19)	50	-	756	2410	-	68
(19/20)	72	-	602	7516	54	663
(20/21)	54	-	313	810	-	-
(21/22)	65	-	1277	3678	132	491
(22/23)	65	-	229	2061	30	91
(23/24)	53	41	1414	604	36	299
(24/25)	23	-	2990	5152	176	541

Table 44: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for the North West (Region 12 – 20)

Season	Samples analysed	AFLA Total ($B_1+B_2+G_1+G_2$)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	13	-	1401	119	-	
(11/12)	9	-	375	-	-	
(12/13)	9	-	494	-	-	
(13/14)	26	-	964	1353	44	
(14/15)	51	-	2130	328	60	
(15/16)	25	-	10746	159	-	
(16/17)	27	-	1143	1488	113	
(17/18)	46	-	1955	1696	86	
(18/19)	27	-	1258	2501	127	555
(19/20)	29	10	1792	5060	243	112
(20/21)	32	-	667	2169	-	-
(21/22)	36	-	549	2955	42	711
(22/23)	32	-	1013	730	-	226
(23/24)	31	45	371	207	-	124
(24/25)	7	-	2611	2705	220	460



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	20	9	-	982	290	121	
(11/12)	25	14	-	758	313	297	
(12/13)	10	8	-	700	617	41	
(13/14)	33	31	-	289	435	43	
(14/15)	53	47	31	319	415	93	
(15/16)	48	43	-	576	315	-	
(16/17)	42	32	-	237	849	59	
(17/18)	68	53	-	188	636	84	
(18/19)	50	38	-	217	481	-	65
(19/20)	72	63	-	242	651	39	167
(20/21)	54	29	-	148	331	-	-
(21/22)	65	64	-	604	1136	45	130
(22/23)	65	25	-	101	419	30	90
(23/24)	53	20	41	411	342	31	121
(24/25)	23	23	-	548	1125	62	258

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	13	8	-	825	112	-	
(11/12)	9	1	-	375	-	-	
(12/13)	9	4	-	275	-	-	
(13/14)	26	21	-	370	375	35	
(14/15)	51	39	-	412	210	43	
(15/16)	25	20	-	1106	137	-	
(16/17)	27	20	-	289	537	113	
(17/18)	46	36	-	401	452	77	
(18/19)	27	24	-	337	580	79	555
(19/20)	29	25	10	407	765	89	87
(20/21)	32	20	-	232	449	-	-
(21/22)	36	32	-	220	645	28	144
(22/23)	32	14	-	427	234	-	173
(23/24)	31	14	45	168	141	-	101
(24/25)	7	7	-	691	1035	87	346

Graph 66: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the Northern West regions over fifteen seasons from 2010 to 2025

Free State (Region 21 - 28)

The mean mycotoxin concentrations in white and yellow maize from the Free State region over fifteen seasons (2010 to 2025) are shown in Graph 67, and maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are presented in Tables 45 and 46, respectively. The number of white maize samples analysed was similar to previous seasons, while more yellow maize samples were included for the current season.

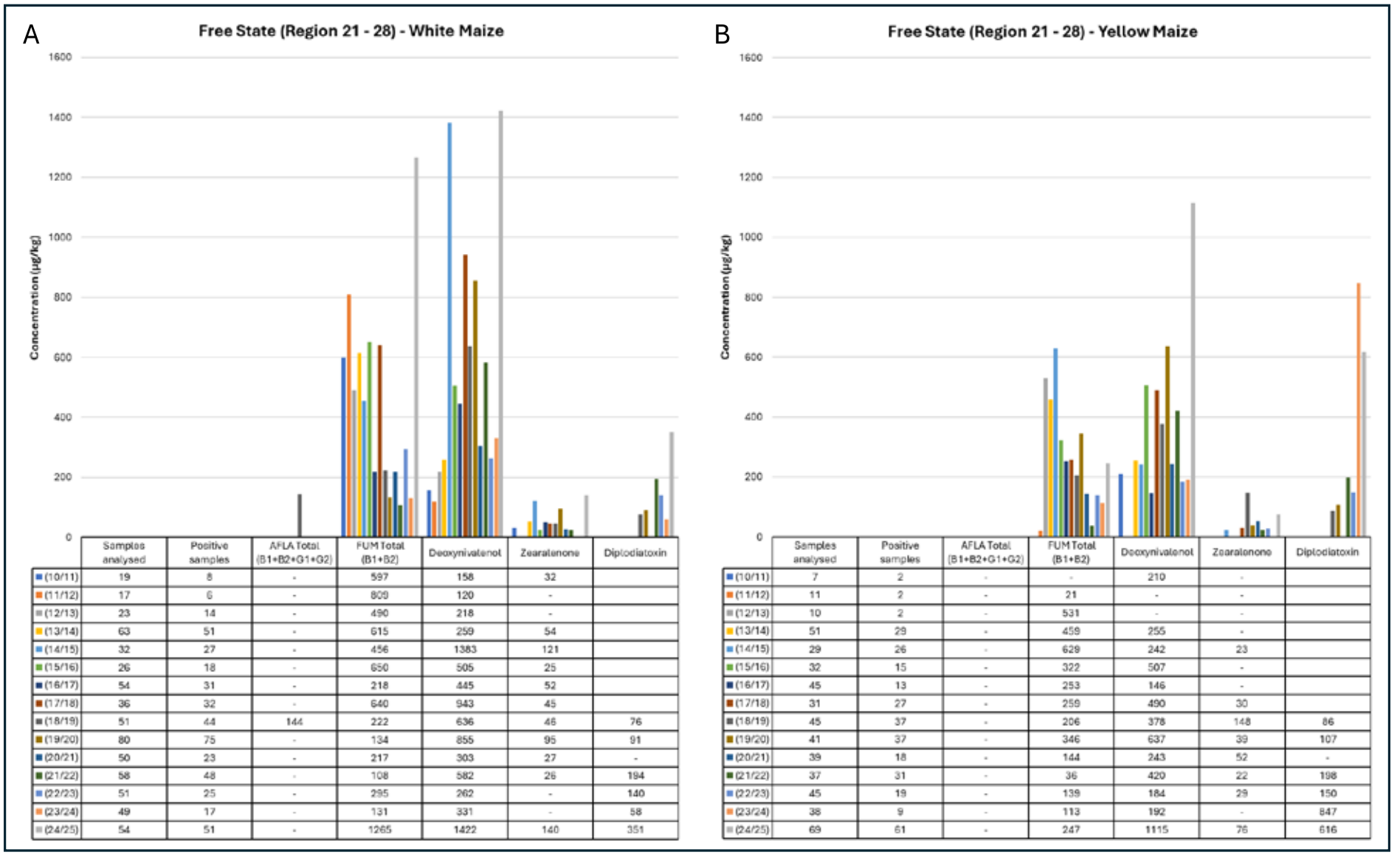
The mean total FUM concentration for white maize samples was 1 265 µg/kg, which was higher than levels reported for all previous seasons. During the current season, the maximum total FUM concentration in a white maize sample reached 13 243 µg/kg, which is the highest reported across all previous seasons. Although the mean total FUM concentration for yellow maize (247 µg/kg) was higher than in the previous season (113 µg/kg), the level remained lower than in most earlier seasons. The mean DON concentrations were 1 422 µg/kg for white maize and 1 115 µg/kg for yellow maize. Although DON levels in white maize were higher than in most previous seasons, they remained comparable to levels recorded during the 2014/15 season. In contrast, DON concentrations in yellow maize were notably higher than in all previous production seasons. The maximum DON concentration in a yellow maize sample was 5 919 µg/kg, which is the highest reported across all previous seasons. The mean ZON concentrations were 140 µg/kg for white maize and 76 µg/kg for yellow maize, consistent with levels reported for previous seasons. The mean diplodiatoxin concentration in white maize of 351 µg/kg was higher than in past seasons. For yellow maize, the mean diplodiatoxin concentration was 616 µg/kg, which was lower than the level reported for the previous season (847 µg/kg), although the maximum concentration of 5 348 µg/kg was the highest reported for all seasons.

Table 45: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for the Free State (Region 21 - 28)

Season	Samples analysed	AFLA Total ($B_1+B_2+G_1+G_2$)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	19	-	1126	201	41	
(11/12)	17	-	4197	120	-	
(12/13)	23	-	1455	241	-	
(13/14)	63	-	2775	791	82	
(14/15)	32	-	1612	9736	337	
(15/16)	26	-	3248	1585	26	
(16/17)	54	-	760	1868	73	
(17/18)	36	-	6927	2378	91	
(18/19)	51	144	1229	3604	60	98
(19/20)	80	-	464	7700	539	188
(20/21)	50	-	239	1159	27	-
(21/22)	58	-	285	2545	35	595
(22/23)	51	-	523	653	-	396
(23/24)	49	-	209	855	-	65
(24/25)	54	-	13243	9589	589	1386

Table 46: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for the Free State (Region 21 - 28)

Season	Samples analysed	AFLA Total ($B_1+B_2+G_1+G_2$)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	7	-	-	222	-	
(11/12)	11	-	21	-	-	
(12/13)	10	-	890	-	-	
(13/14)	51	-	1645	868	-	
(14/15)	29	-	3219	528	23	
(15/16)	32	-	1052	640	-	
(16/17)	45	-	808	148	-	
(17/18)	31	-	661	1606	30	
(18/19)	45	-	872	1454	148	246
(19/20)	41	-	1345	2150	39	242
(20/21)	39	-	228	531	52	-
(21/22)	37	-	40	3330	22	806
(22/23)	45	-	252	562	29	281
(23/24)	38	-	147	308	-	2389
(24/25)	69	-	879	5919	282	5348



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	19	8	-	597	158	32	
(11/12)	17	6	-	809	120	-	
(12/13)	23	14	-	490	218	-	
(13/14)	63	51	-	615	259	54	
(14/15)	32	27	-	456	1383	121	
(15/16)	26	18	-	650	505	25	
(16/17)	54	31	-	218	445	52	
(17/18)	36	32	-	640	943	45	
(18/19)	51	44	144	222	636	46	76
(19/20)	80	75	-	134	855	95	91
(20/21)	50	23	-	217	303	27	-
(21/22)	58	48	-	108	582	26	194
(22/23)	51	25	-	295	262	-	140
(23/24)	49	17	-	131	331	-	58
(24/25)	54	51	-	1265	1422	140	351

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	7	2	-	-	210	-	
(11/12)	11	2	-	21	-	-	
(12/13)	10	2	-	531	-	-	
(13/14)	51	29	-	459	255	-	
(14/15)	29	26	-	629	242	23	
(15/16)	32	15	-	322	507	-	
(16/17)	45	13	-	253	146	-	
(17/18)	31	27	-	259	490	30	
(18/19)	45	37	-	206	378	148	86
(19/20)	41	37	-	346	637	39	107
(20/21)	39	18	-	144	243	52	-
(21/22)	37	31	-	36	420	22	198
(22/23)	45	19	-	139	184	29	150
(23/24)	38	9	-	113	192	-	847
(24/25)	69	61	-	247	1115	76	616

Graph 67: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the Free State regions over fifteen seasons from 2010 to 2025

Mpumalanga (Region 29 - 33)

The mean mycotoxin concentrations in white and yellow maize from the Mpumalanga regions over fifteen seasons from 2010 to 2025 are shown in Graph 68. The maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are represented in Tables 47 and 48, respectively.

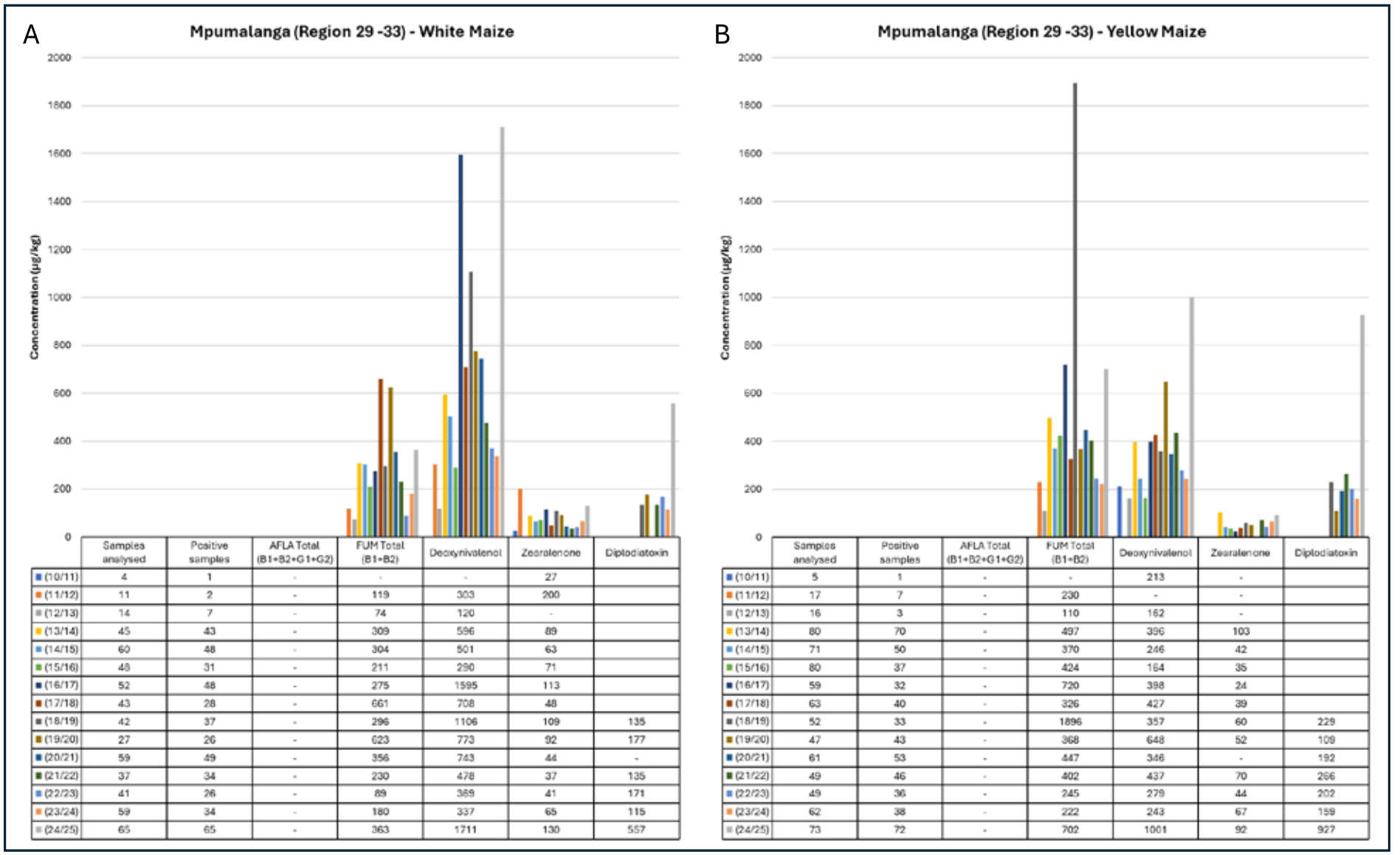
The mean total FUM concentration for white maize was 363 µg/kg. Although this level was higher than levels reported for the past four seasons, it remained within the historical range of 74 to 661 µg/kg. The concentration for yellow maize was 702 µg/kg, which was higher than levels reported for the past five seasons. The mean DON concentrations were 1 771 µg/kg for white maize and 1 001 µg/kg for yellow maize. These levels were higher than levels reported for all previous seasons. The mean ZON concentrations were 130 µg/kg for white maize and 92 µg/kg for yellow maize, both higher than in the previous season. The mean diplodiatoxin concentrations were higher than in all previous seasons for both white maize (567 µg/kg) and yellow maize (927 µg/kg). The maximum concentrations of 5 230 µg/kg for white maize and 8 627 µg/kg for yellow maize were the highest reported across all seasons.

Table 47: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for Mpumalanga (Region 29 -33)

Season	Samples analysed	AFLA Total ($B_1+B_2+G_1+G_2$)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	4	-	-	-	27	
(11/12)	11	-	119	303	200	
(12/13)	14	-	143	139	-	
(13/14)	45	-	1130	2730	445	
(14/15)	60	-	1246	3260	212	
(15/16)	48	-	721	801	127	
(16/17)	52	-	1958	7671	399	
(17/18)	43	-	3136	2812	97	
(18/19)	42	-	1382	11181	271	319
(19/20)	27	-	3635	5225	270	504
(20/21)	59	-	2235	3256	101	-
(21/22)	37	-	559	1794	49	317
(22/23)	41	-	293	1366	43	560
(23/24)	59	-	607	908	107	304
(24/25)	65	-	1754	10717	388	5230

Table 48: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for Mpumalanga (Region 29 -33)

Season	Samples analysed	AFLA Total ($B_1+B_2+G_1+G_2$)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	5	-	-	213	-	
(11/12)	17	-	674	-	-	
(12/13)	16	-	212	162	-	
(13/14)	80	-	5056	2601	354	
(14/15)	71	-	1197	851	71	
(15/16)	80	-	1836	304	36	
(16/17)	59	-	5551	1552	24	
(17/18)	63	-	1467	2348	58	
(18/19)	52	-	30189	777	75	1235
(19/20)	47	-	1044	1857	79	360
(20/21)	61	-	2459	1248	-	312
(21/22)	49	-	1552	2373	179	1347
(22/23)	49	-	1211	851	45	777
(23/24)	62	-	557	741	113	676
(24/25)	73	-	2706	4904	543	8627



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	4	1	-	-	-	27	
(11/12)	11	2	-	119	303	200	
(12/13)	14	7	-	74	120	-	
(13/14)	45	43	-	309	596	89	
(14/15)	60	48	-	304	501	63	
(15/16)	48	31	-	211	290	71	
(16/17)	52	48	-	275	1595	113	
(17/18)	43	28	-	661	708	48	
(18/19)	42	37	-	296	1106	109	135
(19/20)	27	26	-	623	773	92	177
(20/21)	59	49	-	356	743	44	-
(21/22)	37	34	-	230	478	37	135
(22/23)	41	26	-	89	369	41	171
(23/24)	59	34	-	180	337	65	115
(24/25)	65	65	-	363	1711	130	557

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	5	1	-	-	213	-	
(11/12)	17	7	-	230	-	-	
(12/13)	16	3	-	110	162	-	
(13/14)	80	70	-	497	396	103	
(14/15)	71	50	-	370	246	42	
(15/16)	80	37	-	424	184	35	
(16/17)	59	32	-	720	398	24	
(17/18)	63	40	-	326	427	39	
(18/19)	52	33	-	1896	357	60	229
(19/20)	47	43	-	368	648	52	109
(20/21)	61	53	-	447	346	-	192
(21/22)	49	46	-	402	437	70	266
(22/23)	49	36	-	245	279	44	202
(23/24)	62	38	-	222	243	67	159
(24/25)	73	72	-	702	1001	92	927

Graph 68: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the Mpumalanga regions over fifteen seasons from 2010 to 2025

Gauteng (Region 34)

The mean mycotoxin concentrations in white and yellow maize from the Gauteng regions over fifteen seasons from 2010 to 2025 are shown in Graph 69. The maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are represented in Tables 49 and 50, respectively.

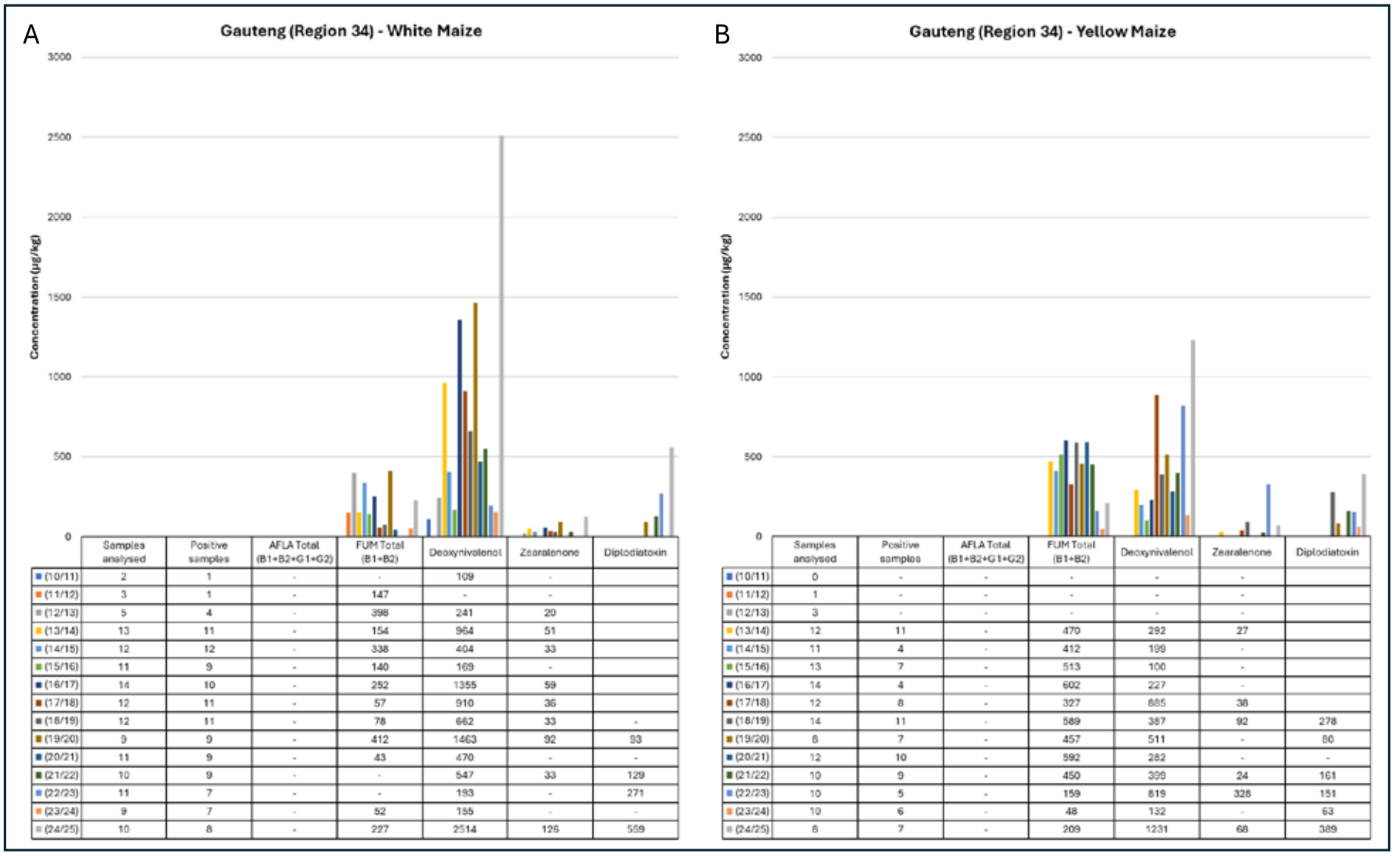
The mean total FUM concentration was 227 µg/kg for white maize and 209 µg/kg for yellow maize. Levels for white maize were higher than levels reported for the past three seasons and continued to be within the historical range of 43 to 412 µg/kg. The concentration for yellow maize was lower than levels reported for the 2010/11 to 2021/22 production seasons. In the current season, mean DON concentrations were higher than levels reported for all previous seasons for both white maize (2 514 µg/kg) and yellow maize (1 231 µg/kg). The mean ZON concentration was 126 µg/kg for white maize and 68 µg/kg for yellow maize. ZON was not detected in white or yellow maize during the previous production season. The mean diplodiatoxin concentrations were 559 µg/kg for white maize and 389 µg/kg for yellow maize.

Table 49: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for Gauteng (Region 34)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	2	-	-	109	-	
(11/12)	3	-	147	-	-	
(12/13)	5	-	1092	241	20	
(13/14)	13	-	395	6134	56	
(14/15)	12	-	1695	1135	35	
(15/16)	11	-	317	257	-	
(16/17)	14	-	673	3157	117	
(17/18)	12	-	86	2432	49	
(18/19)	12	-	152	3394	33	-
(19/20)	9	-	1254	3975	124	101
(20/21)	11	-	50	1599	-	-
(21/22)	10	-	-	1044	44	129
(22/23)	11	-	-	413	-	477
(23/24)	9	-	52	243	-	-
(24/25)	10	-	569	5010	207	2274

Table 50: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for Gauteng (Region 34)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	
(11/12)	1	-	-	-	-	
(12/13)	3	-	-	-	-	
(13/14)	12	-	1371	825	27	
(14/15)	11	-	621	287	-	
(15/16)	13	-	1308	100	-	
(16/17)	14	-	1212	321	-	
(17/18)	12	-	716	1828	38	
(18/19)	14	-	2787	804	180	711
(19/20)	8	-	1173	905	-	96
(20/21)	12	-	736	508	-	-
(21/22)	10	-	782	969	24	393
(22/23)	10	-	276	2205	328	151
(23/24)	10	-	54	134	-	65
(24/25)	8	-	436	2326	141	758



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	2	1	-	-	109	-	
(11/12)	3	1	-	147	-	-	
(12/13)	5	4	-	398	241	20	
(13/14)	13	11	-	154	964	51	
(14/15)	12	12	-	338	404	33	
(15/16)	11	9	-	140	169	-	
(16/17)	14	10	-	252	1355	59	
(17/18)	12	11	-	57	910	36	
(18/19)	12	11	-	78	662	33	-
(19/20)	9	9	-	412	1463	92	93
(20/21)	11	9	-	43	470	-	-
(21/22)	10	9	-	-	547	33	129
(22/23)	11	7	-	-	193	-	271
(23/24)	9	7	-	52	155	-	-
(24/25)	10	8	-	227	2514	126	559

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	-	
(11/12)	1	-	-	-	-	-	
(12/13)	3	-	-	-	-	-	
(13/14)	12	11	-	470	292	27	
(14/15)	11	4	-	412	199	-	
(15/16)	13	7	-	513	100	-	
(16/17)	14	4	-	602	227	-	
(17/18)	12	8	-	327	685	38	
(18/19)	14	11	-	589	387	92	278
(19/20)	8	7	-	457	511	-	80
(20/21)	12	10	-	592	282	-	-
(21/22)	10	9	-	450	399	24	161
(22/23)	10	5	-	159	819	328	151
(23/24)	10	6	-	48	132	-	63
(24/25)	8	7	-	209	1231	68	389

Graph 69: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the Gauteng region over fifteen seasons from 2010 to 2025

Limpopo (Region 35)

The mean mycotoxin concentrations in white and yellow maize from the Limpopo region over fifteen seasons (2010 to 2025) are shown in Graph 70, and maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are presented in Tables 51 and 52, respectively.

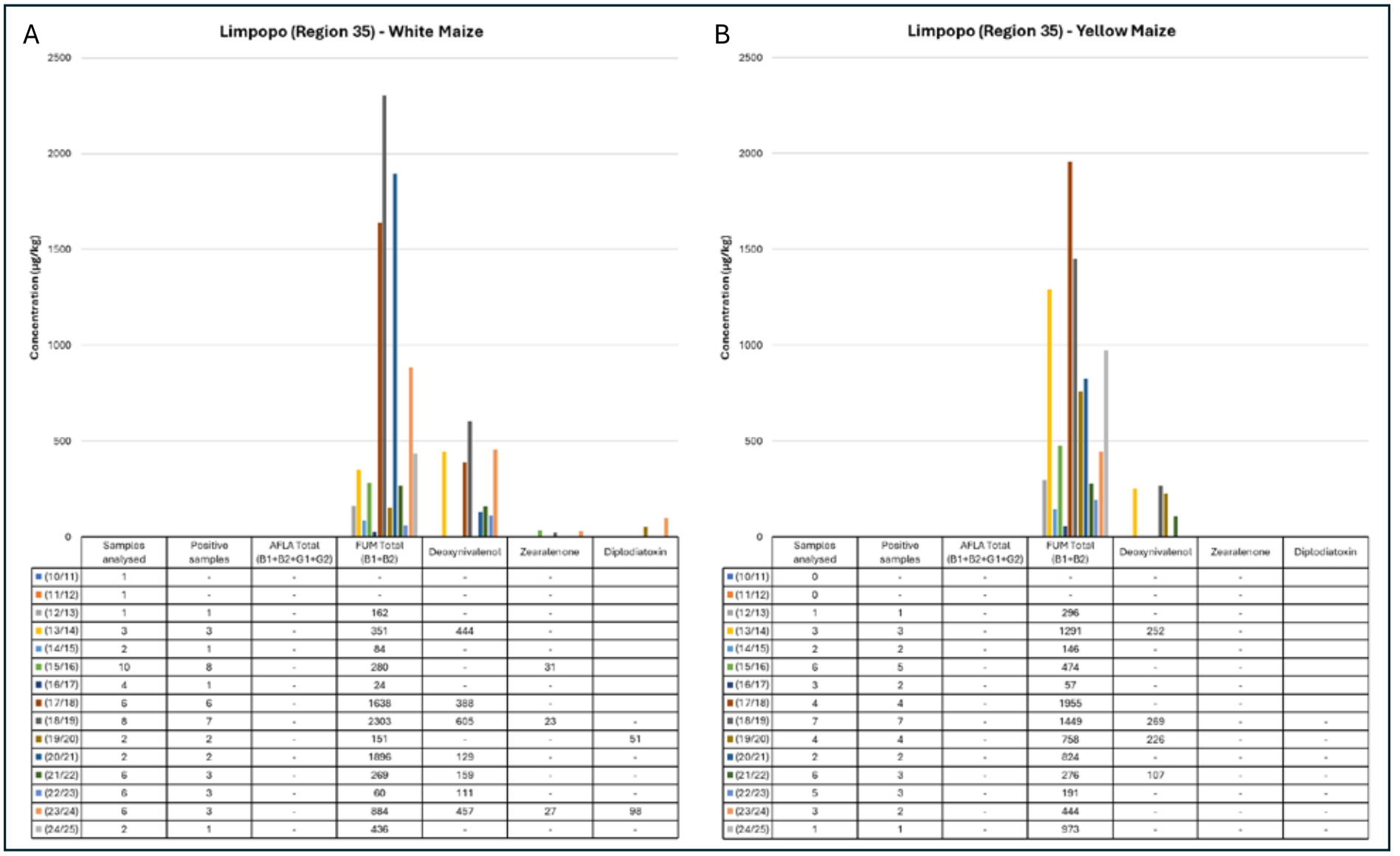
In the current season, only one white maize sample and one yellow maize sample recorded total FUM concentrations of 436 µg/kg and 973 µg/kg, respectively, which were consistent with levels from previous seasons.

Table 51: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for Limpopo (Region 35)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	1	-	-	-	-	
(11/12)	1	-	-	-	-	
(12/13)	1	-	162	-	-	
(13/14)	3	-	372	444	-	
(14/15)	2	-	84	-	-	
(15/16)	10	-	826	-	31	
(16/17)	4	-	24	-	-	
(17/18)	6	-	4258	701	-	
(18/19)	8	-	7040	1047	23	-
(19/20)	2	-	253	-	-	51
(20/21)	2	-	3751	129	-	-
(21/22)	6	-	484	159	-	-
(22/23)	6	-	86	111	-	-
(23/24)	6	-	1709	457	27	98
(24/25)	2	-	436	-	-	-

Table 52: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for Limpopo (Region 35)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	
(11/12)	0	-	-	-	-	
(12/13)	1	-	296	-	-	
(13/14)	3	-	2400	350	-	
(14/15)	2	-	210	-	-	
(15/16)	6	-	1055	-	-	
(16/17)	3	-	75	-	-	
(17/18)	4	-	5645	-	-	
(18/19)	7	-	4154	369	-	-
(19/20)	4	-	2507	226	-	-
(20/21)	2	-	1589	-	-	-
(21/22)	6	-	530	107	-	-
(22/23)	5	-	286	-	-	-
(23/24)	3	-	753	-	-	-
(24/25)	1	-	973	-	-	-



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	1	-	-	-	-	-	
(11/12)	1	-	-	-	-	-	
(12/13)	1	1	-	162	-	-	
(13/14)	3	3	-	351	444	-	
(14/15)	2	1	-	84	-	-	
(15/16)	10	8	-	280	-	31	
(16/17)	4	1	-	24	-	-	
(17/18)	6	6	-	1638	388	-	
(18/19)	8	7	-	2303	605	23	-
(19/20)	2	2	-	151	-	-	51
(20/21)	2	2	-	1896	129	-	-
(21/22)	6	3	-	269	159	-	-
(22/23)	6	3	-	60	111	-	-
(23/24)	6	3	-	884	457	27	98
(24/25)	2	1	-	436	-	-	-

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	0	-	-	-	-	-	
(11/12)	0	-	-	-	-	-	
(12/13)	1	1	-	296	-	-	
(13/14)	3	3	-	1291	252	-	
(14/15)	2	2	-	146	-	-	
(15/16)	6	5	-	474	-	-	
(16/17)	3	2	-	57	-	-	
(17/18)	4	4	-	1955	-	-	
(18/19)	7	7	-	1449	269	-	-
(19/20)	4	4	-	758	226	-	-
(20/21)	2	2	-	824	-	-	-
(21/22)	6	3	-	276	107	-	-
(22/23)	5	3	-	191	-	-	-
(23/24)	3	2	-	444	-	-	-
(24/25)	1	1	-	973	-	-	-

Graph 70: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the Limpopo region over fifteen seasons from 2010 to 2025

KwaZulu Natal (Region 36)

The mean mycotoxin concentrations in white and yellow maize from the KwaZulu Natal region over fifteen seasons from 2010 to 2025 are shown in Graph 71, and the maximum mycotoxin concentrations (µg/kg) in white and yellow maize samples are presented in Tables 53 and 54 respectively.

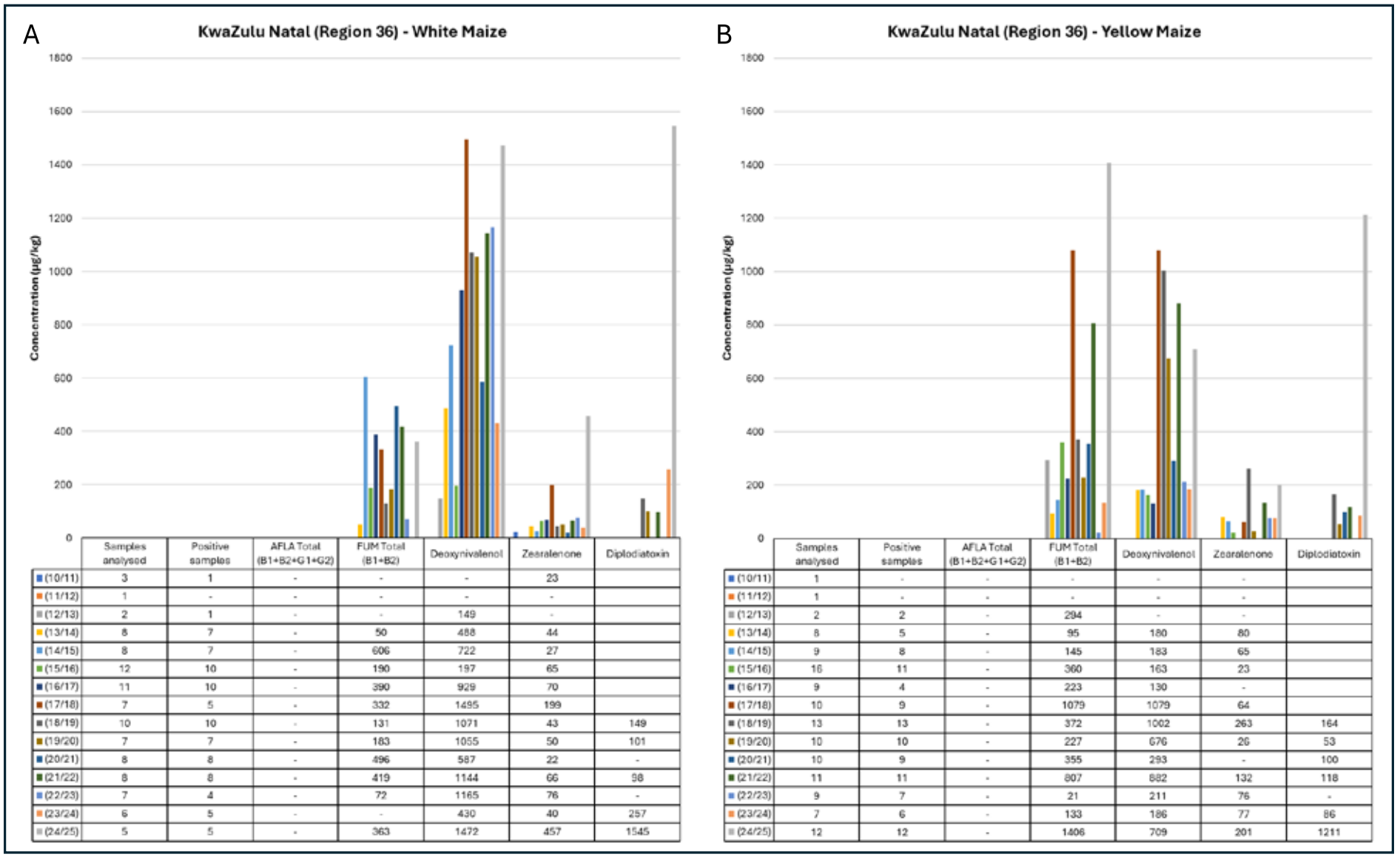
While FUM was not detected in white maize during the previous season, the total FUM concentration of 363 µg/kg was within the historical range of 50 to 606 µg/kg. In contrast, the total FUM concentration in yellow maize was 1 406 µg/kg, which was higher than levels reported for all previous seasons. The maximum concentration of 3 617 µg/kg for yellow maize was the highest reported across all seasons. The mean DON concentration for white maize was 1 472 µg/kg, which was higher than levels reported for the past six seasons. The DON concentration for yellow maize was 709 µg/kg and remained within the historical range of 130 to 1 079 µg/kg. The mean ZON concentration in white maize was 457 µg/kg, the highest level reported across all seasons. For yellow maize, the mean ZON concentration (201 µg/kg) was similar to the previous season. This season, mean diplodiatoxin concentrations for both white (1 545 µg/kg) and yellow maize (1 211 µg/kg) showed a noticeable increase compared to all previous seasons, with maximum concentrations of 2 919 µg/kg and 7 519 µg/kg for white and yellow maize, respectively.

Table 53: The maximum mycotoxin concentrations (µg/kg) in white maize samples analysed for KwaZulu Natal (Region 36)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G_2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	3	-	-	-	23	
(11/12)	1	-	-	-	-	
(12/13)	2	-	-	149	-	
(13/14)	8	-	78	1351	47	
(14/15)	8	-	1495	1285	36	
(15/16)	12	-	402	253	65	
(16/17)	11	-	714	3836	128	
(17/18)	7	-	418	3510	361	
(18/19)	10	-	400	4058	93	239
(19/20)	7	-	279	2105	78	145
(20/21)	8	-	791	1198	22	-
(21/22)	8	-	1032	3934	143	109
(22/23)	7	-	72	1848	107	-
(23/24)	6	-	-	675	49	402
(24/25)	5	-	1062	4673	611	2919

Table 54: The maximum mycotoxin concentrations (µg/kg) in yellow maize samples analysed for KwaZulu Natal (Region 36)

Season	Samples analysed	AFLA Total (B_1+B_2+G_1+G2)	FUM Total (B_1+B_2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	1	-	-	-	-	
(11/12)	1	-	-	-	-	
(12/13)	2	-	361	-	-	
(13/14)	8	-	163	236	127	
(14/15)	9	-	308	372	124	
(15/16)	16	-	826	234	23	
(16/17)	9	-	418	130	-	
(17/18)	10	-	2595	1956	121	
(18/19)	13	-	1193	3256	957	493
(19/20)	10	-	625	1353	28	53
(20/21)	10	-	907	442	-	100
(21/22)	11	-	807	3128	257	233
(22/23)	9	-	21	358	111	-
(23/24)	7	-	217	332	77	110
(24/25)	12	-	3617	2085	525	7519



	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	3	1	-	-	-	23	
(11/12)	1	-	-	-	-	-	
(12/13)	2	1	-	-	149	-	
(13/14)	8	7	-	50	488	44	
(14/15)	8	7	-	606	722	27	
(15/16)	12	10	-	190	197	65	
(16/17)	11	10	-	390	929	70	
(17/18)	7	5	-	332	1495	199	
(18/19)	10	10	-	131	1071	43	149
(19/20)	7	7	-	183	1055	50	101
(20/21)	8	8	-	496	587	22	-
(21/22)	8	8	-	419	1144	66	98
(22/23)	7	4	-	72	1165	76	-
(23/24)	6	5	-	-	430	40	257
(24/25)	5	5	-	363	1472	457	1545

	Samples analysed	Positive samples	AFLA Total (B1+B2+G1+G2)	FUM Total (B1+B2)	Deoxynivalenol	Zearalenone	Diplodiatoxin
(10/11)	1	-	-	-	-	-	
(11/12)	1	-	-	-	-	-	
(12/13)	2	2	-	294	-	-	
(13/14)	8	5	-	95	180	80	
(14/15)	9	8	-	145	183	65	
(15/16)	16	11	-	360	163	23	
(16/17)	9	4	-	223	130	-	
(17/18)	10	9	-	1079	1079	64	
(18/19)	13	13	-	372	1002	263	164
(19/20)	10	10	-	227	676	26	53
(20/21)	10	9	-	355	293	-	100
(21/22)	11	11	-	807	882	132	118
(22/23)	9	7	-	21	211	76	-
(23/24)	7	6	-	133	186	77	86
(24/25)	12	12	-	1406	709	201	1211

Graph 71: The mean mycotoxin concentrations in white maize (A) and yellow maize (B) from the KwaZulu Natal region over fifteen seasons from 2010 to 2025

National mycotoxin regulations

According to the Foodstuffs, Cosmetics and Disinfectants Act (Act 54 of 1972) and regulations published in Government Notice No. R. 1145, dated 8 October 2004, all foodstuffs, ready for human consumption, may not contain more than 10 µg/kg of aflatoxin, of which aflatoxin B_1 may not exceed 5 µg/kg.

Amendments to Government Notice No. R. 1145, dated 8 October 2004, published in Government Notice No. 987 of 05 September 2016, specify that

- Cereal grains (wheat, maize and barley) intended for further processing, may not contain more than 2 000 µg/kg of Deoxinyvalenol.
- Flour, meal, semolina and flakes derived from wheat, maize or barley, ready for human consumption, may not contain more than 1 000 µg/kg of Deoxinyvalenol.
- Raw maize grain, intended for further processing, may not contain more than 4 000 µg/kg of Fumonisins (B_1 + B_2), the whole commodity.
- Maize flour and maize meal, ready for human consumption, may not contain more than 2 000 µg/kg of Fumonisins (B_1 + B_2), the whole commodity.

Further processing means any other treatment or processing method that has been proven to reduce levels of fungus produced toxins in foodstuffs intended for human consumption.

According to the Fertilizers, Farm Feeds, Agricultural Remedies and Stock Remedies Act (Act 36 of 1947) as well as amendments published in Government Notices No. R. 70 of 12 February 2010 and R. 789 of 10 September 2010, the maximum allowable levels of mycotoxins in animal feeds, are as follows:

Substance, Products	Farm Feeds	MAXIMUM CONTENT IN mg/kg (ppm) relative to a farm feed with a moisture content of 120 g/kg	MAXIMUM CONTENT IN µg/kg (ppb) relative to a farm feed with a moisture content of 120 g/kg
Aflatoxin B_1	Feed ingredients with the exception of:	0.05	50
	groundnut, copra, palm-kernel cotton seed, maize and products derived from the processing thereof	0.02	20
	Complete farm feeds for cattle, sheep and goats with the exeption of:	0.05	50
	dairy cattle	0.005	5
	calves and lambs	0.01	10
	complete feeds for pigs and poultry (except young animals)	0.02	20
	other complete farm feeds (including pets)	0.01	10
	maize products intended for feedlots	0.3	300
	supplement/cncentrates for cattle, sheep and goats (except for dairy animals, calves and lambs)	0.05	50
Deoxynivalenol (DON)	Feeding stuffs on a full ration basis for:		
	Pigs	1	1 000
	cattle	5	5 000
	calves up tp 4 months	2	2 000
	dairy cattle	3	3 000
	poultry	4	4 000
	pets	1	1 000
Fumonisin B_1	Horses and pets	5	5 000
	Pigs	10	10 000
	Beef and poultry	50	50 000
	Fish	10	10 000
Ochratoxin A	Feeding stuffs on full ration basis for:		
	Pigs	0.05	50
	poultry	0.2	200
Zearalenone	Feeding stuffs on full ration basis for:		
	sows and pigs	5	5 000
	piglets	3	3 000
	calves and dairy cattle	0.5	500

Methods

Sampling Procedure

A working group determined the process to be followed to ensure that the crop quality samples sent to the SAGL by the various grain silo owners/agricultural businesses, are representative of the total crop.

Each delivery is sampled as per the grading regulations for grading purposes.

Once grading has been completed, these grading samples are placed in separate containers according to class and grade, per silo bin/bag/bunker/dam at each silo.

When the container is full or at the end of each week, the content of each container is divided with a multi slot divider in order to obtain a 3 kg sample (this should be done for each class and grade separately).

If there is more than one container per class and grade per silo bin/bag/bunker/dam, the combined contents of the containers are mixed thoroughly before dividing it with a multi slot divider to obtain the required 3 kg sample.

The samples are clearly marked with the name of the depot, the bin/bag/bunker/dam number(s) represented by each individual sample as well as the class and grade and then forwarded to the SAGL.

RSA Grading

RSA grading was done in accordance with the Grading Regulations for maize, as published in Government Notices No. R. 4368 of 16 February 2024 and No. R. 4433 of 1 March 2024.

For the definitions of the deviations referred to in the grading regulations, please see pages 101 to 103.

All samples were also inspected for the visual symptoms of Diplodia and Fusarium infection, which were reported separately.

Fusarium spp infections are localized on the cob with discoloured maize kernels, which become reddish (light pink to lilac).

Diplodia maydis normally rots the entire maize cob and infected maize kernels are recognized by a light ash colour to black colour that appears at the germ and can infest the whole kernel.

The % Cobrot reported, represents the percentage maize kernels that are both Fusarium and Diplodia infected.

The maximum permissible deviation (%) per grade for white and yellow maize are provided in the Table on page 110.

USA Grading

USA grading was determined in accordance with the American Grading Regulations (United States Department of Agriculture) as published in the *Grain Inspection Handbook, Book II, Grain Grading Procedures (October 2020), Chapter 4: Corn.*

Corn is defined as grain that consists of 50 percent or more of whole kernels of shelled dent corn and/or shelled flint corn (*Zea mays L.*) and not more than 10.0 percent of other grains for which standards have been established under the United States Grain Standards Act.

Whole kernels are kernels with three-fourths or more of the kernel present.

Corn is divided into three classes: Yellow corn, White corn, and Mixed corn. There are no subclasses in corn. Each class is divided into five numerical grades and U.S. Sample Grade. Special grades emphasize qualities or conditions affecting the value and are added to and made a part of the grade designation. Special grades do not affect the numerical or sample grade designation. Examples of special grades are Flint corn, Flint and Dent corn, Infested corn and Waxy corn.

Description of deviations relating to USA grading:

Heat damaged kernels

Kernels and pieces of kernels which are materially discoloured and damaged by heat, including material discolouration caused by artificial drying methods.

Damaged kernels

Kernels and pieces of corn kernels that are badly ground-damaged, badly weather-damaged, diseased, frost-damaged, germ-damaged, heat-damaged, insect-bored, mould-damaged, sprout-damaged or otherwise materially damaged.

Broken corn and foreign material

Broken corn is all matter that passes readily through a 12/64-inch (4.76 mm) round-hole sieve and over a 6/64-inch (2.38 mm) round-hole sieve according to procedures prescribed in Federal Grain Inspection Service (FGIS) instructions.

Foreign material is all matter that passes readily through a 6/64-inch round-hole sieve and all matter other than corn that remains on top of the 12/64-inch round-hole sieve after sieving according to procedures prescribed in FGIS instructions.

Broken corn and foreign material is all matter that passes readily through a 12/64-inch round-hole sieve and all matter other than corn that remains in the sieved sample after sieving according to procedures prescribed in FGIS instructions.

Test weight

The weight per Winchester bushel (2,150.42 cubic inches) as determined using an approved device according to procedures prescribed in FGIS instructions.

Test weight is determined before the removal of broken corn and foreign material on a portion sufficient quantity to overflow the kettle.

Physical Characteristics

Test weight

Bushel weight in pounds (lbs) was determined on the maize crop samples and the results converted to test weight reported in kilogram/hectoliter (kg/hl), by multiplication with a factor of 1.2872.

The specific mass (or grain density) of maize expressed as test weight is influenced by amongst other, factors like cultivar, moisture content, foreign matter, other grain and damaged kernels like insect damaged and immature kernels.

Hundred (100) kernel mass - Industry accepted method 001

100 kernel mass is the weight in grams of one hundred whole maize kernels and provides a measure of grain size and density. The results are reported on an “as is” basis.

Kernel size - Industry accepted method 017

Kernel size is important to the sophisticated starch manufacturing industry. Kernels that are too small hamper the separation of kernel fractions in the wet milling process. The result is a lower starch yield. A mixture of small and large kernels causes additional problems, as homogeneous steeping cannot be achieved. On the other hand, very large kernels can also cause problems since the ratio between volume and mass is unfavourable to proper steeping.

The dry milling industry also prefers fairly larger maize kernels. However, uniform kernel size is of particular importance to this industry, since too large kernels create problems especially when mixed with smaller kernels.

Kernel size is less important to the animal feed manufacturing industry. Larger kernels are nevertheless preferred, as small kernels are easily lost during the screening stage of processing. The determination of kernel size comprises the sieving of a 100 g representative whole maize sample through both 8 mm and 10 mm round-hole grading sieves, routinely used in the seed industry.

Breakage susceptibility - Industry accepted method 007

Maize is normally cleaned before processing. In the cleaning process, broken kernels are removed together with other impurities, causing losses. Broken kernels are further broken during handling, resulting in excessive grain dust being generated. This creates the

potential for dust explosions, health hazards, hygiene problems, etc. Maize containing a high percentage of broken kernels is more prone to insect infestation and is subject to general deterioration.

In the modern dry milling industry, maize is cleaned first and then conditioned by dampening before the germ is removed. Broken kernels cause many problems during these stages of processing. Broken kernels can also lead to a lower extraction of the so-called high-quality products, like samp and maize grits. The presence of many broken kernels causes problems with the fibre and fat content of maize products (e.g. the various grades of maize meal), because the quantity of germ required to be returned to the milled endosperm cannot be determined accurately.

In the wet milling process broken kernels steep more rapidly than whole kernels and by the time the whole kernels have been sufficiently steeped, the broken kernels have been over-steeped, causing an ineffective separation of protein and starch.

In the livestock feed industry breakability is not an important quality characteristic, except for dust and hygiene reasons.

All samples were subjected to a breakage susceptibility test. After the sample of whole maize kernels was propelled in a Stein Breakage tester for 4 minutes, the fractions below the 6.35 mm and 4.75 mm sieves were collected and the percentages broken kernels smaller than (<) 6.35 mm and 4.75 mm determined.

Stress cracks - Industry accepted method 006

Stress cracks are determined by visual inspection of a certain amount of whole maize kernels examined on top of a light box for small internal cracks in the endosperm. Some kernels may even have two or more internal cracks. Any form of stress may cause internal cracks, for example rapid moisture loss in the field, during harvest or during drying.

Milling Index - Industry accepted method 015

Milling Index is an indication of the milling abilities and milling quality of maize kernels where a higher milling index means a higher extraction of the high-grade and most profitable products like samp, maize rice and maize grits (degermed products) that are manufactured from the corneous part of the endosperm.

The milling index is a model developed on the Foss NIT Infratec 1241- Generation 3 Standard Version Grain Analyser where the NIT spectra were modelled against the Roff milling fractions. In previous seasons (until 2015/16) the Milling index of the samples were determined with the calibration model developed by the Grain Crops Institute of the ARC. With this model, the average milling index of a sample with good milling characteristics is about 95 with a variation of about 55 (low milling quality) to about 115 (very good milling quality).

The SAGL was tasked by the Maize Trust to develop a new model for Milling Index using samples from maize cultivar trials supplied by the ARC-GCI and by commercial seed breeders over four seasons (from 2012/13 onward). The trials included a range of hardness levels. The New Milling Index (NMI) that was developed is similar to the original ARC formula but on a 14% moisture basis, and with the constants removed. The NMI model has improved precision compared to the older version, due to the almost tenfold increase in the number of samples used to build the calibration model.

During the fifth year, samples of commercial hybrids, selected imported maize samples and outlier samples from the 2014/15 and 2015/16 seasons were included to develop a robust model with the assistance of Foss to produce accurate results. The improved new model includes two parameters, SAGL Milling Index (SAGL MI) as well as Grit Yield (GYA).

SAGL MI indicates the relative ratio of total hard endosperm products (B2 grits, B3 fine grits and B3 coarse grits) to offal products (B1 fine flour and total chop/bran) as determined on a Roff mill and used for calibration of the NIT. It is expressed as a dimensionless index value according to the following scale:

SAGL MI	<40	40-60	60-80	80-100	>100
Description	Soft	Medium	Moderately hard	Hard	Very hard

GYA is defined as the sum of the mass fractions of the Roff B2 grits, B3 fine grits and B3 coarse grits fractions expressed as a mass percentage

of the total mass of the whole maize before milling. GYA is linearly correlated with the SAGL MI and indicates the true amount of total hard endosperm that can be extracted from the maize during Roff milling. The NIT calibration value for GYA provides this estimate directly from the whole maize without need for further milling tests. GYA is also reported on a 14% moisture base.

The 2024/25 season maize samples were measured with the NIT on the SAGL Milling Index 2025 model.

Milling of Maize on the Roff Maize Mill - Industry accepted method 013

The Roff 150 Series maize mill is used to mill representative samples of 500 g. The mill is pre-set to the following specifications: Break 1 roll nip - 0.3 mm, Break 2 roll nip - 0.18 mm and Break 3 roll nip - 0.08 mm. These settings are according to the specifications in the method developed by the ARC Grain Crops Institute. Every mill has three separations, namely chop, grits and maize meal. The grits from Break 1 are transferred to the Break 2 rolls and the grits from Break 2 are transferred to Break 3 rolls.

The maize sample is conditioned on two consecutive days and milled on the second conditioning day.

The following fractions are weighed and determined as percentages: Break 1 meal, Break 2 meal, Break 3 meal and Break 3 grits. Break 1, 2 and 3 chop are combined and then weighed for determination of % Chop. Break 3 grits are weighed for determination of % Grits. The percentage extraction total meal is determined as the sum of the percentages Break 1, 2 and 3 meal as well as the % Grits.

Milling of Maize on Roff Maize Mill - Industry accepted method 029

The Bühler MCKA is used for experimental milling only; the results achieved on the mill will be directly influenced by how the mill is set up.

The maize samples are conditioned on two consecutive days and milled on the second conditioning day.

A 1 kg sample is degermed with the Grainman degerminator before milling on the Bühler Maize mill. The following fractions on the Bühler mill are collected, weighed and determined as percentages, Degerminator meal, Break1 meal, Break 2 meal, Break 3 meal, C1 meal, C2 meal, C3 meal, G3 meal and G1 & G2 chop.

The percentage extraction total meal is determined as the sum of all the meal fractions ($B_1 + B_2 + B_3 + C_1 + C_2 + C_3 + G_3$) divided by the sum of all the fractions multiplied by 100.

Whiteness Index - Industry accepted method 004

Whiteness index of white maize meal was determined with the HunterLab ColorFlex 45°/0°. Whiteness is associated with a region or volume in colour space in which objects are recognized as white. The degree of whiteness is measured by the degree of departure of the object from a perfect white. The higher the whiteness index value, the whiter the sample.

Whiteness index on maize meal obtained from the Roff mill was done on unsifted and sifted maize meal obtained from Break 2 and 3. The sifted samples were obtained by sieving the unsifted samples through a 300 µm sieve. The fractions on top and below the sieve were then combined to result in sifted samples that contain 87% of maize meal > 300 µm and 13% of maize meal < 300 µm.

Whiteness index on maize meal obtained from the Bühler MCKA mill was done on unsifted and sifted maize meal obtained by combining fractions B1, B2 and C1. The sifted samples were obtained by sieving the unsifted samples through a 300 µm sieve. The fractions on top and below the sieve were then combined to result in sifted samples that contain 87% of maize meal > 300 µm and 13% of maize meal < 300 µm.

Nutritional Values

The moisture, fat, protein, starch and crude fibre contents are measured with an Infratec 1241 - Generation 3 Standard Version Whole Grain Analyser. The measurements are based on the fact that the constituents to be measured in the grain, absorb electromagnetic radiation in the near-infrared region of the spectrum. Since the Infratec 1241 Grain Analyser uses transmission absorption, the test is done on intact maize kernels. The results are reported on a dry (moisture free) basis.

The calibration on the Infratec 1241 Grain Analyser (NIT) including the moisture, protein, fat, starch and crude fibre parameters, is updated annually by Foss using NIT spectra and international primary chemical method results of maize crop quality samples from the specific season under discussion, provided by SAGL.

The chemical methods used to check the calibration are:

- Moisture on whole maize kernels: Sample is dried in an oven for 72 hours at 103 °C (AACCI 44-15.02)
- Moisture on milled maize: Sample is dried in an oven for 1 hour at 130 °C (AACCI 44-15.02)
- Crude fat: Petroleum ether extraction (Soxhlet) method (In house method 024)
- Crude protein: Dumas (Leco) method (AACCI 46-30.01)
- Starch: Hydrochloric Acid dissolution method (Polarimeter) (In house method 019)
- Crude fibre: In-House method 031, based on AACCI method 32-10.01 using the Velp FIWE Advance fibre AutoExtractor.

The results obtained by the Infratec 1241 Grain Analyser (NIT) on the 2024/25 season's samples, were checked by analysing every tenth sample by means of the primary methods.

Mycotoxin Analyses

Mycotoxins are fungal metabolites, toxic to animals and humans, that are produced by moulds commonly found in almost all types of grain.

350 of the 1 000 maize crop samples were selected to proportionally represent the various production regions and the white/yellow maize ratio for each region.

The samples to be analysed were milled with a 1 mm sieve. Two subsamples of 10 g are extracted with an aqueous / organic solvent mixture, filtered, diluted and analysed with the LCMS/MS. The mycotoxins are separated on a reversed-phase column and analysed with positive electrospray (EI) ionisation in the multiple reaction monitoring (MRM) mode. For each compound, one precursor and two product ions are detected, one product ion for quantification and one for confirmation. The mean values of duplicate results are reported in µg/kg.

Matrix-matched working standards are used to draw a calibration curve for each mycotoxin with at least five calibration levels. A blank sample and spiked samples (to determine % recoveries) are analysed with every batch of samples as quality control samples. Reported results are not corrected for recovery.

The mycotoxins included in the multi-mycotoxin screening method (In house method 026) are Aflatoxin B_1, B_2, G_1, G_2, Fumonisin B_1, B_2 and B_3, Deoxynivalenol, 15-ADON, HT-2 Toxin, T-2 Toxin, Zearalenone, Ochratoxin A and Diplodiatoxin.

Limit of quantitation (LOQ) means the lowest concentration level that can be quantified with acceptable precision and accuracy by the mass spectrometer. A concentration measured below the LOQ is reported as <LOQ.

Mycotoxin	Limit of quantitation (LOQ), µg/kg
Aflatoxin B_1	2
Aflatoxin B_2	2
Aflatoxin G_1	2
Aflatoxin G_2	5
Deoxynivalenol	100
15-Acetyl-Deoxynivalenol	100
Fumonisin B_1	20
Fumonisin B_2	20
Fumonisin B_3	20
Ochratoxin A	2
T2-Toxin	20
HT2-Toxin	20
Zearalenone	20

Limit of detection (LOD) is the lowest concentration level that can be detected but not quantified and is 50% of the LOQ of each mycotoxin. A concentration measured below the LOD is reported as not detected (ND).

CERTIFICATE OF ACCREDITATION

In terms of section 22(2) (b) of the Accreditation for Conformity Assessment, Calibration and Good Laboratory Practice Act, 2006 (Act 19 of 2006), read with sections 23(1), (2) and (3) of the said Act, I hereby certify that:-

SOUTHERN AFRICAN GRAIN LABORATORY NPC

Co. Reg. No.: 1997/018518/08

Southern African Grain Laboratories NPC

Facility Accreditation Number: **T0116**

is a South African National Accreditation System accredited facility
provided that all conditions and requirements are complied with

This certificate is valid as per the scope as stated in the accompanying schedule of accreditation, Annexure "A", bearing the above accreditation number for

CHEMICAL AND PHYSICAL ANALYSIS

The facility is accredited in accordance with the recognised International Standard

ISO/IEC 17025:2017

The accreditation demonstrates technical competency for a defined scope and the operation of a quality management system

While this certificate remains valid, the Accredited Facility named above is authorised to use the relevant accreditation symbol to issue facility reports and/or certificates

Mrs FS Radebe
Acting Chief Executive Officer

Effective Date: 01 November 2024
Certificate Expires: 31 October 2029

ANNEXURE A

SCHEDULE OF ACCREDITATION

Facility Number: **T0116**

Permanent Address of Laboratory:

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Pretoria
0040

Technical Signatories:

Ms	J Nortje (All Chemical, Grading and Rheological Methods)
Ms	A de Jager (Nutrients & Contaminants Methods excl. 026)
Ms	W Louw (In-house Methods 001, 002, 003, 010 & 026)
Ms	D Moleke (Rheological Methods)
Ms	M Motlanthe (In-house Methods 001, 003 & 026)
Ms	T de Beer (Rheological Methods)
Ms	S Makhoba (In-House Method 026)
Ms	T Mabobo (In-House Methods 001, 002, 003, 010 & 026)
Mr	J Kobola (All Grading Methods)
Ms	J Ntimane (All Chemical Methods)
Mr	J Geldenhuys (All Grading Methods)
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Issue No.: 39
Date of Issue: 01 June 2026
Expiry Date: 31 October 2029

Material or Products Tested	Type of Tests / Properties Measured, Range of Measurement	Standard Specifications, Techniques / Equipment Used
CHEMICAL		
Ground Barley	Moisture (Oven Method)	Analytical EBC Method 3.2, latest Edition (2 hour; 130°C)
Cereal and cereal products specifically-wheat, rice, (hulled paddy), barley, millet, rye, and oats as grain, semolina and flour	Moisture (Oven Method)	ICC Std No.110/1, Latest Edition (90 min; 130˚C) (2 hour; 130˚C)
Flour, semolina, bread, all kind of grains and cereal products and food products (except those that are sugar coated)	Moisture (Oven Method)	AACCI 44-15.02, Latest Edition (1 hour; 130˚C) (72 hour; 103˚C)

Animal feed, Plant tissue and Sunflower (Milled)	Moisture (Oven Method)	AgriLASA 2.1 Latest Edition (5 hours; 105°C)
All flours, cereal grains, oilseeds and animal feeds	Nitrogen and protein (Combustion method - Dumas)	AACCI 46-30.01, Latest Edition
Cereal based food stuff	Dietary fibres (Total)	In-house method 012
Food stuff and feeds	Carbohydrates (by difference) (calculation) Energy value (calculation) Total digestible nutritional value (calculation)	SOP MC 23
Food Stuff and feeds	Determination of Ash	In-house method 011
Wheat Kernels	Moisture (Oven Method)	Government Gazette Wheat Regulation, Latest Edition (72 hour, 103˚C)
Flours of grains e.g. barley, oats, triticale, maize, rye, sorghum and wheat; oilseeds like soybeans and sunflower, feeds and mixed feeds and foodstuffs	Crude fat (Ether extraction by Soxhlet)	In-house method 024
Meal and flour of wheat, rye, barley, other grains, starch containing and malted products	Falling number	ICC Std 107/1, Latest Edition
NUTRIENTS AND CONTAMINANTS		
Vitamin fortified food and feed products and fortification mixes grain based	Vitamin A as all trans Retinol (Saponification) (UPLC)	In-house method 001
	Thiamine Mononitrate (UPLC) Riboflavin (UPLC) Nicotinamide (UPLC) Pyridoxine Hydrochloride (UPLC)	In-house method 002
	Folic Acid (UPLC)	In-house method 003
Grain based food and feed products (fortified and unfortified) and fortification mixes	Total Sodium (Na) (AA) Total Iron (Fe) (AA) Total Zinc (Zn) (AA)	In-house method 010
Yeast and Bread	Vitamin D_2 (UPLC)	In-House method 029
Food and feed	Multi-Mycotoxin: (LCMSMS) -Aflatoxin G_1, B_1, G_2, B_2 and total -Deoxynivalenol (DON), 15-ADON -Fumonisin B_1, B_2, B_3 -Ochratoxin A -T2, HT-2 - Zearalenone	In-house method 026

Facility Number: T0116

GRADING		
Maize	Defective kernels (White maize/ yellow maize)	Government Gazette Maize Regulation, Latest Edition
Cereal as grains (Wheat, barley, rye and oats)	Hectolitre mass (Kern222)	ISO 7971-3, Latest edition
Wheat	Screenings	Government Gazette Wheat Grading Regulation, Latest Edition
RHEOLOGICAL		
Wheat flour	Alveograph (Rheological properties)	ICC Std.121, Latest Edition
Flours	Farinograph (Rheological properties)	AACCI 54.02, Latest Edition (Rheological behaviour of flour Farinograph: Constant Flour Weight procedure)
Hard, soft and durum wheat (flour and whole wheat flour)	Mixograph (Rheological properties)	Industry accepted method 020 (Based on AACCI 54-40.02, Latest Edition Mixograph Method)

Original Date of Accreditation: 01 November 1999

ISSUED BY THE SOUTH AFRICAN NATIONAL ACCREDITATION SYSTEM

Accreditation Manager

Page 3 of 3

DEPARTMENT OF AGRICULTURE, LAND REFORM AND RURAL DEVELOPMENT

NO. R. 4368 **16 February 2024**

AGRICULTURAL PRODUCT STANDARDS ACT, 1990
(ACT No. 119 OF 1990)

REGULATIONS RELATING TO THE GRADING, PACKING AND MARKING OF MAIZE INTENDED FOR SALE IN THE REPUBLIC OF SOUTH AFRICA

The Minister of Agriculture, Land Reform and Rural Development acting under section 15 of the Agricultural Product Standards Act, 1990 (Act No. 119 of 1990), made the regulations in the Schedule.

MRS AT DIDIZA, MP
MINISTER FOR AGRICULTURE, LAND REFORM AND RURAL DEVELOPMENT

SCHEDULE

Definitions

1. In these regulations any word or expression to which a meaning has been assigned in the Act shall have that meaning and, unless the context otherwise indicates -

"**animal filth**" means all animal matter which may contaminate the maize, such as dead rodents, dead birds including hair, dung and/or feathers;

"**bag**" means a bag manufactured from -

(a) jute or phormium or a mixture of jute and phormium; or

(b) polypropylene that complies with SABS specification CKS632;

"**bulk container**" means any vehicle or container in which bulk maize is stored or transported;

"**consignment**" means -

(a) a quantity of maize of the same class, which belongs to the same owner, delivered at any one time under cover of the same consignment note, delivery note or receipt note, or delivered by the same vehicle or bulk container, or loaded from the same bin of a grain elevator or from a ship's hold; or

(b) in the case where a quantity referred to in paragraph (a), is subdivided into different grades, each such quantity of each of the different grades;

"**coffee-stained maize kernels**" means maize kernels with a shiny brown colour that occurs anywhere on the pericarp of the maize kernel;

"**container**" means a bag or a bulk container;

"**defective maize kernels**" means maize kernels and pieces of maize kernels that:

(a) are shrivelled, obviously immature, fungi infected, heat damaged and frost damaged;

(b) have sprouted, including kernels of which the shoot (plumule) in the germ is visibly discoloured;

(c) have cavities in the germ or endosperm caused by insects or rodents;

(d) are visibly soiled (smeared) or contaminated by smut, fire, soil, smoke or coal-dust;

(e) all matter that can pass through the 6,35 mm round-hole sieve;

(f) are of subspecies other than *Zea mays indentata* or *Zea mays indurata*.

Provided that -

(i) irregularity of shape and size of maize kernels shall not affect the grading thereof;

(ii) chipped or cracked maize kernels or pieces of maize kernels which are in a sound condition, and which appear in a sample of maize, but which do not pass through a 6,35 mm round-hole sieve, shall not be regarded as defective maize kernels under these regulations.

(iii) oxidation-stained maize kernels, coffee-stained maize kernels, pinked maize kernels, water damaged kernels and discoloured maize kernels shall not be considered as defective.

"**discoloured maize kernels**" means maize kernels that are as a result of environmental conditions discoloured on both sides of the kernel, excluding, oxidation-stained maize kernels, coffee-stained maize kernels and pinked maize kernels;

"**foreign matter**" means all matter other than maize, excluding, animal filth, coal, glass, metal, plastic, and stones;

"**frost damaged kernels**" means maize kernels that are damaged by frost characterized by two or more of the following:

(a) a dull brown discoloration from the connecting tip and/or;

(b) an underdeveloped endosperm in relation to the germ; and/or

(c) the pericarp is blistered or flaked.

"**fungi infected kernels**" means maize of which the kernels or pieces of kernels are visibly infected with fungi and has corresponding meaning with mould infected kernels:

(a) are characterised by black, blue, green, yellow or white fungi growth anywhere on the kernel, or are characterised by fungi growth underneath the bran layer of the kernel;

(b) are infected by ear-rot and are characterised by red, pink, or brown discolorations. The kernels are partially to completely infected.

"**heat damaged kernels**" means kernels that are as a result of external heat or internal fermentation affected with excess moisture and have at least one of the following characteristics:

(a) Kernels or pieces of kernels that are amber, brown, dark brown or black discoloured.

(b) Kernels of which the germ has dark-brown to black discoloration.

"**insect**" in relation to maize, means any live insect which is injurious to stored grain, irrespective of the stage of development of the insect;

"**maize**" means the threshed kernels or pieces of kernels of the plants of *Zea mays indurata* and *Zea mays indentata* or one or more crossings of the two types;

"**other colour maize kernels**" in relation to -

(a) **white maize**, means maize kernels or pieces of maize kernels of which the endosperm as a result of genetic (characteristics) composition have another colour than white, excluding pinked maize kernels;

(b) **yellow maize**, means maize kernels or pieces of maize kernels of which the endosperm as a result of genetic (characteristics) composition have another colour than yellow;

"**oxidation-stained maize kernels**" means maize kernels with a shiny light brown colour on the pericarp that are discoloured from the crown and not from the tip cap;

"**pinked maize kernels**" means kernels and pieces of kernels of white maize of which the pericarp or part thereof is shaded red or pink in colour;

"**poisonous seeds**" means seeds or part of seeds of plant species that may in terms of the Foodstuffs, Cosmetics and Disinfectants Act, 1972 (Act No. 54 of 1972) represent a hazard to human or animal health when consumed, including seeds of *Argemone mexicana, Convolvulus* spp., *Crotalaria* spp., *Datura* spp., *Ipomoea* spp. *Lolium temulentum*, *Ricinus communis* or *Xanthium* spp.;

"**shrivelled or obviously immature maize kernels**" means maize kernels with a thin and shrunken appearance;

"**sprouted maize kernels**" means maize kernels which have sprouted so far that developing roots and/or sprouts are clearly visible, or the shoot (plumule) in the germ is visibly discoloured;

"**the Act**" means the Agricultural Product Standards Act, 1990 (Act No. 119 of 1990);

"**the 6,35 mm round-hole sieve**"(± 0,05mm) means a sieve

(a) with a flat metal sheet bottom of 1,0 mm thickness perforated with round holes of 6,35 mm(±0,05mm) in diameter that are arranged with the centres of the holes at the points of intersection of an equilateral triangular grid with a pitch of 8 mm;

(b) of which the upper surface of the bottom is smooth;

(c) the frame of which is at least 40 mm high;

(d) with the inner width of at least 200 mm and the inner length of at least 300 mm, or, in the case of a circular sieve, the inner diameter of at least 278 mm; and

(e) with a minimum area of 600cm^2 and a maximum of 750cm^2

(f) that fits onto a tray with a solid bottom and must be at least 20mm above the bottom of the tray; and

"**water damaged maize kernels**" means maize kernels with a light yellow shine from the tip cap in a band around the maize kernel.

Scope of regulations

2. These regulations are minimum standards applicable to maize that is destined for sale in the Republic of South Africa but does not include-

(a) maize in retail quantities; and

(b) maize for seed production purposes.

Restrictions on sale of maize

3. (1) No person shall sell maize in the Republic of South Africa -

(a) unless the maize is sold according to the classes set out in regulation 4;

(b) unless the maize complies with the standards for the class concerned set out in regulation 5;

(c) unless the maize complies with the grades of maize and the standards for grades, where applicable, set out in regulations 6 and 7 respectively;

(d) unless the maize is packed in accordance with the packing requirements set out in regulation 8;

(e) unless the containers or sale documents, (as the case may be), are marked in accordance with the marking requirements set out in regulation 9; and

(f) if such maize contains a substance that renders it unfit for human consumption or for processing into or utilisation thereof as food or feed.

(2) The Executive Officer may grant written exemption, entirely or partially to any person on such conditions as he or she may deem necessary, from the provisions of sub regulation 1: Provided that such exemption is done in terms of section 3 (1) (c) of the Act.

PART I
QUALITY STANDARDS

Classes of maize

4. The classes of Maize shall be -

(a) Class White Maize;

(b) Class Yellow Maize; and

(c) Class Other Maize.

Standards for classes of maize

5. (1) A consignment of maize shall be classified as Class White Maize if -

(a) subject to the allowable deviation in respect of other colour maize kernels that apply to the different grades of white maize, it consists of maize the endosperm of which is by nature white in colour; and

(b) it complies with the standards for one of the grades of white maize set out in regulation 7.

(2) A consignment of maize shall be classified as Class Yellow Maize if -

(a) subject to the allowable deviation in respect of other colour maize kernels that apply to the different grades of yellow maize, it consists of maize the endosperm of which is by nature yellow in colour; and

(b) it complies with the standards for one of the grades of yellow maize set out in regulation 7.

(3) A consignment of maize shall be classified as Class Other Maize if the consignment does not comply with the standards for Class White Maize or Class Yellow Maize.

Grades of maize

6. (1) Maize of the Class White Maize shall be graded as WM1, WM2 or WM3.

(2) Maize of the Class Yellow Maize shall be graded as YM1, YM2 or YM3.

(3) No grades are determined for Class Other Maize.

GOVERNMENT NOTICES • GOEWERMENTSKENNISGEWINGS

DEPARTMENT OF AGRICULTURE, LAND REFORM AND RURAL DEVELOPMENT

NO. R. 4433 **1 March 2024**

AGRICULTURAL PRODUCT STANDARDS ACT, 1990 (ACT No. 119 OF 1990)

CORRECTION NOTICE: REGULATIONS RELATING TO THE GRADING, PACKING AND MARKING OF MAIZE INTENDED FOR SALE IN THE REPUBLIC OF SOUTH AFRICA

Regulations Relating to the Grading, Packing and Marking of Maize intended for Sale in the Republic of South Africa published in the Government Gazette no. 50129, under Notice. R. 4368 on 16 February 2024 is hereby supplemented as follows:

"Standards for grades and class of Maize

7. All grades and classes of Maize -

(a) shall be free from a musty, sour or other undesired odour;

(b) shall be free from animal filth, coal, glass, metal, plastic;

(c) shall be free from a substance which renders it unfit for human consumption or for processing into or utilisation thereof as food or feed;

(d) shall be free from insects;

(e) shall be free from stones which cannot pass through the 6,35 mm round-hole sieve;

(f) shall contain not more than one gram of stones, which can pass through the 6,35 mm round-hole sieve, per 10 kg;

(g) shall contain not more poisonous seeds than permitted in terms of the Foodstuffs, Cosmetics and Disinfectants Act, 1972 (Act No. 54 of 1972);

(h) shall have a moisture content of not more than 14 per cent; and

(i) shall not exceed the maximum percentage of permissible deviation as determined in the table in the Annexure for each grade.

PART II
PACKING AND MARKING REQUIREMENTS

Packing requirements

8. Maize of different classes and grades shall be packed in different containers.

Marking requirements

9. Each container or the accompanying sales document of a consignment of maize shall be marked or endorsed with -

(a) the class of the maize; and

(b) the grade, in the case of Class White Maize or Class Yellow Maize.

PART III
SAMPLING

Obtaining sample

10. (1) A sample of a consignment of maize shall -

(a) in the case of maize delivered in bags and subject to regulation 11, be obtained by sampling at least ten per cent of the bags, chosen from that consignment at random, with a bag probe: Provided that at least 25 bags in a consignment shall be sampled and where a consignment consists of less than 25 bags, all the bags in that consignment shall be sampled; and"

MRS A.T. DIDIZA, MP
MINISTER OF AGRICULTURE, LAND REFORM AND RURAL DEVELOPMENT

(b) in the case of maize delivered in bulk and subject to regulation 11, be obtained by sampling that consignment throughout the whole depth of the layer, in at least six different places, chosen at random in that bulk quantity, with a bulk sampling apparatus.

(2) The collective sample obtained in subregulation (1) (a) or (b) shall -

(a) have a total mass of at least 10 kg; and

(b) be thoroughly mixed by means of a divider before further examination.

(3) If it is suspected that the sample referred to in subregulation (1)(a) is not representative of that consignment, an additional five per cent of the remaining bags, chosen from that consignment at random, shall be emptied into a suitable bulk container and sampled in the manner contemplated in sub regulation (1)(b).

(4) A sample taken in terms of these regulations shall be deemed representative of the consignment from which it was taken.

Sampling if contents differ

11. (1) If, after an examination of the maize taken from different bags in a consignment in terms of regulation 10 (1), it appears that the contents of those bags differ substantially -

(a) the bags concerned shall be placed separately;

(b) all the bags in the consignment concerned shall be sampled in order to do such separation; and

(c) each group of bags with similar contents in that consignment shall for the purposes of these regulations be deemed to be a separate consignment.

(2) If, after the discharge of a consignment of maize in bulk has commenced, it is suspected that the consignment could be of a class or grade other than that determined by means of the initial sampling, the discharge shall immediately be stopped and the part of the consignment remaining in the bulk container, as well as the grain that is already in the collecting tray, shall be sampled anew with a bulk sampling apparatus or by catching at least 20 samples at regular intervals throughout the whole offloading period with a suitable container from the stream of grain that is flowing in bulk.

Working sample

12. A working sample shall be obtained by dividing the representative sample of the consignment according to the latest version of ICC 101/1 method.

PART IV
DETERMINATION OF OTHER SUBSTANCES

Determination of undesirable odours and harmful substances

13. A sample of a consignment of maize shall be sensorially assessed or chemically analysed in order to determine -

(a) whether it has a musty, sour, or other undesirable odour: Provided that a working sample of unscreened maize that is ground in a grain mill to a fine meal may be used for the determination concerned; and

(b) whether it contains a substance that renders the maize unfit for human consumption or for processing into or for utilisation as food or feed.

Determination of animal filth, coal, glass, insect, metal, plastic, poisonous seed, and stone content

14. A consignment of maize shall be sensorially assessed, and a sample of that consignment shall be sensorial assessed and sorted by hand in order to determine whether the sample contains animal filth, coal, glass, insects, metal, plastic, poisonous seeds, and stones.

Determination of percentage of foreign matter

15. The percentage of foreign matter in a consignment of maize shall be determined as follows:

(a) Obtain a working sample with a mass of at least 150g from the sample of the consignment.

(b) Remove all foreign matter from the working sample and determine the mass thereof.

(c) Express the mass thus determined as a percentage of the total mass of the working sample.

(d) Such percentage shall represent the percentage of foreign matter in the consignment concerned.

PART V
MAIZE KERNELS

Determination of percentage of other colour maize kernels

16. The percentage of other colour maize kernels in a consignment of maize shall be determined as follows:

(a) Obtain a working sample with a mass of at least 150g from the sample of the consignment.

(b) Remove all other colour maize kernels from the working sample and determine the mass thereof.

(c) Express the mass thus determined as a percentage of the mass of the working sample.

(d) Such percentage shall represent the percentage of other colour maize kernels in the consignment concerned.

(e) Other coloured kernels must be returned to the working sample

Determination of percentage of defective maize kernels

17. The percentage of defective maize kernels in a consignment of maize shall be determined as follows:

(a) Obtain a working sample with a mass of at least 150g from the sample of the consignment.

(b) Place the working sample on the 6, 35 mm round-hole sieve and screen the sample by moving the sieve 20 strokes to and fro, alternately away from and towards the operator of the sieve. Move the sieve, which rests on a table or other suitable smooth surface, 250 mm to 460 mm away from and towards the operator with each stroke. The prescribed 20 strokes must be completed within 20 to 30 seconds.

(c) Determine the mass of the defective maize kernels and pieces of maize kernels that has passed through the sieve and express it as a percentage of the mass of the working sample.

(d) Remove all defective maize kernels from that part of the working sample remaining on top of the sieve and express it as a percentage of the mass of the working sample.

(e) Calculate the sum of the masses determined in terms of paragraphs (c) and (d).

(f) Express the combined mass calculated in terms of paragraph (e) as a percentage of the mass of the working sample.

(g) In the case of yellow maize, the percentage obtained -

(i) in terms of paragraph (c), represents the percentage of defective maize kernels and pieces of maize kernels in the consignment concerned, which can pass through the 6,35 mm round-hole sieve; and

(ii) in terms of paragraph (d), represents the percentage of defective maize kernels and pieces of maize kernels in the consignment concerned, which cannot pass through the 6,35 mm round-hole sieve.

(h) In the case of white maize, the percentage obtained in terms of paragraph (g) represents the percentage of defective maize kernels in the consignment concerned.

PART VI
MOISTURE CONTENT

Determination of moisture content

18. The moisture content of a consignment of maize may be determined according to any suitable method: Provided that the results thus obtained are in accordance with the maximum permissible deviation (± 0,3 per cent) for a class 1 moisture meter as detailed in ISO 7700/1-1994 based on the results of the 72 hour, 103°C oven dried method (AACC Method 44/15A/1981).

OFFENCE AND PENALTIES

19. Any person who contravenes or fails to comply with any provision of these regulations shall be guilty of an offence and upon conviction be liable to a fine or imprisonment in terms of section 11 of the Act.

COMMENCEMENT

20. The regulations shall come into operation on date of publication.

REPEAL

21. Regulations published by Government Notices No, R. 473 of 8th May 2009 hereby repealed from the date of commencement of these regulations

ANNEXURE A
TABLE

STANDARDS FOR GRADES OF CLASS WHITE MAIZE AND CLASS YELLOW MAIZE

	Maximum permissible deviation					
Deviation	White maize			Yellow maize/		
	WM1	WM2	WM3	YM1	YM2	YM3
1	2	3	4	5	6	7
1. Foreign matter [regulation 15]	0,3%	0,5%	0,75%	0,3%	0,5%	0,75%
2. Other colour maize kernels [regulation 16]	3%	6%	10%	2%	5%	5%
3. Defective maize kernels, above and below the 6,35 mm round-hole sieve [regulation 17]	7%	13%	30%	*	*	*
4. Defective maize kernels that can pass through the 6,35 mm round-hole sieve [regulation 17(c)]	*	*	*	4%	10%	30%
5. Defective maize kernels that can not pass through the 6,35 mm round-hole sieve [regulation 17(e)]	*	*	*	9%	20%	30%
6. Deviations referred to in items 1, 2, 3, 4 and 5 collectively: Provided that the deviations are individually within the specified limits	8%	16%	30%	9%	20%	30%

* No specifications.