

**SAGL REPORT OF PROJECT FUNDED BY MAIZE TRUST FOR
2022– 2023 MAIZE POST STORAGE QUALITY STATUS**

PROJECT:

**MYCOTOXIN LEVELS ON POST STORAGE MAIZE
IN THE 2022-2023 PROCESSING SEASON**

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1. Summary

The recent exposure of the South African consumers to too high levels of the carcinogen aflatoxin B₁ in peanut products lead to the removal of contaminated products from the market. This unfortunate incidence emphasises again the necessity of monitoring programs to ensure food and feed safety with regards to the exposure of the consumers and animals to mycotoxin contaminated products. The past incidences similar to the peanut products happened because regular testing for mycotoxins or other toxic compounds such as dioxins in the raw materials were not done. Unfortunately, without long-term monitoring programmes of raw materials, no data exist to raise awareness of the possible contamination in the final products. As a result, regular testing of raw materials and the final processed products for contaminants such as mycotoxins is neglected.

Multi-mycotoxin analyses were conducted on maize samples collected in three cycles annually at the mills producing maize meal for the South African consumers and feed processing mills manufacturing feed for the animal industry. The mycotoxin results of 206 white and 177 yellow maize samples collected in the 2022 -2023 processing season are presented in this report.

None of the white and yellow maize samples contained aflatoxin B₁, B₂, G₁ and G₂, HT-2 toxin, T-2 toxin or ochratoxin A. Fumonisin B₁, B₂ and B₃ (FUM total) were found in 28% white maize and 25% yellow maize in 2022 -2023, compared with the 17% white and 33% yellow maize in the previous processing season. In this season 77% white maize and 69% yellow maize contained deoxynivalenol (DON). This was an increase compared to the previous season, where DON was found in 58% white maize and 64% yellow maize. 15-Acetyl deoxynivalenol (15-ADON) was found in 23% white maize and 14% yellow maize and zearalenone in 13% white maize and 9% yellow maize.

The average FUM concentration in white maize decreased from 876 µg/kg in 2016-2017 to 91 µg/kg in 2022-2023. The maximum FUM concentrations found in individual white maize samples in the last six production seasons were substantially lower than the 4000 µg/kg maximum allowable concentration (FB₁+ FB₂) specified in the SA Mycotoxin Regulation in maize intended for processing for human consumption.⁽³⁾ Compared to white maize, higher maximum FUM concentrations (2913 µg/kg in cycle 1, 8915 µg/kg in cycle 2 and 887 µg/kg in cycle 3) in the 2022-2023 season were reported in individual yellow maize samples collected at processing plants. This trend was observed in all eight seasons in individual yellow maize samples.

The average DON concentrations in white maize decreased from 957 µg/kg in 2018 -2019 to 452 µg/kg in 2021-2022 but increased to 679 µg/kg in 2022-2023. Higher DON levels were reported in more individual white maize samples this season. Approximately 9% of the white maize samples in cycle 1 and 16% in cycle 2 had DON concentrations higher than 2000 µg/kg, the maximum allowable DON concentration in maize intended for processing for human consumption specified in the SA Mycotoxin Regulation.⁽³⁾ The highest DON concentration in an individual white maize sample was 3318 µg/kg, collected in the period November 2022 – January 2023.

The average DON concentration in yellow maize (498 µg/kg) was similar compared to the previous 3 seasons. In yellow maize 6.8% of the samples collected in cycle 1 and 1.5% of the samples in cycle 2 had DON concentrations higher than 2000 µg/kg. The highest DON concentration in an individual yellow maize sample was 6403 µg/kg, collected in the period November 2022 – January 2023.

An increase in the prevalence of zearalenone (ZON) was observed over the past four seasons in both white and yellow maize. The highest average ZON concentration in yellow maize (125 µg/kg) was reported in this season because one yellow maize sample contained 844 µg/kg. This is the highest ZON concentration found in an individual maize sample since the monitoring program started in 2015-2016.

The results of this long-term monitoring (since 2015) of regulated mycotoxins in white and yellow maize at the pre-processing stage of the SA food and feed chain confirmed the seasonal variations in occurrence and concentrations of deoxynivalenol and the metabolite 15-ADON, fumonisins (B₁, B₂ and B₃) and zearalenone⁽¹⁾. The 8th annual survey results give the processing mills an insight in the mycotoxin levels of raw maize processed at food and feed processing plants in South Africa and assist them to develop sound practices to reduce the mycotoxin contamination along the value chain.

2. Layout of Report

The mycotoxin results of the white maize samples (mainly for human consumption) and the yellow maize samples (all received from feed processing mills) are summarised in Section 3 **Results and Trends**. The trends observed over the past eight processing seasons are illustrated in Section 3.

The samples received from the food and feed processing plants are summarised in Section 5 **Materials and Methods**. All the samples were analysed with the SAGL multi-mycotoxin UPLC-MS/MS method; a SANAS accredited method.⁽⁵⁾ A summary of the SAGL in-house method and validation results are reported in Section 5.

The mycotoxin results of all the individual white maize and yellow maize samples are reported in two tables in Annexure A of this report. A unique code was allocated to each of the different processing mills that submitted samples and the results are grouped according to the processing mill code. The production regions or provinces provided are included in the result tables in Annexure A.

The South African Regulations for specific mycotoxins in foodstuffs for human consumption ^(2,3) and in farm feed for animals ⁽⁴⁾ are summarised in Annexure C of this report.

3. Results and Trends

The white maize mycotoxin results are summarised in Section 3.1, Table 1 and yellow maize in Section 3.2, Table 2. Fumonisin B₁ + B₂ concentrations are reported for comparison with the maximum allowable level described for fumonisins (B₁+B₂) in the SA Regulation for human consumption ⁽³⁾.

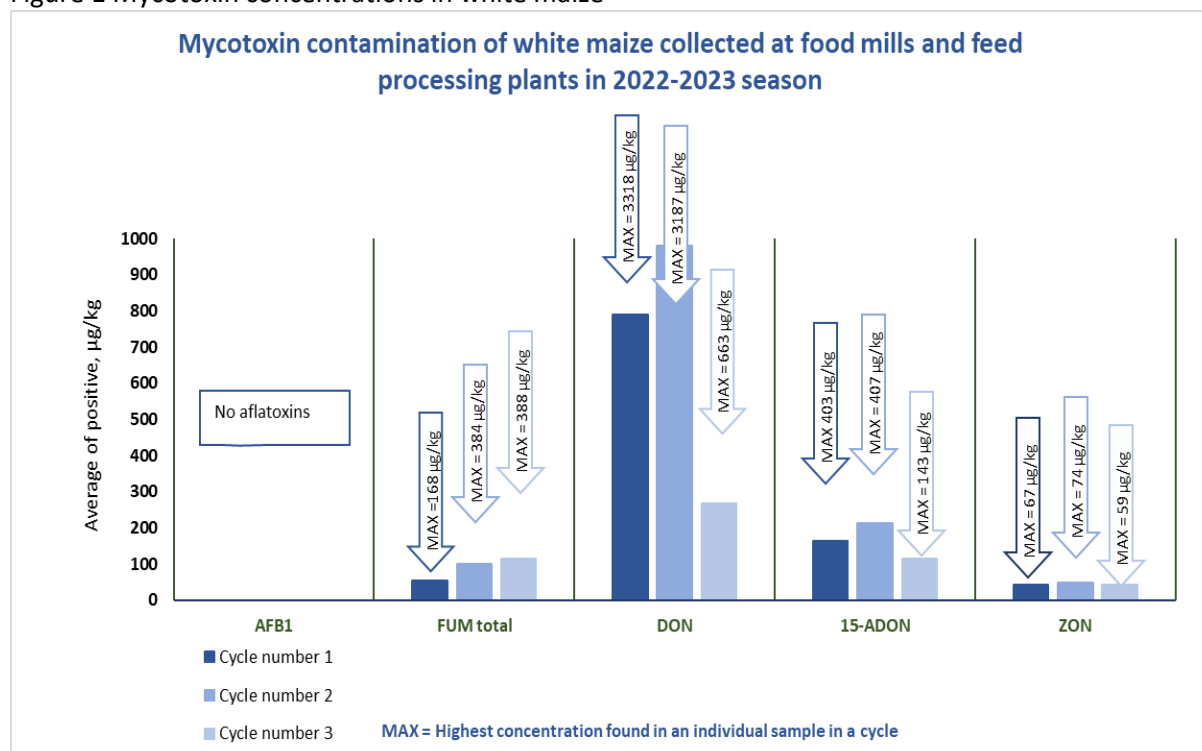
3.1 White maize - mycotoxin results and trends over eight processing seasons

White maize samples were received from all the participating food processing mills (148 samples), and 21 samples from the suppliers of maize to both a food and two feed processing mills. The feed processing mills collected 37 white maize samples. All the samples were collected from locally produced white maize (see more detail in Section 5). The number of samples per cycle and the average and maximum concentration levels of the most important mycotoxins are summarised in Table 1 and illustrated in Figure 1. The mean concentration of each mycotoxin was calculated as the average of the positive samples excluding results below the LOQs. The maximum concentrations reported in Table 1 were measured in individual samples tested in each of the three cycles.

Table 1 Mycotoxin contamination of white maize received in 2022 – 2023 for processing

| Mycotoxin | Afla B ₁ | FUM B ₁ + FUM B ₂ | FUM total | DON | 15-ADON | ZON |
|--|---------------------|---|-----------|------|---------|-----|
| Cycle number 1 (Nov 2022 -January 2023) | | | | | | |
| Total number of samples analysed | 56 | | | | | |
| number of samples positive | 0 | 12 | 12 | 56 | 25 | 12 |
| % samples positive | 0 | 21 | 21 | 100 | 45 | 21 |
| Average of positive (µg/kg) | ND | 55 | 55 | 789 | 165 | 42 |
| Maximum (µg/kg) | ND | 168 | 168 | 3318 | 403 | 67 |
| Cycle number 2 (March – April 2023) | | | | | | |
| Total number of samples analysed | 56 | | | | | |
| number of samples positive | 0 | 15 | 15 | 52 | 21 | 10 |
| % samples positive | 0 | 27 | 27 | 93 | 38 | 18 |
| Average of positive (µg/kg) | ND | 101 | 102 | 979 | 212 | 50 |
| Maximum (µg/kg) | ND | 364 | 384 | 3187 | 407 | 74 |
| Cycle number 3 (June – July 2023) | | | | | | |
| Total number of samples analysed | 94 | | | | | |
| number of samples positive | 0 | 31 | 31 | 50 | 2 | 4 |
| % samples positive | 0 | 33 | 33 | 53 | 2 | 4 |
| Average of positive (µg/kg) | ND | 114 | 116 | 268 | 116 | 43 |
| Maximum (µg/kg) | ND | 352 | 388 | 663 | 143 | 59 |

Figure 1 Mycotoxin concentrations in white maize



The following trends in FUM, DON and ZON in white maize were observed.

- **Fumonisin (total) in white maize:**

- Occurrence:
 - Only 28% of white maize samples contained fumonisins.
 - The fumonisin prevalence in the latest 2 seasons (17% and 28%), in all the collection cycles was a significant decrease compared to the previous four seasons when approximately 50% of the white maize samples contained fumonisins. This trend is illustrated in Figure 2.
- Concentrations:
 - Average concentration levels of all positive samples were low with 55 µg/kg, 102 µg/kg and 116 µg/kg in cycle 1, 2 and 3, respectively, see Figure 1.
 - Maximum concentrations found in individual samples were 168 µg/kg (cycle 1), 384 µg/kg (cycle 2) and 388 µg/kg (cycle 3) collected in the Free State, North West and Limpopo respectively.
 - The concentration ranges of the white maize with FUM in the three cycles showed no samples with FUM > 750 ug/kg. See Figure 3 for a comparison of the concentration ranges in the latest 3 seasons.
 - FUM concentrations were significantly lower in the last six seasons than the maximum allowable concentration (4000 µg/kg) specified in the SA Regulation for unprocessed maize intended for human consumption ⁽³⁾.
 - FUM above the maximum allowable concentration was only reported in individual samples in 2016-2017.

Figure 2 Fumonisin occurrence in white maize at processing plants over 24 cycles in eight processing seasons

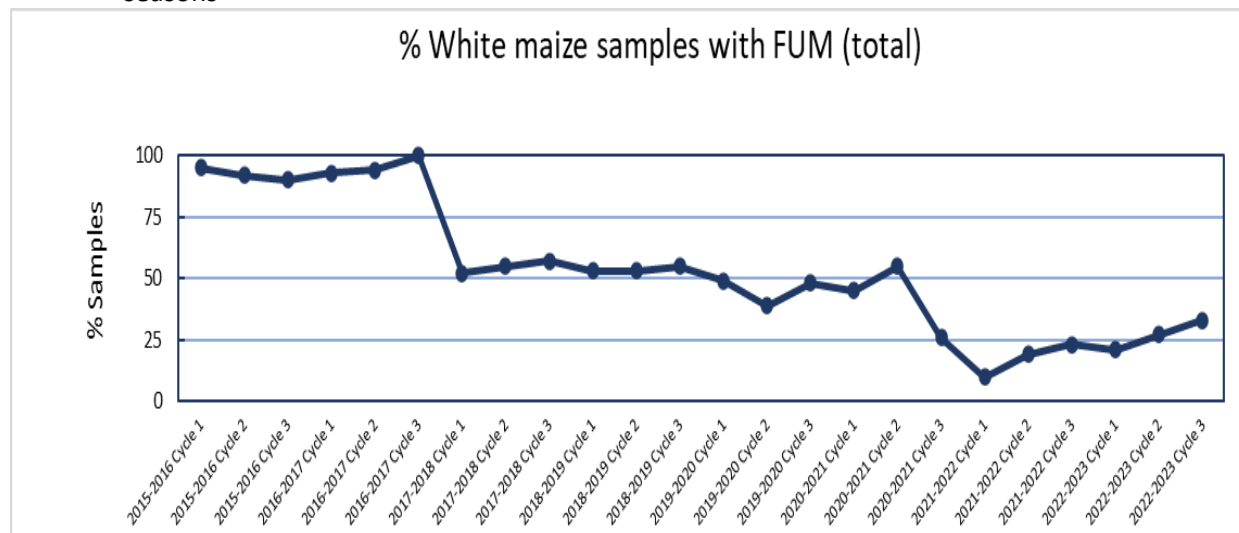
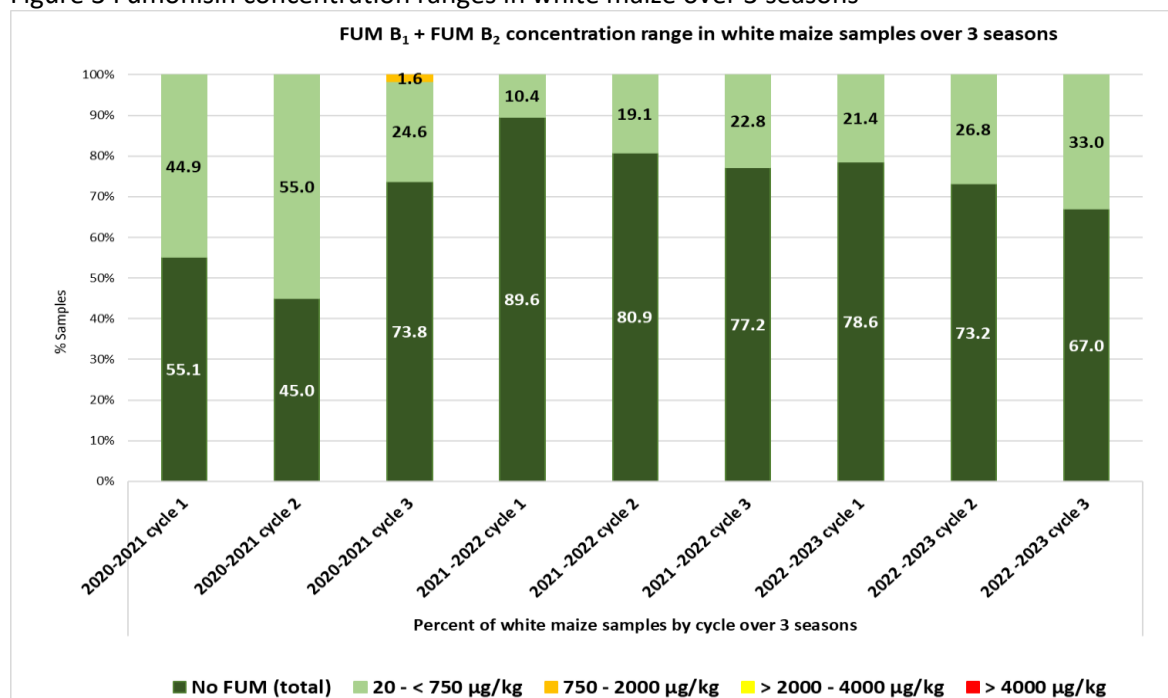


Figure 3 Fumonisin concentration ranges in white maize over 3 seasons



- **Deoxynivalenol in white maize:**

- Occurrence:
 - DON found in 100% (cycle 1), 93% (cycle 2) and 53% (cycle 3) of the samples in the 2022-2023 season. This is an increase compared to the previous season when the highest occurrence (70%) was found in cycle 1, see Figure 4.
 - DON is the most prevalent mycotoxin since 2017-2018. See Figure 4.
- Concentrations:
 - Average DON concentration levels of 789 µg/kg , 979 µg/kg and 268 µg/kg in cycle 1, 2 and 3, respectively, see Figure 1.
 - Maximum DON concentrations in individual samples were 3318 µg/kg (cycle 1), 3187 µg/kg (cycle 2) and 663 µg/kg (cycle 3).
 - Higher DON concentrations were found in individual samples collected in November 2022 to January 2023 (cycle 1) and March to April 2023 (cycle 2) compared to the 2021-2022 season.
 - 8.9% of the samples in cycle 1 and 16.1% of the samples in the second cycle had DON > 2000 µg/kg (the allowable level in SA Regulation⁽³⁾) as illustrated in Figure 5. The samples were from more than one production region.
 - 14.3% in cycle 1 and 17.9% in cycle 2 contained DON in the 1000 – 2000 ug/kg concentration range, see Figure 5.
 - A large variation in the DON concentration ranges over the last three seasons was observed as illustrated in Figure 5. Only in two cycles of the last three seasons were no white maize with concentrations > 1000 µg/kg.

Figure 4 Deoxynivalenol occurrence in white maize at processing plants over 28 cycles in eight seasons

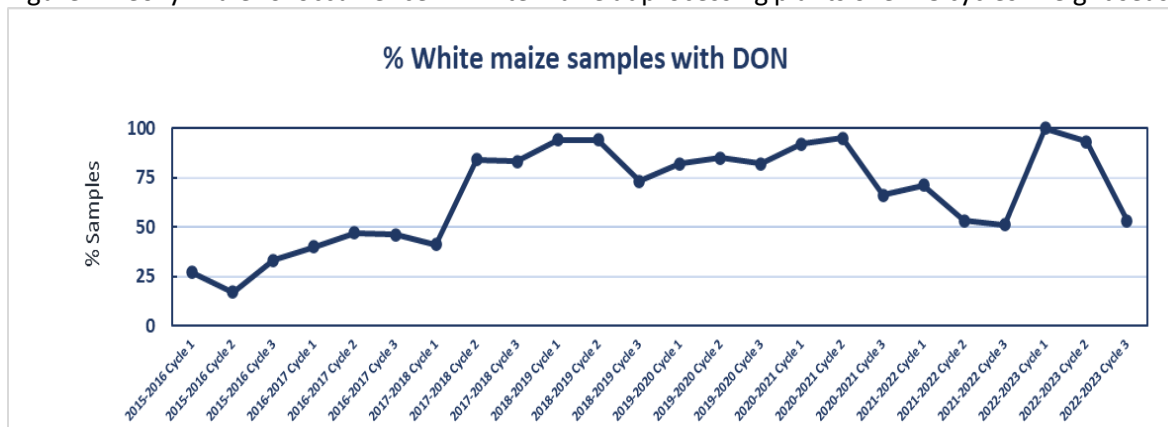
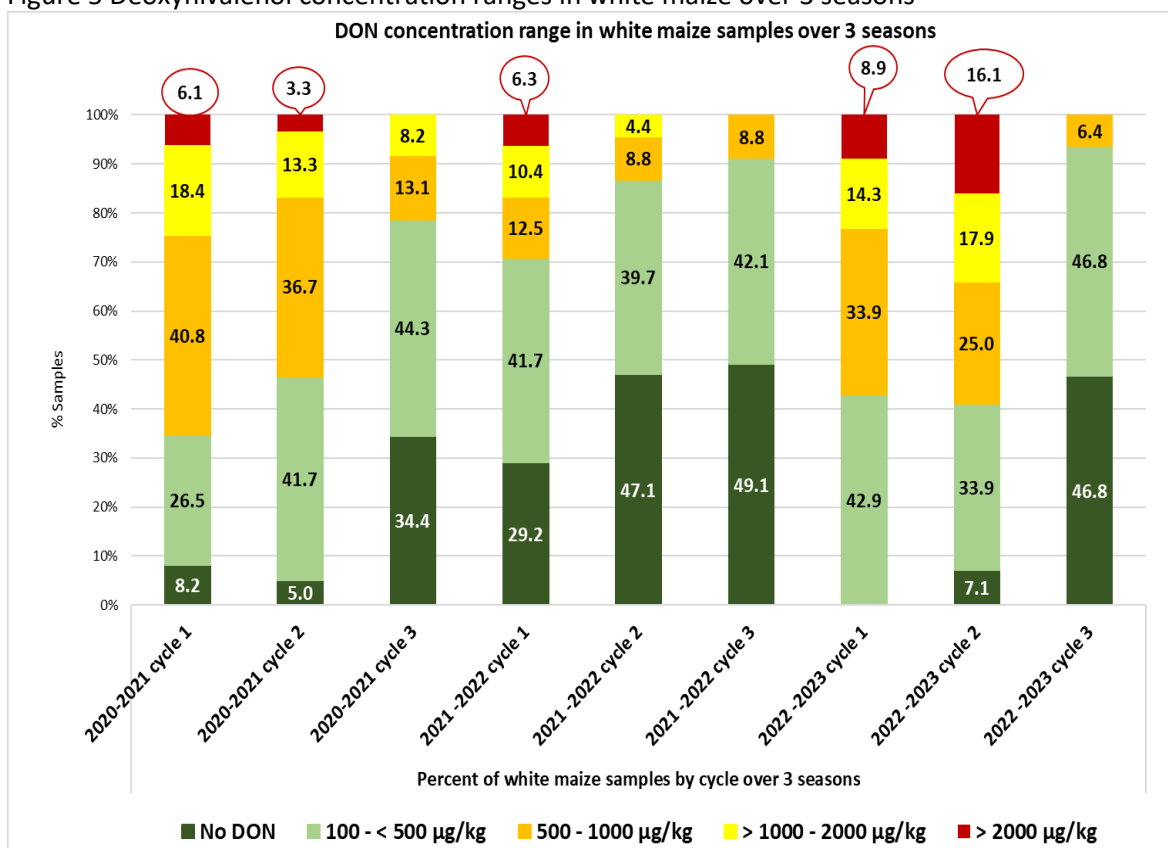


Figure 5 Deoxynivalenol concentration ranges in white maize over 3 seasons



- Zearalenone in white maize:**

- Occurrence:

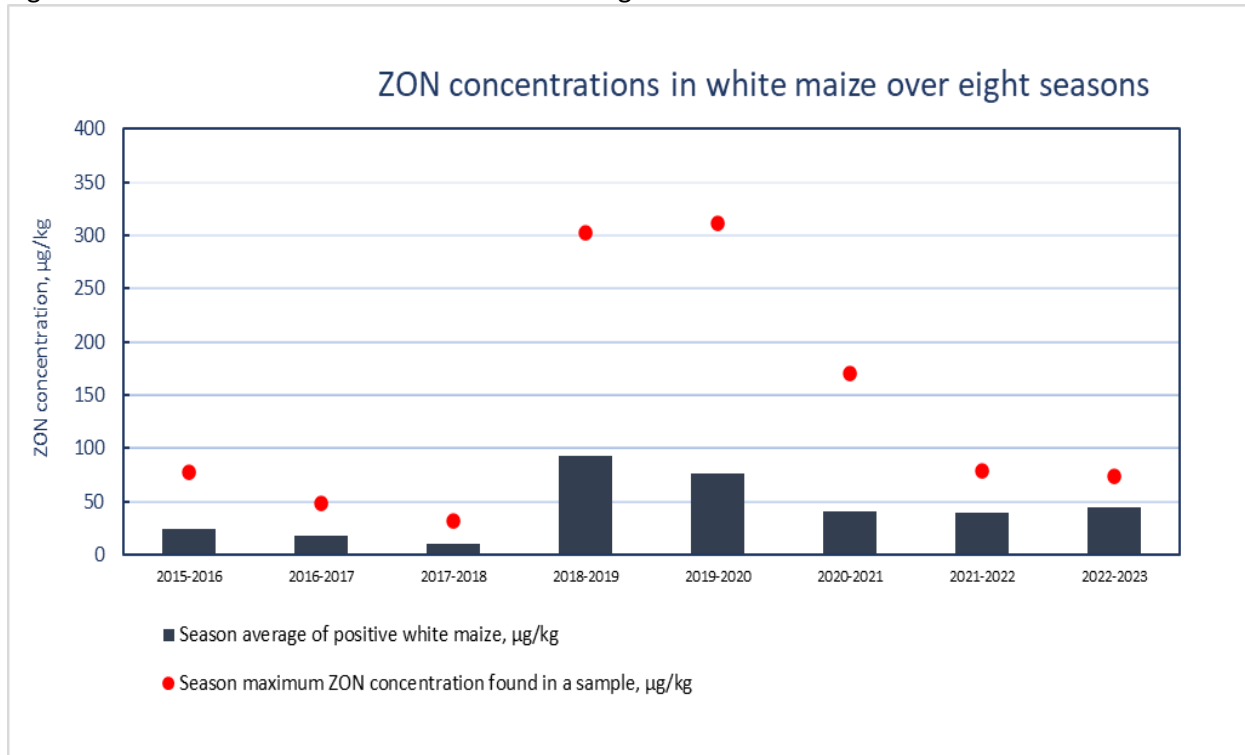
- ZON found in 26 samples this season, similar to the previous three seasons.

- Concentrations:

- Average concentration levels of all positive samples were low; 42 µg/kg, 50 µg/kg, and 43 µg/kg in cycle 1, 2 and 3, respectively.
- These averages are similar to the averages in the previous two seasons. See Figure 6.

- Maximum concentrations in individual samples were 67 µg/kg (cycle 1), 74 µg/kg (cycle 2) and 59 µg/kg (cycle 3). Collected from production regions in North West and Mpumalanga provinces.
- Maximum concentrations less than previous four seasons, see Figure 6.
- Highest ZON (311 µg/kg) in white maize of all eight seasons reported in 2019-2020, slightly less than the EU maximum guidance level of 350 µg/kg for unprocessed maize in food⁽⁶⁾.

Figure 6. Zearalenone trends in white maize over eight seasons



- **Co-occurrence of different mycotoxins in white maize:**
 - 46 samples contained both FUM and DON vs 25 samples in 2021-2022 and 50 samples in 2020-2021.
 - 26 samples were contaminated with both DON and ZON vs 24 Samples in 2021-2022 and 19 samples in 2020-2021.
 - 7 white maize samples tested positive for FUM, DON and ZON vs 6 samples the previous season.
 - The sample with the highest ZON (74 ug/kg) contained also 384 µg/kg FUM, 2179 µg/kg DON and 171 µg/kg 15-ADON.

3.2 Yellow maize - mycotoxin results and trends over eight processing seasons.

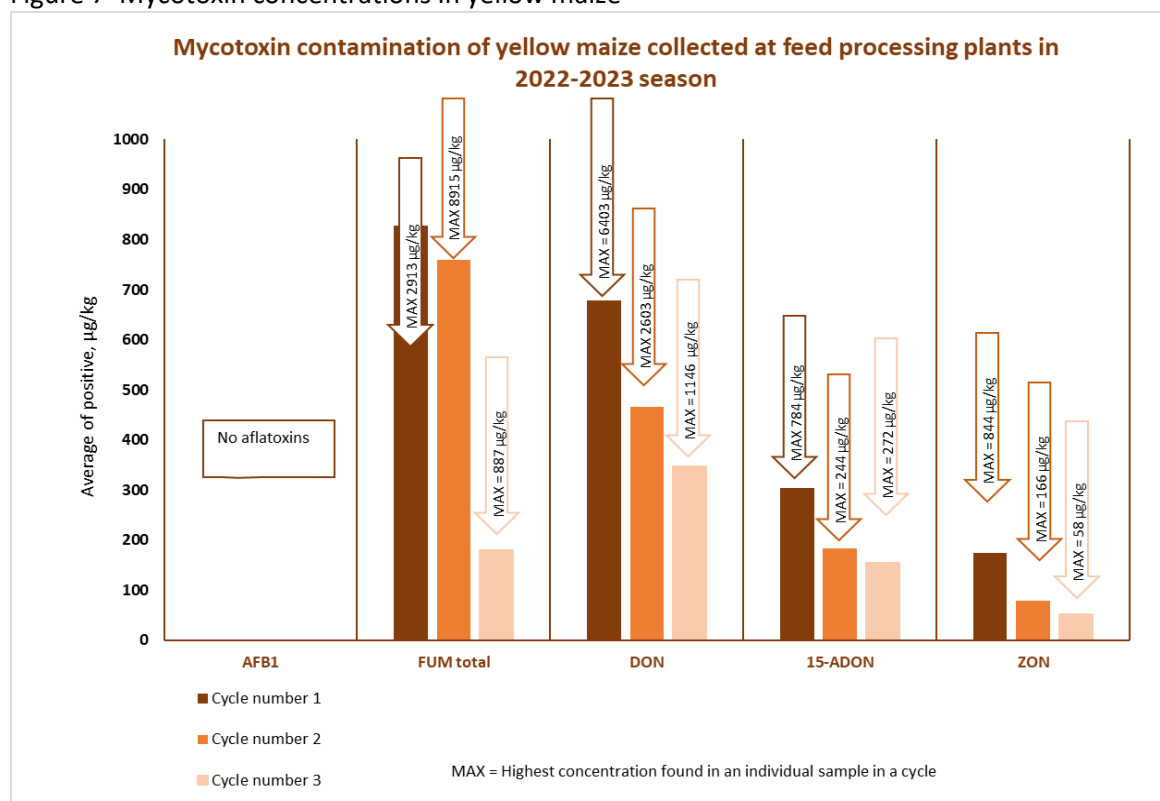
All the yellow maize samples, locally produced, were submitted by feed processing mills.

135 of the 177 yellow maize samples (76%) contained one or more mycotoxin. The results confirmed the presence of fumonisin B₁, B₂ and B₃ (FUM), deoxynivalenol (DON), 15-acetyl deoxynivalenol (15-ADON), and zearalenone (ZON) in yellow maize. The number of yellow maize samples contaminated, the averages and maximum concentrations of the different mycotoxins detected in the different sampling cycles are summarised in Table 2 and illustrated in Figure 7. The mean concentration of each mycotoxin was calculated as the average of the positive samples excluding results below the LOQs. The maximum concentrations were measured in individual samples tested in each cycle.

Table 2 Mycotoxin results of yellow maize received from feed processing samples

| Mycotoxin | Afla B ₁ | FUM B ₁ + FUM B ₂ | FUM total | DON | 15-ADON | ZON |
|--|---------------------|--|--------------|------|---------|-----|
| Cycle number 1 (Nov 2022 – January 2023) | | | | | | |
| Total number of samples analysed | 59 | | | | | |
| number of samples positive | 0 | 12 | 12 | 54 | 11 | 8 |
| % samples positive | 0 | 20 | 20 | 92 | 19 | 14 |
| Average of positive (µg/kg) | ND | 781 | 827 | 679 | 304 | 175 |
| Maximum (µg/kg) | ND | 2726 | 2913 | 6403 | 784 | 844 |
| Cycle number 2 (March - April 2023) | | | | | | |
| Total number of samples analysed | 68 | | | | | |
| number of samples positive | 0 | 23 | 23 | 43 | 8 | 4 |
| % samples positive | 0 | 34 | 34 | 63 | 12 | 6 |
| Average of positive (µg/kg) | ND | 710 | 759 | 466 | 183 | 79 |
| Maximum (µg/kg) | ND | 8293 | 8915 | 2603 | 244 | 166 |
| Cycle number 3 (June - July 2023) | | | | | | |
| Total number of samples analysed | 50 | | | | | |
| number of samples positive | 0 | 10 | 10 | 25 | 6 | 3 |
| % samples positive | 0 | 20 | 20 | 50 | 12 | 6 |
| Average of positive (µg/kg) | ND | 173 | 180 | 348 | 154 | 52 |
| Maximum (µg/kg) | ND | 844 | 887 | 1146 | 272 | 58 |

Figure 7 Mycotoxin concentrations in yellow maize



The following trends in FUM, DON and ZON in yellow maize were observed.

- **Fumonisin (Total) in yellow maize:**

- Occurrence:

- Only 20%, 34%, and 20% of samples in cycle 1, 2 and 3 respectively positive.
- Less than the prevalence reported in previous seven seasons. See trend over eight seasons illustrated in Figure 8.

- Concentrations:

- Average concentrations were 827 µg/kg, 759 µg/kg and 180 µg/kg in cycle 1, 2 and 3, respectively. The FUM averages in cycle 1 and 2 were higher than the averages reported in the six cycles of the previous two seasons.
- Highest average was reported in 2016-2017 (1730 µg/kg) and lowest average (168 µg/kg) reported in 2021-2022.
- Maximum concentrations in individual samples were 2913 µg/kg (cycle 1), 8915 µg/kg (cycle 2) and 887 µg/kg (cycle 3). The samples were from the Northern Cape (cycle 1 and 3) and Limpopo (cycle 3) provinces.
- The concentration ranges in the samples changed over the latest season. See Figure 9 for a comparison of the concentration ranges of the cycles in the most recent three seasons.
- In cycle 2 of this season 1.5% of the samples has FUM concentrations > 4000 µg/kg.
- 3.2% of the samples in this season contained FUM in the 2000 - 4000 µg/kg concentration range and 11.7 % of the samples had concentrations ranged between 750 and 2000 µg/kg.

Figure 8 Fumonisin occurrence in yellow maize at processing plants over 24 cycles in eight seasons

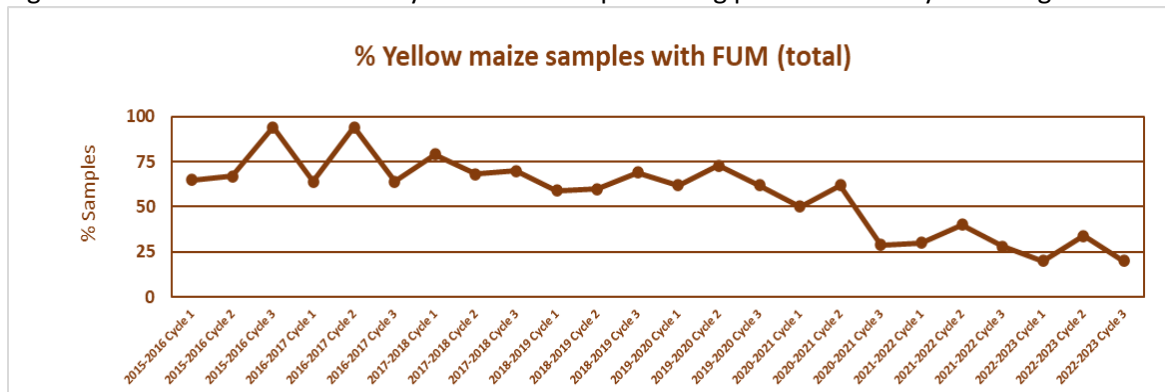
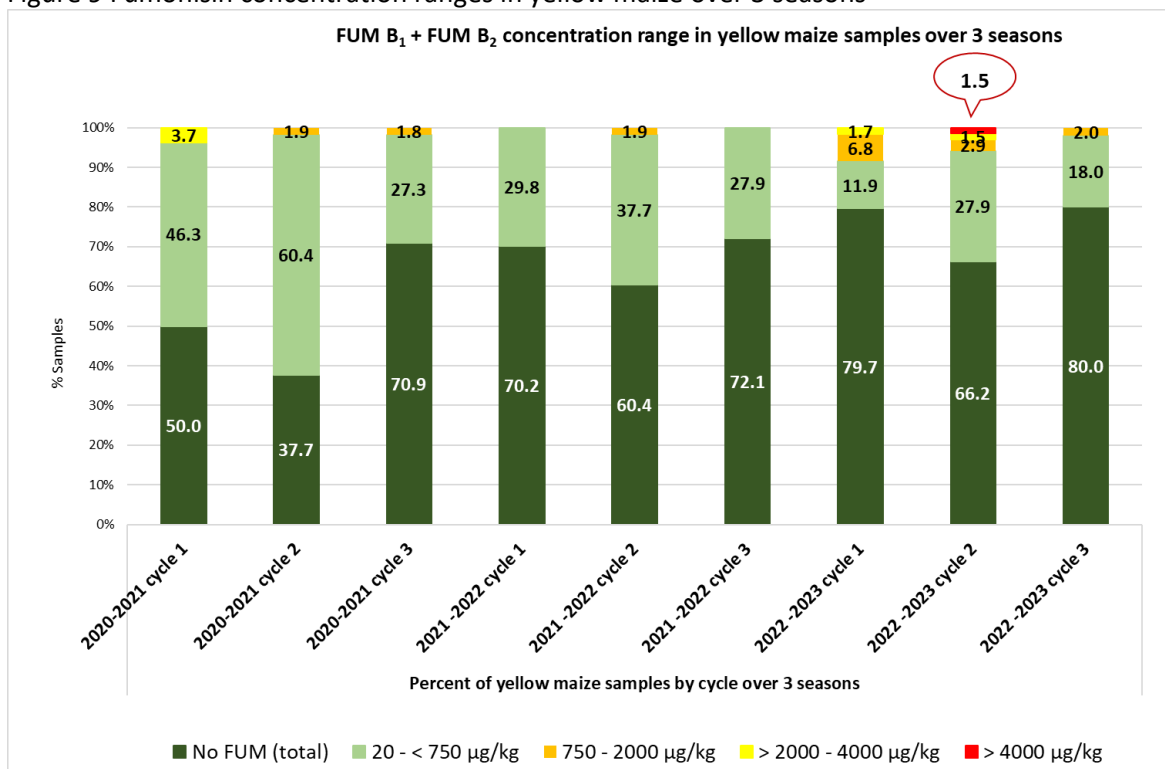


Figure 9 Fumonisin concentration ranges in yellow maize over 3 seasons



- **Deoxynivalenol in yellow maize:**

- Occurrence:

- 5th consecutive season the most prevalent mycotoxin, see Figure 10.
- DON found in 92%, 63%, and 50% of samples in cycle 1, 2 and 3 respectively.
- Prevalence increased in cycle one of this season when compared to previous seasons' cycles when DON was found in 63% (cycle 1), 62% (cycle2) and 66% (cycle 3) of the yellow maize samples.

- Concentrations:

- Average concentrations were 679 µg/kg, 466 µg/kg, and 348 µg/kg in cycle 1, 2 and 3, respectively.
- Maximum concentrations in individual samples were 6403 µg/kg (cycle 1 from Northern Cape), 2603 µg/kg (cycle 2 from Eastern Cape) and 1146 µg/kg (cycle 3 from Northern Cape). These maximum values found in cycle 1 and 2 were higher comparing to the previous season.

- The concentration ranges changed over the recent 3 seasons as illustrated in Figure 11. In cycle 1 and 2 of this season, 6.8% and 1.5% respectively had DON concentrations > 2000 µg/kg.
- 13% samples contained DON in the 1000 to 2000 µg/kg concentration range.
- The highest DON (12470 µg/kg) in all 8 seasons was found in cycle 1 of the 2018-2019 season.

Figure 10 Deoxynivalenol occurrence in yellow maize at processing plants over 24 cycles in eight seasons

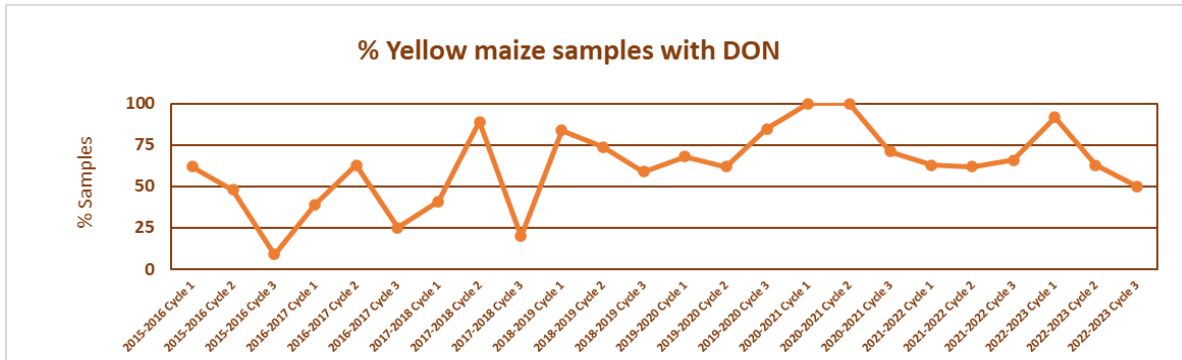
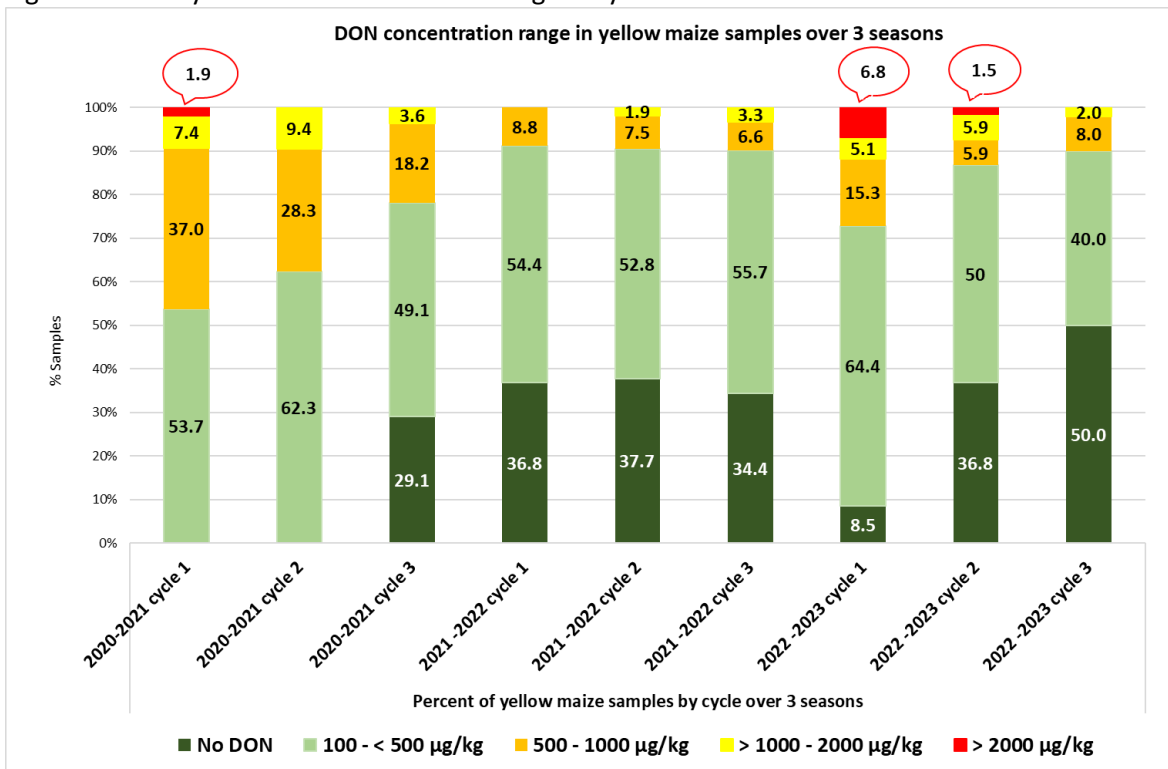


Figure 11 Deoxynivalenol concentration ranges in yellow maize over 3 seasons

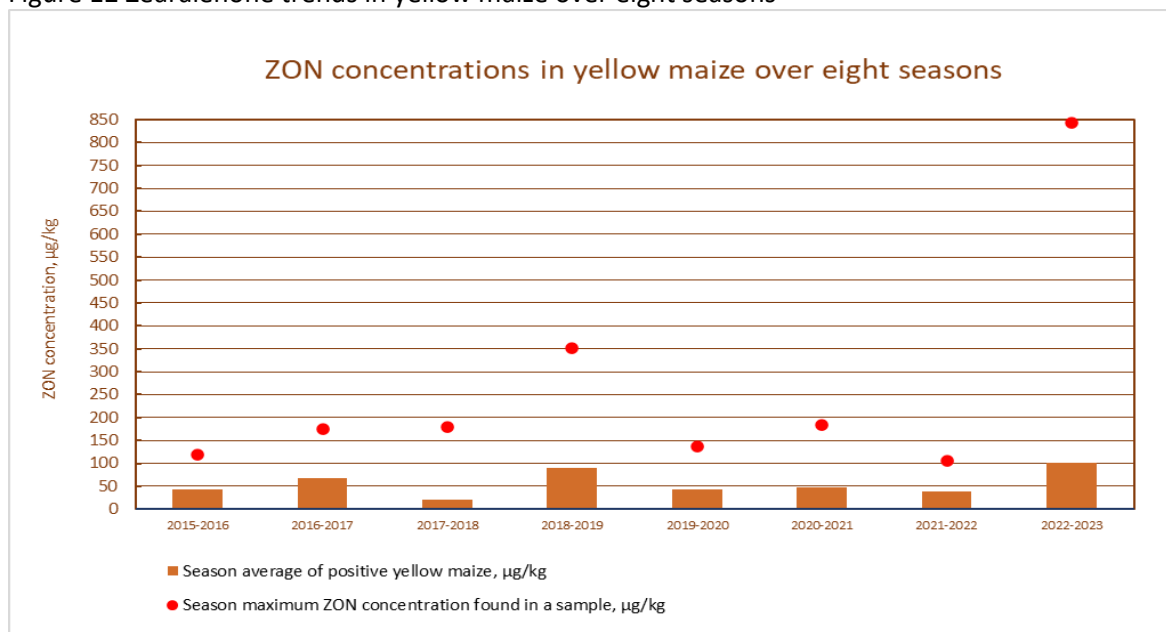


• **Zearalenone in yellow maize:**

- Occurrence:
 - ZON found this season in 15 yellow maize samples, similar to the previous season.
- Concentrations:
 - Average concentration levels of all positive samples were 175 µg/kg in cycle 1 and 79 µg/kg and 52 µg/kg in cycle 2 and 3 respectively.
 - The cycle 1 average ZON concentration in this season was significantly higher than averages reported in the previous 4 seasons.

- Maximum concentrations in individual samples were 844 µg/kg (cycle 1), 166 µg/kg (cycle 2) and 58 µg/kg (cycle 3) all from Northern Cape province.
- The highest ZON concentration (844 µg/kg) of all eight seasons was reported in a yellow maize sample in cycle 1 of this season as illustrated in Figure 12. This concentration is higher than the regulated maximum content in feeding stuffs on full ration basis for calves and dairy cattle.⁽⁴⁾ See Annexure C for summary of SA Regulations.

Figure 12 Zearalenone trends in yellow maize over eight seasons



- Co-occurrence of different mycotoxins in yellow maize:
 - 32 samples contained both FUM and DON vs 38 samples in 2021-2022.
 - 13 of the yellow maize samples tested positive for FUM, DON and ZON vs 10 samples the previous season.
 - The sample with the highest ZON concentration (844 µg/kg) in cycle 1 contained 6403 µg/kg DON, 784 µg/kg 15-ADON and 2913 µg/kg FUM (Total).

4. Recommendation

The results of this long-term monitoring project assist the food and feed processing mills to develop effective mycotoxin control strategies for the correct storage and mixing-in of contaminated maize. In view of the worldwide climate change scenario, the food and feed industry need to measure continually the mycotoxin levels of their maize stock. While in most samples the contamination levels are low, in some of the samples the contamination levels may be a health risk for the consumers of the final food and feed products. A notable increase in DON and ZON occurrence over the last five years and decrease in FUM occurrence over the same period was reported. More white and yellow maize with DON concentrations above the maximum allowable regulated value were reported in the 2022-2023 season.

The funding of the Maize Trust and the participation of the food and feed mills by collecting representative maize samples at the pre-processing stage in the value chain ensure reliable mycotoxin

data at the processing plants. The results are important to address the economic and health risks that may arise from mycotoxin contamination in agricultural crops. The Maize Trust already approved funding to conduct a similar survey on the pre-processing (post-storage) maize stock at the processing plants in 2023-2024. The food and feed processing mills are encouraged to support this opportunity to get a representative year-on-year overview.

5. Material and methods

5.1. Collection of samples

The food and feed processing mills participated by collecting maize samples for the mycotoxin analysis on a voluntarily basis in three collection periods from different consignments of maize delivered from different production or storage regions in SA. Five different food processing mills, including members of the National Chamber of Milling collected white maize. Three silos that supply maize to both food and feed processing mills collected yellow and white maize samples. Twenty one feed mills, all members of the Animal Feed Manufacturers Association (AFMA), collected mainly yellow maize samples in all three collection periods. The composite samples sent to the SAGL ranged from approximately 1 to 10 kg. One food processing mill submitted more than one sample taken on the same day from the same producer/region and composite samples were made.

383 maize samples (206 white maize and 177 yellow maize) were collected as summarised in Table 3. All the samples submitted were collected from SA produced maize.

Most of the samples came from the three main maize production provinces in South Africa, the Free State, North West and Mpumalanga. It must be noted that not all the production regions were recorded on the sample submission forms. In Annexure B is a map illustrating the crop production regions in South Africa.

Table 3. Summary of the pre-processing maize samples submitted for mycotoxin analysis

| Sample collection period | | Summary of samples collected by the processing mills | | | | | |
|--------------------------|----------------------------------|--|-----------------------------|--|-----------------------------|-----------------------|-----------------------------|
| | | Food processing mills | | Suppliers to both food and feed processing mills | | Feed processing mills | |
| Cycle number | Collection period | Number of mills | Number of samples submitted | Number of suppliers | Number of samples submitted | Number of mills | Number of samples submitted |
| 1 | November 2022- January 2023 | 3 | 39 | 3 | 13 | 18 | 63 |
| 2 | March - April 2023 | 4 | 42 | 3 | 8 | 21 | 74 |
| 3 | June - July 2023 | 4 | 67 | 2 | 17 | 18 | 60 |
| Cycle 1 , 2 and 3 | November 2022 – July 2023 | 4 | 148 | 3 | 38 | 21 | 197 |

5.2. Analytical method and quality assurance

Each sample was milled with a Mazzer mill set to the equivalent of a 1 mm sieve and mixed on a mixer for at least 90 minutes to ensure homogeneity of the sample.

All the samples were analysed with the SAGL multi-mycotoxin UPLC-MS/MS method; a SANAS accredited method ⁽⁵⁾ for the simultaneous analysis of aflatoxin B₁, G₁, B₂, G₂, fumonisin B₁, B₂, B₃ (FUM), deoxynivalenol (DON) including 15-acetyl deoxynivalenol (15-ADON), T-2 toxin, HT-2 toxin, zearalenone (ZON) and ochratoxin A (OTA).

Duplicate subsamples were extracted with the extraction solution, diluted, and analysed with the UPLC-MS/MS. The mycotoxins were separated on a reversed-phase UPLC column and analysed with positive electrospray (EI) ionisation in the multiple reaction monitoring (MRM) mode. For each compound, one precursor and two product ions were monitored, one product ion for quantification and one for confirmation.

The reference materials purchased from Biopure and Cape Town University of Technology (CPUT) were used for the preparation of separate stock solutions of each mycotoxin. Matrix-matched working standards containing a mixture of the 13 mycotoxins (See Table 4) were prepared for each batch of samples to construct a calibration curve for each mycotoxin with at least five calibration levels. A blank maize sample was analysed with every batch of samples to confirm that no contamination was present in the laboratory.

The method is an accredited method under the requirements of ISO 17025:2017 ⁽⁵⁾ and the limit of quantitation (LOQ) and limit of detection (LOD) are given in Table 4.

Table 4. Limit of quantitation and limit of detection

| Mycotoxin | Limit of quantitation, (LOQ), µg/kg | Limit of detection, (LOD), µg/kg | Concentration range, µg/kg |
|--------------------------|-------------------------------------|----------------------------------|----------------------------|
| Aflatoxin B ₁ | 5 | 2.5 | 1.25 – 80 |
| Aflatoxin B ₂ | 5 | 2.5 | 1.25 - 80 |
| Aflatoxin G ₁ | 5 | 2.5 | 1.25 - 80 |
| Aflatoxin G ₂ | 5 | 2.5 | 1.25 - 80 |
| Deoxynivalenol | 100 | 50 | 50 - 4000 |
| 15 Acetyl deoxynivalenol | 100 | 50 | 50 - 4000 |
| Fumonisin B ₁ | 20 | 10 | 10 - 4000 |
| Fumonisin B ₂ | 20 | 10 | 10 - 4000 |
| Fumonisin B ₃ | 20 | 10 | 10 - 4000 |
| Ochratoxin A | 5 | 2.5 | 1.25 - 80 |
| T-2 Toxin | 20 | 10 | 10 - 4000 |
| H-T2 toxin | 20 | 10 | 10 - 4000 |
| Zearalenone | 20 | 10 | 10 – 4000 |

General laboratory performance is verified by successful participation in the bimonthly Bipea and FAPAS international proficiency testing programs. These assessment programs provide several test samples for each mycotoxin group and commodity type.

6. References

- (1) SAGL Annual Reports for mycotoxin levels on post storage maize from 2015-2016 until 2021-2022.
- (2) SA Regulation published under Government Notice No. R. 1145, dated 8 October 2004.
- (3) SA Government Notice NO. 987 of 05 September 2016.
- (4) Amendment_No. R 70 dated 12 February 2010 of Act 36 of 1947 Fertilizers, Farm Feeds, Agricultural and Stock Remedies.
- (5) See the Section: Accreditation on the SAGL webpage www.sagl.co.za
- (6) European Commission (EC) Commission Regulation (EC) NO 1126/2007 amending Regulation No 1881/2006 setting maximum levels of certain contaminants in foodstuffs as regards Fusarium toxins in maize and maize products. *Official Journal of the European Union* **2006**, L 255, 14-17

Annexure A

MYCOTOXIN RESULTS OF WHITE MAIZE SAMPLES (POST STORAGE PRE-PROCESSING 2022- 2023)

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | C | KNX106MP | 2022-12-14 | 34 | 2023-01-10 | ND | ND | ND | ND | - | ND | ND | ND | ND | 360 | <LOQ | ND | <LOQ | ND | ND |
| 1 | D | W5366896 | Jan 2023 | 15 | 2023-01-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 986 | 106 | ND | ND | ND | ND |
| 1 | D | W5367274 | Jan 2023 | 15 | 2023-01-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 730 | <LOQ | ND | ND | ND | ND |
| 3 | D | W 5385417 | July 2023 | Free State | 2023-07-24 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | D | W 5385439 | July 2023 | Free State | 2023-07-24 | ND | ND | ND | ND | - | ND | ND | ND | ND | 107 | ND | ND | ND | ND | ND |
| 3 | D | W 5385443 | July 2023 | Free State | 2023-07-24 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | J | 698371 | 2023-06-07 | Free State | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | J | 698372 | 2023-06-20 | Free State | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | J | 698373 | 2023-07-18 | Free State | 203/08/18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 616 | 111 | ND | 27 | ND | ND |
| 3 | J | 698374 | 2023-07-28 | Free State | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | K | 697835 | 2023-03-13 | 19 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | 700 | ND | ND | ND | ND | ND |
| 2 | K | 697836 | 2023-03-15 | 19 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | 585 | <LOQ | ND | ND | ND | ND |
| 2 | K | 697837 | 2023-03-18 | 19 | 2023-05-15 | ND | ND | ND | ND | - | 269 | 95 | 20 | 384 | 2179 | 171 | ND | 74 | ND | ND |
| 2 | K | 697838 | 2023-03-19 | 19 | 2023-05-15 | ND | ND | ND | ND | - | 39 | <LOQ | ND | 39 | 654 | <LOQ | ND | ND | ND | ND |
| 3 | K | 698375 | 2023-07-20 | 19 | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | K | 698376 | 2023-07-25 | 19 | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 100 | ND | ND | ND | ND | ND |
| 3 | K | 698377 | 2023-07-28 | 19 | 2023-08-18 | ND | ND | ND | ND | - | 88 | 40 | <LOQ | 128 | <LOQ | ND | ND | ND | ND | ND |
| 3 | K | 698378 | 2023-07-30 | 19 | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | M | 681411 | 2022-12-30 | 22 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1967 | 159 | ND | <LOQ | ND | ND |
| 1 | M | 681412 | 2023-01-03 | NW | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 893 | <LOQ | ND | 40 | ND | ND |
| 1 | M | 681413 | 2023-01-05 | 17 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 3318 | 403 | ND | 21 | ND | ND |
| 1 | M | 681414 | 2023-01-09 | 21 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1069 | 104 | ND | ND | ND | ND |
| 2 | M | 6978316 | 2023-03-13 | 21 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | 473 | ND | ND | ND | ND | ND |
| 3 | M | 6983713 | 2023-07-17 | Free State | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 593 | <LOQ | ND | ND | ND | ND |
| 3 | M | 6983714 | 2023-07-20 | Free State | 2023-08-18 | ND | ND | ND | ND | - | 67 | 24 | 0 | 91 | ND | ND | ND | ND | ND | ND |
| 3 | M | 6983715 | 2023-07-24 | Free State | 2023-08-18 | ND | ND | ND | ND | - | 176 | 46 | <LOQ | 222 | 191 | ND | ND | ND | ND | ND |
| 3 | M | 6983716 | 2023-07-20 | Free State | 2023-08-18 | ND | ND | ND | ND | - | 29 | ND | ND | 29 | 119 | ND | ND | ND | ND | ND |
| 3 | P | 1307543 | 2023-06-20 | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | 118 | 43 | ND | 161 | 202 | ND | ND | ND | ND | ND |
| 1 | Q | 1268526 | 2023-01-24 | 17 | 2023-01-26 | ND | ND | ND | ND | - | 40 | <LOQ | ND | 40 | 2054 | 181 | ND | 63 | ND | ND |
| 1 | Q | 1268534 | 2023-01-24 | 17 | 2023-01-26 | ND | ND | ND | ND | - | 45 | <LOQ | ND | 45 | 2022 | 206 | ND | 67 | ND | ND |
| 2 | Q | 1281034 | 2023-03-14 | 16 | 2023-03-17 | ND | ND | ND | ND | - | 65 | 22 | ND | 87 | 3071 | 274 | ND | 51 | ND | ND |
| 2 | Q | 128671 | 2023-03-14 | 16 | 2023-03-17 | ND | ND | ND | ND | - | 47 | 21 | ND | 68 | 2615 | 344 | ND | 70 | ND | ND |
| 3 | Q | 1307679 | 2023-06-21 | North West | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | Q | 1307914 | 2023-06-21 | North West | 2023-06-23 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 1 | R | 1271465 | Dec 2022 | 15 | 2023-02-10 | ND | ND | ND | ND | - | ND | 24 | ND | 24 | 2118 | 249 | ND | ND | ND | ND |
| 2 | R | 1290452 | April 2023 | 14 | 2023-04-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 3187 | 322 | ND | 50 | ND | ND |
| 2 | R | 1290453 | April 2023 | 10 | 2023-04-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 2237 | 325 | ND | 46 | ND | ND |
| 1 | V | 99/07/01 | 2023-01-07 | 21 | 2023-02-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 356 | <LOQ | ND | ND | ND | ND |
| 1 | V | 124/01/23 | 2023-01-10 | 21 | 2023-02-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 319 | ND | ND | ND | ND | ND |
| 1 | V | 171/19/12 | 2022-12-09 | 22 | 2023-02-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 315 | 176 | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | | |
|--------------------|--------------------|------------------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|----|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 | |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 | |
| 1 | V | 216/12/22 | 2022-12-13 | 22 | 2023-02-03 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | 131 | ND | ND | ND | ND | ND | ND |
| 1 | W | KR1, KR10, KR12 & KR24 | 2022-11-23-24 | Free State | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 415 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR2 | 2022-11-23 | 22 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 352 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR3, KR11, KR28 & 31 | 2022-11-23-28 | Free State | 2022-12-07 | ND | ND | ND | ND | - | 22 | ND | ND | 22 | 1120 | 194 | ND | ND | ND | ND | ND |
| 1 | W | KR4, KR16, & KR21 | 2022-11-23-24 | 16 | 2022-12-07 | ND | ND | ND | ND | - | <LOQ | ND | ND | ND | 811 | 144 | ND | ND | ND | ND | ND |
| 1 | W | KR5 & KR18 | 2022-11-23 | 18 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 641 | 139 | ND | ND | ND | ND | ND |
| 1 | W | KR6 | 2022-11-23 | 24 | 2022-12-07 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | 639 | 103 | ND | ND | ND | ND | ND |
| 1 | W | KR7 | 2022-11-23 | Free State | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 564 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR8 & KR13 | 2022-11-23 | 21 | 2022-12-07 | ND | ND | ND | ND | - | 58 | <LOQ | ND | 58 | 344 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR14 & KR37 | 2022-11-23-29 | Free State | 2022-12-07 | ND | ND | ND | ND | - | 87 | 25 | ND | 112 | 1048 | 156 | ND | ND | ND | ND | ND |
| 1 | W | KR9 | 2022-11-23 | 22 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 849 | 128 | ND | ND | ND | ND | ND |
| 1 | W | KR17, KR19 & KR20 | 2022-11-23-24 | Free State | 2022-12-07 | ND | ND | ND | ND | - | 28 | <LOQ | ND | 28 | 341 | ND | ND | ND | ND | ND | ND |
| 1 | W | KR29, KR39, KR46 & 36 | 2022-11-28-29 | Free State | 2022-12-07 | ND | ND | ND | ND | - | 35 | <LOQ | ND | 35 | 728 | 155 | ND | <LOQ | ND | ND | ND |
| 1 | W | KR15 | 2022-11-23 | Free State | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 2684 | 339 | ND | 37 | ND | ND | ND |
| 1 | W | KR22 | 2022-11-24 | Free State | 2022-12-01 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | 359 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR 23 | 2022-11-24 | Free State | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 431 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR25 | 2022-11-24 | Free State | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 318 | ND | ND | ND | ND | ND | ND |
| 1 | W | KR26 | 2022-11-28 | 21 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 491 | <LOQ | ND | <LOQ | ND | ND | ND |
| 1 | W | KR27 | 2022/1128 | 24 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 466 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR30 & KR32 | 2022-11-28 | 18 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 739 | 127 | ND | ND | ND | ND | ND |
| 1 | W | KR 33 & KR 49 | 2022-11-28-30 | 16 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 372 | <LOQ | ND | ND | ND | ND | ND |
| 1 | W | KR34 & KR44 | 2022-11-29-30 | 21 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 213 | ND | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|--------------------------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | W | KR35, KR40, KR45 & KR50 | 2022-11-29-30 | Free State | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1055 | 137 | ND | ND | ND | ND |
| 1 | W | KR38 & KR41 | 2022-11-29-30 | 24 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 300 | ND | ND | ND | ND | ND |
| 1 | W | KR42 & KR43 | 2022-11-30 | 22 | 2022-12-07 | ND | ND | ND | ND | - | ND | ND | ND | ND | 199 | ND | ND | ND | ND | ND |
| 1 | W | KR 47 & KR 48 | 2022-11-30 | Free State | 2022-12-07 | ND | ND | ND | ND | - | 130 | 38 | ND | 168 | 276 | ND | ND | ND | ND | ND |
| 2 | W | KR7 + KR46 | 2023/04/17-21 | Free State | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 327 | ND | ND | ND | ND | ND |
| 2 | W | KR18 + KR29 + KR36 | 2023/04/19-20 | Free State | 2023-05-03 | ND | ND | ND | ND | - | 44 | <LOQ | ND | 44 | 583 | ND | ND | ND | ND | ND |
| 2 | W | KR38 | 2023-04-20 | 22 | 2023-05-03 | ND | ND | ND | ND | - | 88 | 29 | ND | 117 | 108 | ND | ND | ND | ND | ND |
| 2 | W | KR 26 + KR28+ KR44 | 2023/04/19-21 | 16 | 2023-05-03 | ND | ND | ND | ND | - | 57 | <LOQ | ND | 57 | 1328 | 164 | ND | ND | ND | ND |
| 2 | W | KR49 | 2023-04-21 | Free State | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1607 | 157 | ND | ND | ND | ND |
| 2 | W | KR 14 + KR24 + KR41 | 2023-04-18-20 | 17 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1102 | 112 | ND | ND | ND | ND |
| 2 | W | KR10 | 2023-04-17 | 21 | 2023-05-03 | ND | ND | ND | ND | - | 23 | ND | ND | 23 | ND | ND | ND | ND | ND | ND |
| 2 | W | KR37 + KR47 + KR50 | 2023-04-20-21 | Free State | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 311 | ND | ND | ND | ND | ND |
| 2 | W | KR45 | 2023-04-21 | 16 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 881 | <LOQ | ND | ND | ND | ND |
| 2 | W | KR20 + KR27 | 2023-04-19-20 | Free State | 2023-05-03 | ND | ND | ND | ND | - | 24 | ND | ND | 24 | 237 | ND | ND | ND | ND | ND |
| 2 | W | KR15 + KR17 +KR30 | 2023-04-18-20 | 21 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 791 | <LOQ | ND | ND | ND | ND |
| 2 | W | KR5 + KR6 + KR8 + KR9 | 2023-04-17 | 21 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 473 | <LOQ | ND | ND | ND | ND |
| 2 | W | KR23 + KR43 + KR48 | 2023-04-19-21 | 21 | 2023-05-03 | ND | ND | ND | ND | - | 32 | ND | ND | 32 | 830 | <LOQ | ND | ND | ND | ND |
| 2 | W | KR11 + KR21 + KR35 | 2023-04-17-20 | Free State | 2023/05/2023 | ND | ND | ND | ND | - | 195 | 40 | ND | 235 | ND | ND | ND | ND | ND | ND |
| 2 | W | KR12 + KR25 + KR34 | 2023-04-17-20 | Free State | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 333 | ND | ND | ND | ND | ND |
| 2 | W | KR31 + KR33 + KR4 + KR3 + KR19 | 2023-04-17-20 | 22 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 267 | ND | ND | ND | ND | ND |
| 2 | W | KR1 + KR2 + KR16 + KR39 + KR42 | 2023-04-17-20 | 24 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 213 | ND | ND | ND | ND | ND |
| 2 | W | KR13 + KR22 + KR40 + KR32 | 2023-04-17-20 | 22 | 2023-05-03 | ND | ND | ND | ND | - | ND | ND | ND | ND | 268 | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | | |
|--------------------|--------------------|----------------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|----|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 | |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 | |
| 3 | W | KR 4 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 125 | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 6 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 7 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 482 | <LOQ | ND | ND | ND | ND | ND |
| 3 | W | KR 8 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 11 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 13 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 129 | 44 | ND | 173 | 290 | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 15 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 49 | 23 | ND | 72 | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 17 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 18 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 264 | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 22 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 28 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 218 | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 29 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 30 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 31 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 62 | 23 | ND | 85 | 234 | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 32 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | <LOQ | 0 | ND | ND | 294 | <LOQ | ND | ND | ND | ND | ND |
| 3 | W | KR 40 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 41 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 55 | <LOQ | ND | 55 | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 45 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 25 | <LOQ | ND | 25 | 201 | <LOQ | ND | ND | ND | ND | ND |
| 3 | W | KR 46 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 50 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 25 | ND | ND | 25 | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 20+ KR 27 + KR 43 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 189 | 63 | <LOQ | 252 | 152 | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 3 +KR 37 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|---------------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 3 | W | KR 10 + KR 44 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 28 | <LOQ | ND | 28 | 139 | ND | ND | ND | ND | ND |
| 3 | W | KR 16 + KR 48 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 107 | ND | ND | ND | ND | ND |
| 3 | W | KR 14 + KR 47 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 57 | <LOQ | ND | 57 | 115 | ND | ND | ND | ND | ND |
| 3 | W | KR 12 + KR34 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 130 | 35 | ND | 165 | 295 | ND | ND | ND | ND | ND |
| 3 | W | KR 19 + KR 49 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | W | KR 9 + KR24 + KR 38 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 26 + KR 36 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 88 | 39 | ND | 127 | 142 | ND | ND | ND | ND | ND |
| 3 | W | KR 1 + KR 39 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 124 | <LOQ | ND | ND | ND | ND |
| 3 | W | KR21 + KR 35 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | W | KR 25 + KR 33 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 242 | 70 | 23 | 335 | 472 | <LOQ | ND | ND | ND | ND |
| 3 | W | KR 5 + KR42 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 60 | 25 | ND | 85 | 663 | <LOQ | ND | ND | ND | ND |
| 3 | W | KR 2 + KR 23 | NS | Free State | 2023-07-18 | ND | ND | ND | ND | - | 170 | 82 | <LOQ | 252 | 168 | ND | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 18 | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1411 | 198 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | Mpumalanga | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1334 | 204 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 33 | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 950 | 159 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 20 | 2023-05-08 | ND | ND | ND | ND | - | 56 | <LOQ | ND | 56 | 535 | <LOQ | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 21 | 2023-05-08 | ND | ND | ND | ND | - | 22 | ND | ND | 22 | 2188 | 222 | ND | 23 | ND | ND |
| 2 | X | NS | March - April 2023 | 17 | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1515 | 150 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 13 | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 2152 | 308 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 34 | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1619 | 154 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | 34 | 2023-05-08 | ND | ND | ND | ND | - | 38 | 20 | ND | 58 | 1609 | 180 | ND | ND | ND | ND |
| 2 | X | NS | March - April 2023 | North West | 2023-05-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 2135 | 205 | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|----|----|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 | | |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 | | |
| 3 | X | NS | June 2023 | 21 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 180 | ND | ND | ND | ND | ND | ND | |
| 3 | X | NS | June 2023 | 34 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | June 2023 | North West | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | July 2023 | 20 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | July 2023 | 18 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | July 2023 | 18 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 119 | ND | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | June 2023 | 20 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 244 | ND | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | June 2023 | North West | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 517 | <LOQ | ND | <LOQ | ND | ND | ND | ND |
| 3 | X | NS | July 2023 | 13 | 2023-08-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 480 | 143 | ND | ND | ND | ND | ND | ND |
| 3 | X | NS | July 2023 | 18 | 2023/0/02 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | 2022-12-14 | 17 | 2022-12-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 508 | 100 | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | NS | 17 | 2022-12-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1097 | 156 | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | NS | 18 | 2022-12-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 138 | ND | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | 2022-12-14 | 18 | 2022-12-21 | ND | ND | ND | ND | - | 40 | <LOQ | ND | 40 | 622 | 114 | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | 2022-12-14 | 18 | 2022-12-21 | ND | ND | ND | ND | - | 43 | <LOQ | ND | 43 | 606 | 126 | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | 2022-12-14 | 19 | 2022-12-21 | ND | ND | ND | ND | - | 41 | ND | ND | 41 | 307 | <LOQ | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | 2022-12-14 | 18 | 2022-12-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 185 | ND | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | NS | 21 | 21/12/2022 | ND | ND | ND | ND | - | ND | ND | ND | ND | 604 | 116 | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | NS | 18 | 2022-12-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 118 | ND | ND | ND | ND | ND | ND | ND |
| 1 | Y | NS | 2022-12-14 | 34 | 2022-12-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 360 | <LOQ | ND | <LOQ | ND | ND | ND | ND |
| 2 | Y | NS | NS | 21 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 142 | <LOQ | ND | ND | ND | ND | ND | ND |
| 2 | Y | NS | NS | 13 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 158 | <LOQ | ND | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 2 | Y | NS | NS | 34 | 2023/03,/31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 355 | <LOQ | ND | ND | ND | ND |
| 2 | Y | NS | NS | 18 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | Y | NS | NS | 20 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 632 | 123 | ND | ND | ND | ND |
| 2 | Y | NS | NS | 24 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 127 | ND | ND | ND | ND | ND |
| 2 | Y | NS | 2023-03-16 | 21 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 306 | <LOQ | ND | ND | ND | ND |
| 2 | Y | NS | 2023-03-10 | 18 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | Y | NS | 2023-03-17 | 19 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 392 | <LOQ | ND | ND | ND | ND |
| 2 | Y | NS | 2023-03-15 | 34 | 2023-03-31 | ND | ND | ND | ND | - | ND | ND | ND | ND | 839 | 146 | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-15 | 18 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-15 | North West | 2023-06-23 | ND | ND | ND | ND | - | 107 | <LOQ | ND | 107 | ND | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-10 | 20 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 134 | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-15 | 19 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-13 | 18 | 2023-06-23 | ND | ND | ND | ND | - | 63 | <LOQ | <LOQ | 63 | ND | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-18 | 19 | 2023-06-23 | ND | ND | ND | ND | - | 33 | ND | ND | 33 | ND | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-10 | 20 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 305 | <LOQ | ND | <LOQ | ND | ND |
| 3 | Y | NS | 2023-06-13 | 15 | 2023-06-23 | ND | ND | ND | ND | - | 35 | ND | ND | 35 | 341 | <LOQ | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-13 | 24 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | ,LOQ | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-10 | 21 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-13 | 18 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 199 | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-12 | 13 | 2023-06-23 | ND | ND | ND | ND | - | 110 | 35 | <LOQ | 145 | 148 | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-15 | 18 | 2023-06-23 | ND | ND | ND | ND | - | 70 | <LOQ | ND | 70 | <LOQ | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-10 | 21 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 170 | <LOQ | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-----------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 3 | Y | NS | 2023-06-10 | 18 | 2023-06-23 | ND | ND | ND | ND | - | 132 | 38 | <LOQ | 170 | <LOQ | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-13 | 16 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 518 | <LOQ | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-13 | 22 | 2023-06-23 | ND | ND | ND | ND | - | <LOQ | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-13 | 16 | 2023-06-23 | ND | ND | ND | ND | - | 60 | ND | ND | 60 | 103 | <LOQ | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-15 | 19 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | Y | NS | 2023-06-10 | 24 | 2023-06-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | Z | V001 | March 2023 | 35 | 2023-04-26 | ND | ND | ND | ND | - | ND | ND | ND | ND | 501 | ND | ND | ND | ND | ND |
| 2 | Z | V002 | March 2023 | 35 | 2023/04/26 | ND | ND | ND | ND | - | 231 | 55 | ND | 286 | 281 | <LOQ | ND | ND | ND | ND |
| 2 | Z | V003 | April 2023 | Mpumalanga | 2023-04-26 | ND | ND | ND | ND | - | ND | ND | ND | ND | 175 | ND | ND | ND | ND | ND |
| 2 | Z | V004 | April 2023 | 35 | 2023-04-26 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | 1181 | <LOQ | ND | ND | ND | ND |
| 3 | Z | LYD-JUN-23 | June 2023 | Mpumalanga | 2023-08-08 | ND | ND | ND | ND | - | 47 | 22 | ND | 69 | 559 | ND | ND | <LOQ | ND | ND |
| 3 | Z | LTT-JUL-23 | July 2023 | 35 | 2023-08-08 | ND | ND | ND | ND | - | 259 | 93 | 36 | 388 | 415 | ND | ND | <LOQ | ND | ND |
| 3 | Z | MOK-JUL-23 | July 2023 | 35 | 2023-08-08 | ND | ND | ND | ND | - | 56 | <LOQ | <LOQ | 56 | 189 | ND | ND | ND | ND | ND |
| 1 | ZA | 412NO-BIN2 | Nov 2022 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 956 | <LOQ | ND | 47 | ND | ND |
| 1 | ZA | 412NOV-BIN4 | Nov 2022 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1197 | <LOQ | ND | 54 | ND | ND |
| 1 | ZA | 412 NOV-BIN12 | Nov 2022 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 882 | 118 | ND | 22 | ND | ND |
| 2 | ZA | 412 MRT-BIN 2 | March 2023 | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | 382 | <LOQ | ND | 22 | ND | ND |
| 2 | ZA | 412 MRT-BIN 12 | March 2023 | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | 781 | 137 | ND | ND | ND | ND |
| 3 | ZA | 412 June BIN 1 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | 24 | ND | ND | 24 | 229 | ND | ND | 51 | ND | ND |
| 3 | ZA | 412 June BIN 10 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | 154 | ND | ND | <LOQ | ND | ND |
| 3 | ZA | 412 June BIN 12 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | 109 | ND | ND | ND | ND | ND |
| 1 | ZB | BIN2-29/11 | 2022-11-29 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 882 | <LOQ | ND | 44 | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|------------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | ZB | BIN11-29/11 | 2022-11-29 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 808 | <LOQ | ND | 29 | ND | ND |
| 1 | ZB | BIN13-29/11 | 2022-11-29 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 761 | <LOQ | ND | 43 | ND | ND |
| 2 | ZB | BIN 2 | March 2023 | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1046 | <LOQ | ND | 70 | ND | ND |
| 2 | ZB | BIN 13 | March 2023 | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | 653 | <LOQ | ND | 49 | ND | ND |
| 3 | ZB | BIN 2 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 254 | ND | ND | 33 | ND | ND |
| 3 | ZB | BIN 8 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 328 | ND | ND | ND | ND | ND |
| 3 | ZB | BIN 10 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 355 | ND | ND | <LOQ | ND | ND |
| 3 | ZB | BIN 11 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 374 | ND | ND | ND | ND | ND |
| 3 | ZB | BIN 13 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 150 | ND | ND | ND | ND | ND |
| 3 | ZB | BIN 14 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 432 | <LOQ | ND | 59 | ND | ND |
| 1 | ZC | 414 NOV-BUNKER 2 | Nov 2022 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1745 | 187 | ND | 39 | ND | ND |
| 2 | ZC | BUNKER 2 | NS | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | 2157 | 407 | ND | 40 | ND | ND |

NS = Information not supplied.

ND = Not detected. <LOQ = Less than limit of quantitation. See Table 4.

MYCOTOXIN RESULTS OF YELLOW MAIZE SAMPLES (POST STORAGE PRE-PROCESSING 2022 – 2023)

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | A | B3686240 | 2023-01-04 | 26 | 2023-01-30 | ND | ND | ND | ND | - | ND | ND | ND | ND | 319 | ND | ND | ND | ND | ND |
| 1 | A | B3687746 | Jan 2023 | 25 | 2023-01-30 | ND | ND | ND | ND | - | ND | ND | ND | ND | 236 | ND | ND | ND | ND | ND |
| 1 | A | B3684095 | 2022-11-29 | 26 | 2023-01-30 | ND | ND | ND | ND | - | ND | ND | ND | ND | 296 | ND | ND | ND | ND | ND |
| 1 | A | B3685899 | 2022-12-28 | 25 | 2023-01-30 | ND | ND | ND | ND | - | ND | ND | ND | ND | 185 | ND | ND | ND | ND | ND |
| 2 | A | BET 38075 | 2023-04-17 | 26 | 2023-04-26 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | A | BET 3691778 | 2023-03-16 | 26 | 2023-04-26 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | A | BET 38446 | 2023-04-21 | 26 | 2023-04-26 | ND | ND | ND | ND | - | ND | ND | ND | ND | 172 | ND | ND | ND | ND | ND |
| 2 | A | B 3692409 | 2023-03-23 | 25 | 2023-04-26 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | A | B3693729 | June 2023 | Free State | 2023-08-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | A | B3698611 | July 2023 | Free State | 2023-08-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 1 | B | E2914325 | Nov 2022 | Mpumalanga | 2022-11-28 | ND | ND | ND | ND | - | ND | ND | ND | ND | 150 | ND | ND | ND | ND | ND |
| 1 | B | E2914326 | Nov 2022 | Mpumalanga | 2022-11-28 | ND | ND | ND | ND | - | 73 | 25 | ND | 98 | 360 | ND | ND | ND | ND | ND |
| 1 | B | E2914327 | Nov 2022 | Mpumalanga | 2022-11-28 | ND | ND | ND | ND | - | ND | ND | ND | ND | 111 | ND | ND | ND | ND | ND |
| 1 | B | E2914334 | Nov 2022 | Mpumalanga | 2022-11-28 | ND | ND | ND | ND | - | ND | ND | ND | ND | 155 | ND | ND | ND | ND | ND |
| 2 | B | E2927910 | 2023-03-13 | Mpumalanga | 2023-03-15 | ND | ND | ND | ND | - | 45 | <LOQ | ND | 45 | 351 | <LOQ | ND | 31 | ND | ND |
| 2 | B | E2927907 | 2023-03-13 | Mpumalanga | 2023-03-15 | ND | ND | ND | ND | - | 32 | <LOQ | ND | 32 | 336 | ND | ND | ND | ND | ND |
| 2 | B | E2927908 | 2023-03-13 | Mpumalanga | 2023-03-15 | ND | ND | ND | ND | - | 65 | <LOQ | ND | 65 | 307 | ND | ND | ND | ND | ND |
| 2 | B | E2927909 | 2023-03-13 | Mpumalanga | 2023-03-15 | ND | ND | ND | ND | - | 72 | 25 | ND | 97 | 542 | <LOQ | ND | ND | ND | ND |
| 3 | B | E 2941284 | NS | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | 223 | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | | |
|--------------------|--------------------|--------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|----|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 | |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 | |
| 3 | B | E 2941303 | NS | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | B | E 2941375 | NS | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | B | E 2941302 | NS | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 1 | C | HVH370FS | 2022-12-20 | 34 | 2023-01-10 | ND | ND | ND | ND | - | 26 | ND | ND | 26 | 204 | ND | ND | ND | ND | ND | ND |
| 1 | C | JSX223MP | 2022-12-22 | 32 | 2023-01-10 | ND | ND | ND | ND | - | ND | ND | ND | ND | 192 | ND | ND | ND | ND | ND | ND |
| 1 | C | HNF271MP | 2023-01-06 | 32 | 2023-01-10 | ND | ND | ND | ND | - | ND | ND | ND | ND | 291 | ND | ND | ND | ND | ND | ND |
| 2 | C | ISA 00873553 | 2023-03-01 | 34 | 2023-03-09 | ND | ND | ND | ND | - | ND | ND | ND | ND | 168 | ND | ND | ND | ND | ND | ND |
| 2 | C | ISA 0087279 | 2023-03-01 | 35 | 2023-03-09 | ND | ND | ND | ND | - | 144 | 56 | ND | 200 | ND | ND | ND | ND | ND | ND | ND |
| 2 | C | ISA 0088617 | 2023-03-07 | Free State | 2023-03-09 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | C | ISA 0088619 | 2023-03-07 | 34 | 2023-03-09 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | 399 | <LOQ | ND | ND | ND | ND | ND |
| 3 | C | ISA 0106339 | 2023-06-15 | Free State | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | C | ISA 0104528 | 2023-06-06 | North West | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | C | ISA 0106158 | 2023-06-14 | 34 | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | 124 | ND | ND | ND | ND | ND | ND |
| 3 | C | ISA 0106901 | 2023-06-19 | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 1 | D | W5366976 | Jan 2023 | 3 | 2023-01-23 | ND | ND | ND | ND | - | 117 | 28 | ND | 145 | 4162 | 458 | ND | 112 | ND | ND | ND |
| 1 | D | W5366979 | Jan 2023 | 10 | 2023-01-23 | ND | ND | ND | ND | - | 2199 | 527 | 187 | 2913 | 6403 | 784 | ND | 844 | ND | ND | ND |
| 2 | D | W 5375660 | April 2023 | Free State | 2023-04-18 | ND | ND | ND | ND | - | 243 | 73 | 26 | 342 | ND | ND | ND | ND | ND | ND | ND |
| 2 | D | W 5375661 | April 2023 | Free State | 2023-04-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 2 | D | W 5375675 | April 2023 | 24 | 2023-04-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | <LOQ | ND | ND | ND | ND | ND |
| 2 | D | W 5375676 | April 2023 | 24 | 2023-04-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | D | W 5385300 | July 2023 | Northern Cape | 2023-07-24 | ND | ND | ND | ND | - | 296 | 69 | 23 | 388 | 1146 | 153 | ND | 58 | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|--------------------|------------------------|---------------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | E | 26126 | Nov 2022 | 8 | 2022-12-01 | ND | ND | ND | ND | - | 709 | 218 | 52 | 979 | 1949 | 305 | ND | 58 | ND | ND |
| 1 | E | 26128 | Nov 2022 | 8 | 2022-12-01 | ND | ND | ND | ND | - | 1075 | 280 | 81 | 1436 | 2801 | 329 | ND | 129 | ND | ND |
| 1 | E | 26129 | Nov 2022 | 8 | 2022-12-01 | ND | ND | ND | ND | - | 1319 | 394 | 113 | 1826 | 2089 | 242 | ND | 117 | ND | ND |
| 1 | E | 26130 | Nov 2022 | 8 | 2022-12-01 | ND | ND | ND | ND | - | 242 | 85 | ND | 327 | 617 | ND | ND | 30 | ND | ND |
| 1 | E | 0029211 | 2023-02-03 | NS | 2023-02-09 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 1 | E | 0029217 | 2023-02-03 | NS | 2023-02-09 | ND | ND | ND | ND | - | ND | ND | ND | ND | 191 | ND | ND | ND | ND | ND |
| 1 | E | 0029219 | 2023-02-02 | NS | 2023-02-09 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 1 | E | 0029303 | 2023-02-06 | NS | 2023-02-09 | ND | ND | ND | ND | - | ND | ND | ND | ND | 220 | 220 | ND | ND | ND | ND |
| 2 | E | PAT 0031287 | 2023-03-16 | 8 | 2023-04-11 | ND | ND | ND | ND | - | 64 | 24 | ND | 88 | ND | ND | ND | ND | ND | ND |
| 2 | E | PAT 0032318 Silo 3 | 2023-04-03 | 8 | 2023-04-11 | ND | ND | ND | ND | - | 96 | 31 | ND | 127 | 2603 | 244 | ND | 89 | ND | ND |
| 2 | E | PAT 0032479 Silo 3 | 2023-04-05 | Eastern Cape & Free State | 2023-04-11 | ND | ND | ND | ND | - | 123 | 27 | ND | 150 | ND | ND | ND | ND | ND | ND |
| 2 | E | PAT 0031289 | 2023-03-16 | Free State | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | E | 0038838 | 2023-07-24 | 8 | 2023-07-27 | ND | ND | ND | ND | - | 61 | 22 | ND | 83 | 150 | ND | ND | ND | ND | ND |
| 3 | E | 0038465 | 2023-07-20 | 8 | 2023-07-27 | ND | ND | ND | ND | - | 69 | 20 | ND | 89 | 697 | 172 | ND | 44 | ND | ND |
| 3 | E | 0038366 | 2023-07-19 | 8 | 2023-07-27 | ND | ND | ND | ND | - | 50 | ND | ND | 50 | 995 | 272 | ND | <LOQ | ND | ND |
| 1 | F | N 1630450 | 2023-02-16 | 36 | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 146 | <LOQ | ND | ND | ND | ND |
| 1 | F | N 1630451 | 2023-02-16 | 36 | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 200 | ND | ND | ND | ND | ND |
| 1 | F | N 1630452 | 2023-02-16 | 36 | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 213 | <LOQ | ND | ND | ND | ND |
| 2 | F | N1641427 | April 2023 | 36 | 2023-05-12 | ND | ND | ND | ND | - | 31 | ND | ND | 31 | 244 | ND | ND | ND | ND | ND |
| 2 | F | N1641428 | April 2023 | 36 | 2023-05-12 | ND | ND | ND | ND | - | ND | ND | ND | ND | 251 | ND | ND | ND | ND | ND |
| 3 | F | N1653039 | July 2023 | 36 | 2023-08-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 264 | 102 | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|----|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 | |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 | |
| 3 | F | N1653040 | July 2023 | 36 | 2023-08-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 147 | ND | ND | ND | ND | ND | ND |
| 3 | F | N1653041 | July 2023 | 36 | 2023-08-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 141 | ND | ND | ND | ND | ND | ND |
| 3 | F | N1653042 | July 2023 | 36 | 2023-08-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | 267 | ND | ND | ND | ND | ND | ND |
| 1 | G | 68230119014 | 2023-01-19 | 33 | 2023-03-23 | ND | ND | ND | ND | - | 1071 | 322 | 81 | 1474 | <LOQ | ND | ND | ND | ND | ND | ND |
| 1 | G | 68230127029 | 2023-01-23 | 33 | 2023-03-23 | ND | ND | ND | ND | - | 352 | 97 | 43 | 492 | ND | ND | ND | ND | ND | ND | ND |
| 2 | G | 68230414031 | 2023-04-14 | 35 | 2023-05-17 | ND | ND | ND | ND | - | 2484 | 684 | 288 | 3456 | 138 | ND | ND | ND | ND | ND | ND |
| 2 | G | 68230504032 | 2023-05-04 | 35 | 2023-05-17 | ND | ND | ND | ND | - | 6381 | 1912 | 622 | 8915 | ND | ND | ND | ND | ND | ND | ND |
| 1 | H | E 4011 | NS | 8 | 2023-03-01 | ND | ND | ND | ND | - | ND | ND | ND | ND | 881 | <LOQ | ND | 73 | ND | ND | ND |
| 2 | H | E00 | 2023-04-13 | Free State | 2023-05-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | 426 | ND | ND | ND | ND | ND | ND |
| 2 | H | E01 | 2023-05-08 | Free State | 2023-05-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | 272 | ND | ND | ND | ND | ND | ND |
| 2 | I | MIELIE 1 | MARCH-APRIL 2023 | 11 | 2023-03-29 | ND | ND | ND | ND | - | 535 | 166 | 55 | 756 | 935 | 177 | ND | 31 | ND | ND | ND |
| 2 | I | MIELIE 2 | MARCH-APRIL 2023 | 11 | 2023-03-29 | ND | ND | ND | ND | - | 68 | 20 | ND | 88 | 1144 | 205 | ND | 166 | ND | ND | ND |
| 1 | J | 681419 | Nov 22-Jan 23 | 25 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 155 | ND | ND | ND | ND | ND | ND |
| 1 | J | 6814110 | Nov 22-Jan 23 | 24 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 727 | 127 | ND | <LOQ | ND | ND | ND |
| 1 | J | 6814111 | Nov 22-Jan 23 | 25 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 940 | 100 | ND | ND | ND | ND | ND |
| 1 | J | 6814112 | Nov 22-Jan 23 | 25 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 268 | ND | ND | ND | ND | ND | ND |
| 2 | J | 697831 | 2023-03-29 | 24 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1075 | <LOQ | ND | ND | ND | ND | ND |
| 2 | J | 697832 | 2023-03-03 | 24 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | 367 | ND | ND | ND | ND | ND | ND |
| 2 | J | 697833 | 2023-04-11 | Free state | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | J | '697834 | 2023-04-24 | 24 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 1 | K | 681415 | 2023-01-16 | 19 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 487 | <LOQ | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | K | 681416 | 2023-01-19 | 19 | 2023-03-20 | ND | ND | ND | ND | - | 38 | 24 | ND | 62 | 774 | <LOQ | ND | <LOQ | ND | ND |
| 1 | K | 681417 | 2023-01-24 | 19 | 2023-03-20 | ND | ND | ND | ND | - | 106 | 44 | <LOQ | 150 | 1891 | 276 | ND | ND | ND | ND |
| 1 | K | 681418 | 2023-01-25 | 19 | 2023-03-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 846 | 118 | ND | ND | ND | ND |
| 2 | L | 697839 | 2023-03-16 | 35 | 2023-05-15 | ND | ND | ND | ND | - | 724 | 202 | 67 | 993 | <LOQ | ND | ND | ND | ND | ND |
| 2 | L | 6978310 | 2023-03-17 | 35 | 2023-05-15 | ND | ND | ND | ND | - | 954 | 264 | 72 | 1290 | <LOQ | ND | ND | ND | ND | ND |
| 2 | L | 6978311 | 2023-03-17 | 33 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | L | 6978312 | 2023-03-22 | 35 | 2023-05-15 | ND | ND | ND | ND | - | 170 | 44 | <LOQ | 214 | ND | ND | ND | ND | ND | ND |
| 3 | L | 698379 | 2023-07-07 | 35 | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 581 | 120 | ND | ND | ND | ND |
| 3 | L | 6983710 | 2023-07-07 | 35 | 2023-08-18 | ND | ND | ND | ND | - | <LOQ | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | L | 6983711 | 2023-07-07 | Mpumalanga | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | L | 6983712 | 2023-07-11 | 35 | 2023-08-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 2 | M | 6978313 | 2023-03-16 | 21 | 2023-05-15 | ND | ND | ND | ND | - | 184 | 61 | <LOQ | 245 | 1598 | 215 | ND | ND | ND | ND |
| 2 | M | 6978314 | 2023-03-17 | 21 | 2023-05-15 | ND | ND | ND | ND | - | 76 | 27 | ND | 103 | 120 | ND | ND | ND | ND | ND |
| 2 | M | 6978315 | 2023-03-28 | 17 | 2023-05-15 | ND | ND | ND | ND | - | ND | ND | ND | ND | 650 | <LOQ | ND | ND | ND | ND |
| 1 | N | TEL 648911 | 2023-02-10 | NS | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 133 | <LOQ | ND | ND | ND | ND |
| 1 | N | TEL 649115 | 2023-02-13 | NS | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 1 | N | TEL 649142 | 2023-02-13 | NS | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 213 | ND | ND | ND | ND | ND |
| 1 | N | TEL 649160 | 2023-02-13 | NS | 2023-02-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 142 | ND | ND | ND | ND | ND |
| 2 | N | TEL664154 | May 2023 | 27 | 2023-06-02 | ND | ND | ND | ND | - | 42 | ND | ND | 42 | 106 | ND | ND | ND | ND | ND |
| 2 | N | TEL663896 | May 2023 | 27 | 2023-06-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | N | TEL663967 | May 2023 | 27 | 2023-06-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | | |
|--------------------|--------------------|-----------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|----|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 | |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 | |
| 2 | N | TEL664405 | May 2023 | 28 | 2023-06-02 | ND | ND | ND | ND | - | 96 | 22 | ND | 118 | 125 | ND | ND | ND | ND | ND | ND |
| 2 | N | TEL664166 | May 2023 | 28 | 2023-06-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | N | TEL 671455 | 2023-07-12 | Free State | 2023-07-17 | ND | ND | ND | ND | - | 46 | ND | ND | 46 | 201 | ND | ND | ND | ND | ND | ND |
| 3 | N | TEL 666113 | 2023-06-08 | 28 | 2023-07-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | N | TEL 665974 | 2023-07-06 | 27 | 2023-07-17 | ND | ND | ND | ND | - | 20 | ND | ND | 20 | ND | ND | ND | ND | ND | ND | ND |
| 3 | N | TEL 665697 | 2023-06-06 | Free State | 2023-07-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | N | TEL 666971 | 2023-06-14 | Free State | 2023-07-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | N | TEL 665652 | 2023-06-06 | Free State | 2023-07-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | 112 | ND | ND | ND | ND | ND | ND |
| 2 | O | 2.1 | NS | Free State | 2023-04-14 | ND | ND | ND | ND | - | 44 | <LOQ | ND | 44 | 113 | ND | ND | ND | ND | ND | ND |
| 2 | O | 2.2 | NS | Free State | 2023-04-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 491 | 119 | ND | ND | ND | ND | ND |
| 2 | O | 2.3 | NS | Free State | 2023-04-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 161 | ND | ND | ND | ND | ND | ND |
| 2 | O | 2.4 | NS | Free State | 2023-04-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | O | 2.5 | NS | Free State | 2023-04-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 2 | O | 2.6 | NS | Free State | 2023-04-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 557 | 154 | ND | ND | ND | ND | ND |
| 3 | O | TV 0723-MMP-C3A | NS | NS | 2023-08-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | O | TV 0723-MMP-C3B | NS | NS | 2023-08-08 | ND | ND | ND | ND | - | 57 | <LOQ | ND | 57 | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | O | TV 0723-MMP-C3C | NS | NS | 2023-08-08 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND | ND |
| 3 | O | TV 0723-MMP-C3D | NS | NS | 2023-08-08 | ND | ND | ND | ND | - | 44 | <LOQ | ND | 44 | <LOQ | ND | ND | ND | ND | ND | ND |
| 1 | P | 1263347 | 2023-01-05 | 25 | 2023-01-10 | ND | ND | ND | ND | - | ND | ND | ND | ND | 273 | ND | ND | ND | ND | ND | ND |
| 1 | P | 1263348 | 2023-01-05 | 36 | 2023-01-10 | ND | ND | ND | ND | - | ND | ND | ND | ND | 211 | ND | ND | ND | ND | ND | ND |
| 2 | P | 1283790 | 2023-03-21 | 36 | 2023-03-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 307 | ND | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 2 | P | 1283791 | 2023-03-21 | 28 | 2023-03-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 466 | 126 | ND | ND | ND | ND |
| 3 | P | 1307532 | 2023-06-20 | Mpumalanga | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 1 | R | 1271466 | Jan 2023 | 11 | 2023-02-10 | ND | ND | ND | ND | - | <LOQ | ND | ND | <LOQ | 1298 | 389 | ND | 37 | ND | ND |
| 3 | R | 1316860 | June 2023 | Free State | 2023-08-01 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | R | 1316861 | June 2023 | Northern Cape | 2023-08-01 | ND | ND | ND | ND | - | 644 | 200 | 43 | 887 | 395 | ND | ND | 53 | ND | ND |
| 1 | S | QP036848 | 2022-11-28 | 28 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 427 | ND | ND | ND | ND | ND |
| 1 | S | QP036854 | 2022-11-28 | 27 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 204 | ND | ND | ND | ND | ND |
| 1 | S | QP037910 | 2022-12-29 | 28 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 345 | ND | ND | ND | ND | ND |
| 1 | S | QP037537 | 2022-12-15 | 27 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 276 | ND | ND | ND | ND | ND |
| 1 | S | QP038295 | 2023-01-12 | 28 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 242 | ND | ND | ND | ND | ND |
| 2 | S | QP 041432 | March - April 2023 | 26 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 389 | ND | ND | ND | ND | ND |
| 2 | S | QP 041435 | March - April 2023 | 26 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 421 | ND | ND | ND | ND | ND |
| 2 | S | QP 041260 | March - April 2023 | 26 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 380 | ND | ND | ND | ND | ND |
| 2 | S | QP 039899 | March - April 2023 | 26 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 491 | <LOQ | ND | ND | ND | ND |
| 2 | S | QP 039900 | March - April 2023 | 26 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 180 | ND | ND | ND | ND | ND |
| 3 | S | QP 043735 | June - July 2023 | Free State | 2023-07-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | S | QP 044077 | June - July 2023 | Free State | 2023-07-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 292 | ND | ND | ND | ND | ND |
| 3 | S | QP 043727 | June - July 2023 | Free State | 2023-07-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 1 | T | Nov-22 | NS | 28 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 441 | <LOQ | ND | ND | ND | ND |
| 1 | T | Dec-22 | NS | 28 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 218 | ND | ND | ND | ND | ND |
| 1 | T | Jan-23 | NS | 28 | 2023-01-18 | ND | ND | ND | ND | - | ND | ND | ND | ND | 237 | ND | ND | ND | ND | ND |

| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|-----------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | | | | | | |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 1 | T | MYCOTOXIN 595 | 2023-02-20 | 28 | 2023-02-21 | ND | ND | ND | ND | - | ND | ND | ND | ND | 445 | <LOQ | ND | ND | ND | ND |
| 2 | T | March 1 | NS | 28 | 2023-03-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 423 | <LOQ | ND | ND | ND | ND |
| 2 | T | March 2 | NS | 28 | 2023-03-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 461 | <LOQ | ND | ND | ND | ND |
| 2 | T | March 3 | NS | 28 | 2023-03-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 463 | ND | ND | ND | ND | ND |
| 2 | T | April 1 | NS | 28 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 145 | ND | ND | ND | ND | ND |
| 2 | T | April 2 | NS | 28 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 216 | ND | ND | ND | ND | ND |
| 2 | T | April 3 | NS | 28 | 2023-05-02 | ND | ND | ND | ND | - | ND | ND | ND | ND | 184 | ND | ND | ND | ND | ND |
| 3 | T | JUNE | June 2023 | 28 | 2023-06-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 105 | ND | ND | ND | ND | ND |
| 3 | T | NS | NS | 28 | 2023-07-20 | ND | ND | ND | ND | - | ND | ND | ND | ND | 149 | ND | ND | ND | ND | ND |
| 1 | U | C1-SAMPLE 1 | Nov 2022-Jan 2023 | NS | 2023-02-06 | ND | ND | ND | ND | - | ND | ND | ND | ND | 375 | <LOQ | ND | ND | ND | ND |
| 1 | U | C1-SAMPLE 2 | Nov 2022-Jan 2023 | NS | 2023-02-06 | ND | ND | ND | ND | - | ND | ND | ND | ND | 524 | ND | ND | ND | ND | ND |
| 2 | U | C2-SAMPLE3 | March-April 2023 | NS | 2023-05-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 391 | ND | ND | ND | ND | ND |
| 2 | U | C2-SAMPLE4 | March-April 2023 | NS | 2023-05-23 | ND | ND | ND | ND | - | ND | ND | ND | ND | 216 | ND | ND | ND | ND | ND |
| 3 | U | C3- SAMPLE 5 | June - July 2023 | Free State | 2023-07-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | 273 | ND | ND | ND | ND | ND |
| 3 | U | C3-SAMPLE6 | June - July 2023 | Free State | 2023-07-17 | ND | ND | ND | ND | - | ND | ND | ND | ND | 233 | <LOQ | ND | ND | ND | ND |
| 1 | ZA | 412NO-BIN1 | Nov 2022 | 30 | 14/12/2022 | ND | ND | ND | ND | - | ND | ND | ND | ND | 278 | ND | ND | ND | ND | ND |
| 1 | ZA | 412 NOV-BIN11 | Nov 2022 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 142 | ND | ND | ND | ND | ND |
| 2 | ZA | 412 MRT-BIN 11 | March 2023 | 30 | 2023-04-11 | ND | ND | ND | ND | - | 22 | ND | ND | 22 | 145 | ND | ND | ND | ND | ND |
| 3 | ZA | 412 June BIN 3 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | ND | ND | ND | ND | ND | ND |
| 3 | ZA | 412 June BIN 4 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |
| 3 | ZA | 412 June BIN 11 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | 114 | 22 | ND | 136 | 429 | ND | ND | ND | ND | ND |

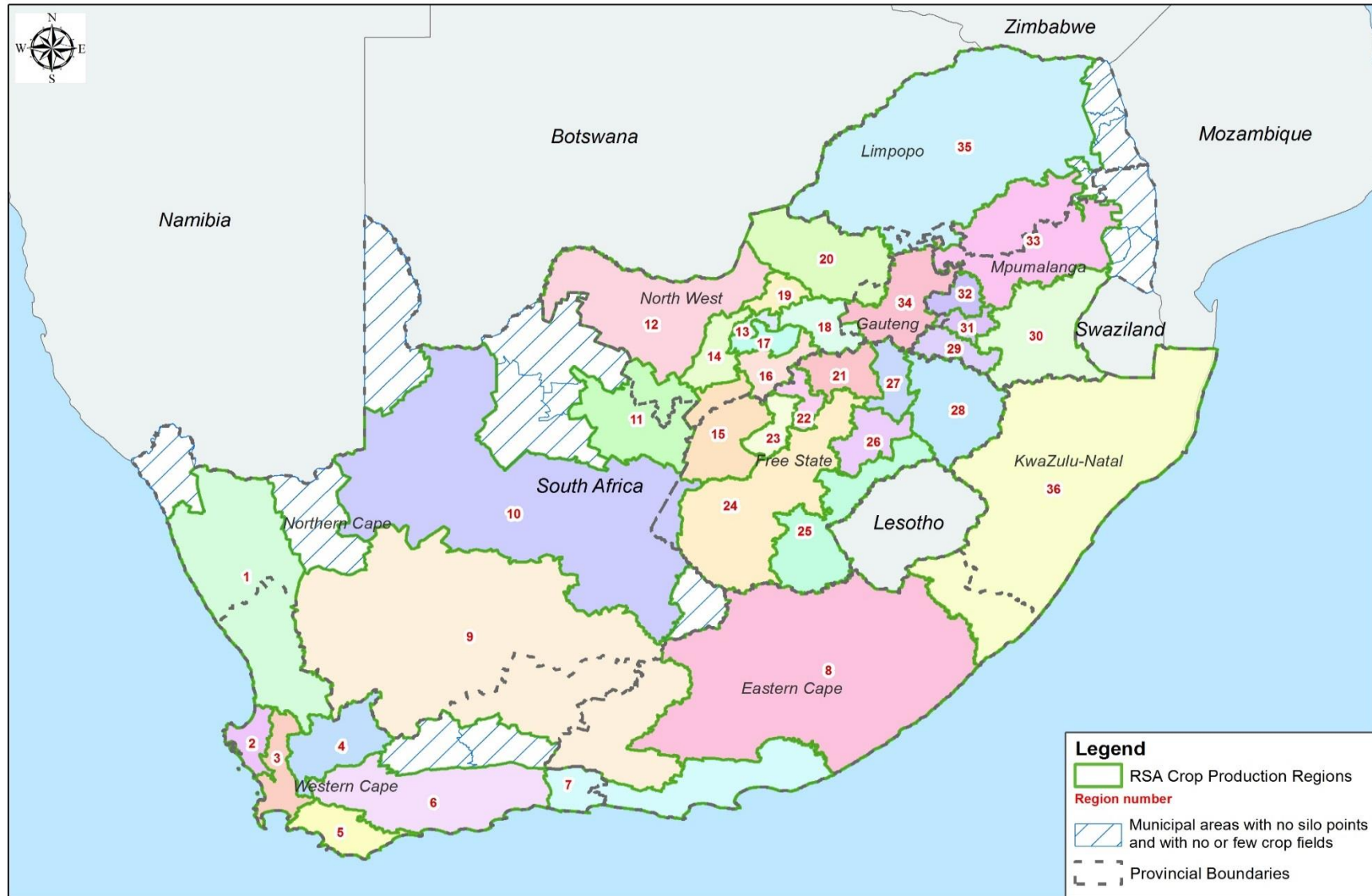
| SAMPLE DESCRIPTION | | | | | | Multi-Mycotoxin Results, µg/kg (ppb) | | | | | | | | | | | | | | |
|--------------------|--------------------|------------------|------------------------|-------------------|-----------------|--------------------------------------|------------------|------------------|------------------|-------|------------|--------|--------|-------|---------|---------|-------|--------|--------|--------|
| | | | | | | AFLATOXINS | | | | | FUMONISINS | | | | DON | 15-ADON | OTA | ZON | T2 | HT2 |
| | | | | | | AFB ₁ | AFB ₂ | AFG ₁ | AFG ₂ | TOTAL | FUM B1 | FUM B2 | FUM B3 | TOTAL | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| Cycle number | Sender Report Code | Sender code | Sampling date / period | Production Region | Submission date | LOQ 5 | LOQ 5 | LOQ 5 | LOQ 5 | | LOQ 20 | LOQ 20 | LOQ 20 | | LOQ 100 | LOQ 100 | LOQ 5 | LOQ 20 | LOQ 20 | LOQ 20 |
| 3 | ZA | 412 June BIN 13 | June 2023 | 30 | 2023-06-22 | ND | ND | ND | ND | - | ND | ND | ND | ND | 417 | ND | ND | ND | ND | ND |
| 1 | ZB | BIN1-29/11 | 2022-11-29 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 528 | <LOQ | ND | ND | ND | ND |
| 1 | ZB | BIN12-29/11 | 2022-11-29 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 246 | ND | ND | ND | ND | ND |
| 1 | ZB | BIN14-29/11 | 2022-11-29 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 477 | <LOQ | ND | ND | ND | ND |
| 2 | ZB | BIN 12 | March 2023 | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | 1106 | 220 | ND | <LOQ | ND | ND |
| 3 | ZB | BIN 1 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 107 | ND | ND | ND | ND | ND |
| 3 | ZB | BIN 4 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 123 | ND | ND | ND | ND | ND |
| 3 | ZB | BIN 9 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 943 | 103 | ND | <LOQ | ND | ND |
| 3 | ZB | BIN 12 | June 2023 | 30 | 2023-06-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 191 | ND | ND | <LOQ | ND | ND |
| 1 | ZC | 414 NOV-BUNKER 3 | Nov 2022 | 30 | 2022-12-14 | ND | ND | ND | ND | - | ND | ND | ND | ND | 518 | <LOQ | ND | <LOQ | ND | ND |
| 2 | ZC | BUNKER 4 | NS | 30 | 2023-04-11 | ND | ND | ND | ND | - | ND | ND | ND | ND | <LOQ | ND | ND | ND | ND | ND |

NS = Information not supplied.

ND = Not detected. <LOQ = Less than limit of quantitation. See Table 4

Annexure B

RSA Crop Production Regions



Annexure C

Summary of the SA mycotoxin regulations in food for human consumption and in feed for animal consumption

| Mycotoxin | Human consumption ^(2,3) | | Animal consumption ⁽⁴⁾ | |
|--|------------------------------------|--|-----------------------------------|---|
| | Maximum allowable level | Commodity | Maximum allowable level | Commodity |
| Aflatoxin B₁ | 5 µg/kg | All foodstuff ⁽²⁾ | 20 µg/kg | Groundnut, copra, palm kernel, cotton seed, maize and products derived from processing thereof. |
| Total Aflatoxin | 10 µg/kg | All foodstuffs ⁽²⁾ | 10 µg/kg | |
| Deoxynivalenol | 2000 µg/kg | Cereal grains (wheat, maize, and barley) intended for further processing ⁽³⁾ . | 1000 – 5000 µg/kg | Feeding stuff on full ration basis for calves, cattle, pets, pigs, poultry. |
| | 1000 µg/kg | Flour, meal, semolina, and flakes derived from wheat, maize, or barley, ready for human consumption ⁽³⁾ . | | |
| Fumonisin B₁ + B₂ | 4000 µg/kg | Raw maize grain, the whole commodity, intended for further processing ⁽³⁾ . | - | - |
| | 2000 µg/kg | Maize flour and maize meal, ready for human consumption ⁽³⁾ . | | |
| Fumonisin B₁ | - | - | 5000 - 50000 µg/kg | Feeding stuff on full ration basis for beef, fish, horses, pets, pigs, beef, poultry. |
| Ochratoxin A | - | - | 50 - 200 µg/kg | Feeding stuff on full ration basis for beef, fish, horses, pets, pigs, beef, poultry. |
| Zearalenone | - | - | 500 - 5000 µg/kg | Feeding stuff on full ration basis for calves, dairy cattle, piglets, pigs. |