Mycotoxin Occurrence in 2021 Canadian Corn Ingredients



APRIL 2022

NUTRITION • HEALTH • SUSTAINABLE LIVING

Mycotoxins & Analysis



LC-MS/MS



The survey results represent samples sent in for surveillance testing only and does not include any sample submitted following clinical signs.

	Mycotoxin Group	Mycotoxins	Limit of Detection (ppb)
Aflatoxins (Afla)	flatoxins (Afla)	Aflatoxin B1	1.0
		Aflatoxin B2	1.0
		Aflatoxin G1	1.0
		Aflatoxin G2	1.0
A-T	A-Trichothecenes (A-Trich)	T-2 Toxin	60.0
		HT-2 Toxin	60.0
		Diacetoxyscirpenol (DAS)	60.0
B-Trichothecenes (B Fumonisins (FUM)	3-Trichothecenes (B-Trich)	Deoxynivalenol (DON/Vomitoxin)	60.0
		3-Acetyldeoxynivalenol (3-AcDON)	60.0
		15-Acetyldeoxynivalenol (15-AcDON)	60.0
	Fumonisins (FUM)	Fumonisin B1	100.0
		Fumonisin B2	100.0
	Zearalenone (ZEN)	Zearalenone (ZEN)	30.0
	Ochratoxin A (OTA)	Ochratoxin A (OTA)	3.0
	Sterigmatocystin	Sterigmatocystin	30.0
	Mycophenolic Acid (MPA)	Mycophenolic Acid (MPA)	30.0

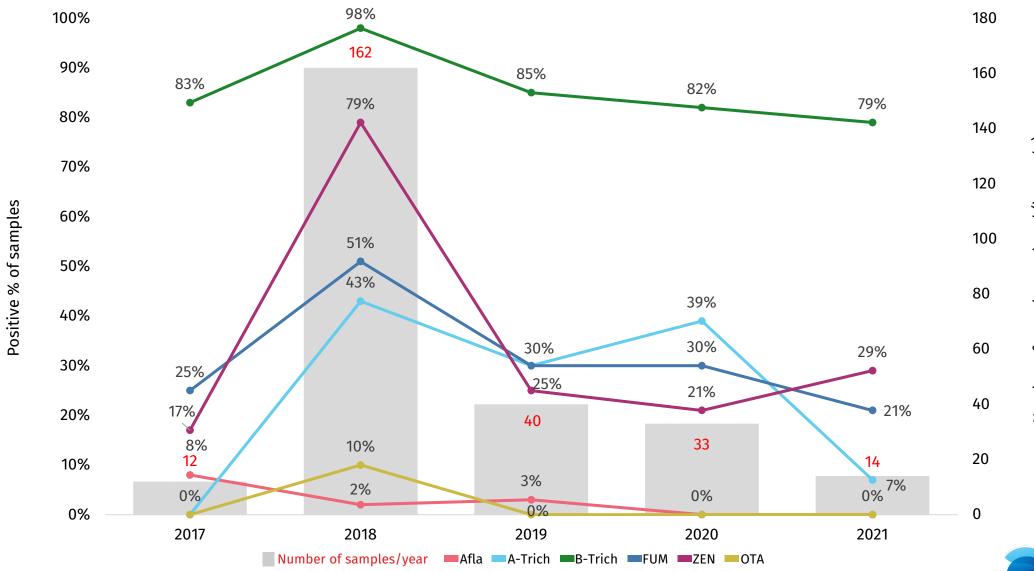


*Results are reported as the summation of mycotoxin levels detected per Mycotoxin Group. (For example, B-Trich represents total contamination detected for DON + 3-AcDON + 15-AcDON)

2021 Canadian Corn (dry matter basis)



Occurrence Trend in 2021 Canadian Corn

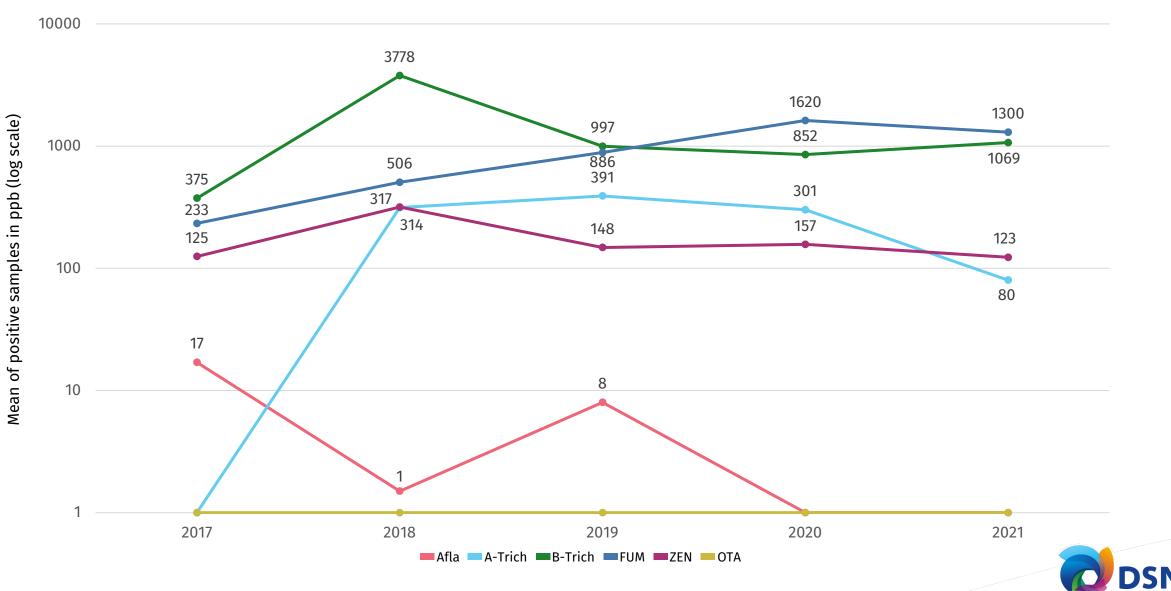


Number of samples analyzed (log scale)

TOXIN RIST

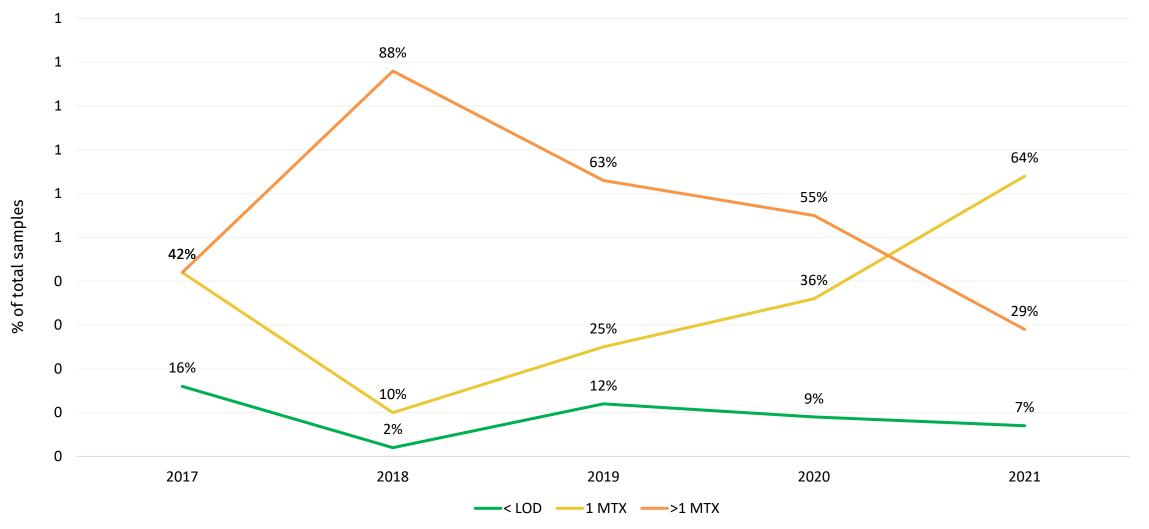
Based on the samples analyzed.

Mean of Positives Trend in 2021 Canadian Corn



JOXIN RIST

Co-occurrence Trend in 2021 Canadian Corn





TOXIN RIST

2021 Corn Risk by Province – B-Trich

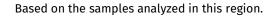


SM

Province	Number of Samples	% Positive Samples	Avg of Positive Samples
Quebec	8	75%	1193
Ontario	5	100%	920
Alberta	1	0%	0

State with average > 1,000 ppb
 State with average < 1,000 ppb
 State with samples < LOD (60 ppb)
 No sample submitted

7



2021 Corn Risk by Province – FUM



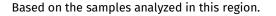
DSM

Province	Number of Samples	% Positive Samples	Avg of Positive Samples
Quebec	8	25%	1850
Ontario	5	20%	200
Alberta	1	0%	0

State with average > 2,000 ppb State with average < 2,000 ppb</p> State with samples < LOD (100 ppb)

No sample submitted





2021 Corn Risk by Province – ZEN



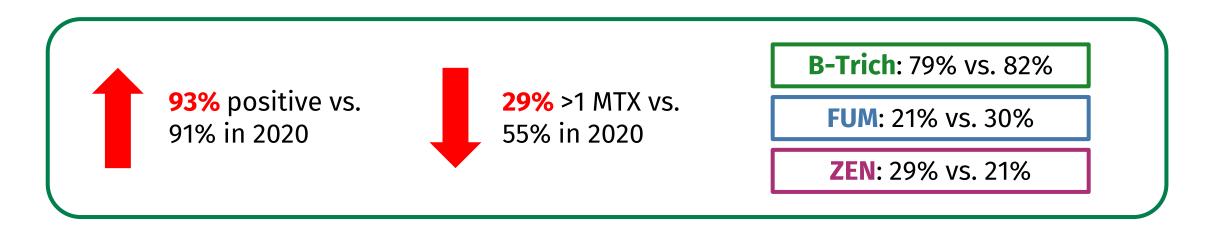
Province	Number of Samples	% Positive Samples	Avg of Positive Samples
Ontario	5	40%	175
Quebec	8	25%	70
Alberta	1	0%	0

State with average > 100 ppb
 State with average < 100 ppb
 State with samples < LOD (30 ppb)
 No sample submitted



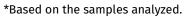


Mycotoxin Survey Summary – 2021 Canadian Corn



OXINA

Forecasted potential risk for livestock production*: Severity of Mycotoxin Contamination 1 2 3 4 5



Contact Us













BRIGHT SCIENCE. BRIGHTER LIVING.™

