



2010

Ontario Winter Wheat Performance Trials

Data collected 2008-2010

www.gocereals.ca

Conducted by the Ontario Cereal Crop Committee

current as of August 27, 2010



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Ontario Winter Wheat Performance Trials

This report has been prepared by the Ontario Cereal Crop Committee and contains the most recent varietal information on winter wheat that was planted in 2009 and harvested in 2010.

ADDITIONAL INFORMATION

Additional information on these trials is available at www.gocereals.ca.

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Table 1: Ontario Performance Trial; Winter Wheat 2010 - Cumulative Yield Index¹
Summary for Area I and II Combined², OCCC, August 2010

Class ³	Variety	5 year	4 year	3 year	2 year	2010
sww	Superior	100 ⁴	101	100	100	102
	AC Mackinnon	102	101	101	101	103
	D8006W (awned)	101	101	100	100	98
	Ava	103	104	104	105	106
	E1009W (awned)	101	100	99	101	104
	E0028W		103	102	102	102
	25W36			101	100	101
srw	25R47 (awned)	103	104	103	102	101
	Emmit	106	106	105	106	108
	E1007R (awned)	103	102	102	103	103
	R045	104	105	105	104	104
	Huntley (awned)	101	101	101	100	99
	Becher	102	102	102	101	100
	R055	103	102	102	102	101
	25R56	104	104	103	105	105
	Branson		105	105	104	106
	25R51 (awned)		101	101	98	96
	HY 116-SRW			104	103	104
	Brooklyn			102	99	101
	25R39				106	106
	Palmer				98	100
	Laurel				98	98
CM614					104	
hrw	AC Morley	99	99	100	99	96
	Harvard	96	96	97	97	98
	Wentworth	102	102	104	104	104
	Stanford (awned)		92	91	91	92
	Princeton			99	98	97
	Keldin (awned)				96	97
Means (t/ha)		5.89	5.75	5.76	5.53	5.58
Means (bu/ac)		87.6	85.5	85.6	82.3	83.0
Locations		32	26	21	14	7

Notes:

1. Values differing by less than 3 within a column may not represent true differences in yield. Yield Indices are Heritability Adjusted Relative Values (HARV), which favour results from trial locations with high repeatability. For more information, see: Yan, W. Use of HARV in Variety Trial Summaries.
2. Area I & II Combined = 2500 Crop Heat Units or more, West of Frontenac County.
3. sww = soft white winter, srw = soft red winter, hrw = hard red winter.
4. Cultivar yield rankings may vary from year to year. Decisions are therefore best made using data with the greatest number of years.

Table 2: Ontario Performance Trial; Winter Wheat 2010 - Cumulative Yield Index¹
Summary for Area I², OCCC, August 2010

Class ³	Variety	5 year	4 year	3 year	2 year	2010
sww	Superior	100 ⁴	99	98	99	96
	AC Mackinnon	103	102	102	102	105
	D8006W (awned)	102	103	102	100	99
	Ava	102	102	102	103	104
	E1009W (awned)	102	101	99	102	105
	E0028W		104	102	103	104
	25W36			102	101	105
srw	25R47 (awned)	107	107	107	107	111
	Emmit	104	104	102	103	106
	E1007R (awned)	104	103	103	103	103
	R045	105	106	108	108	111
	Huntley (awned)	103	103	103	101	100
	Becher	102	102	102	100	93
	R055	102	101	100	100	99
	25R56	105	105	102	104	107
	Branson		102	100	100	97
	25R51 (awned)		103	103	100	101
	HY 116-SRW			99	99	96
	Brooklyn			106	102	103
	25R39				108	109
	Palmer				101	103
	Laurel				97	96
CM614					105	
hrw	AC Morley	97	97	97	96	96
	Harvard	95	95	95	93	93
	Wentworth	102	102	104	104	102
	Stanford (awned)		91	89	92	89
	Princeton			103	100	99
	Keldin (awned)				98	100
Means (t/ha)		6.17	6.00	6.08	6.06	5.97
Means (bu/ac)		91.7	89.3	90.4	90.1	88.7
Locations		16	13	9	6	3

Notes:

1. Values differing by less than 3 within a column may not represent true differences in yield. Yield Indices are Heritability Adjusted Relative Values (HARV), which favour results from trial locations with high repeatability. For more information, see: Yan, W. Use of HARV in Variety Trial Summaries.
2. Area I = 3100 Crop Heat Units or more.
3. sww = soft white winter, srw = soft red winter, hrw = hard red winter.
4. Cultivar yield rankings may vary from year to year. Decisions are therefore best made using data with the greatest number of years.

**Table 3: Ontario Performance Trial; Winter Wheat 2010 - Cumulative Yield Index¹
Summary for Area II², OCCC, August 2010**

Class³	Variety	5 year	4 year	3 year	2 year	2010
sww	Superior	101 ⁴	102	101	101	106
	AC Mackinnon	101	100	100	101	102
	D8006W (awned)	100	99	99	100	97
	Ava	105	105	105	108	107
	E1009W (awned)	100	99	98	101	103
	E0028W		102	101	102	100
	25W36			100	99	98
srw	25R47 (awned)	100	100	99	98	94
	Emmit	108	108	108	108	109
	E1007R (awned)	103	101	102	102	102
	R045	102	103	102	101	99
	Huntley (awned)	99	99	100	98	97
	Becher	103	101	101	102	104
	R055	104	103	104	104	102
	25R56	104	104	104	106	103
	Branson		107	108	108	113
	25R51 (awned)		99	99	97	91
	HY 116-SRW			108	106	111
	Brooklyn			100	97	100
	25R39				104	103
	Palmer				96	99
	Laurel				100	100
CM614					104	
hrw	AC Morley	100	101	101	100	96
	Harvard	98	98	98	99	101
	AC Sampson	101	102	102	103	103
	Wentworth	103	103	103	105	106
	Stanford (awned)		93	92	90	93
	Princeton			96	96	96
	Keldin (awned)				94	94
Means (t/ha)		5.61	5.50	5.52	5.15	5.30
Means (bu/ac)		83.5	81.7	82.1	76.5	78.8
Locations		16	13	12	8	4

Notes:

1. Values differing by less than 3 within a column may not represent true differences in yield. Yield Indices are Heritability Adjusted Relative Values (HARV), which favour results from trial locations with high repeatability. For more information, see: Yan, W. Use of HARV in Variety Trial Summaries.
2. Area II = West of Frontenac County between 2500 and 3100 Crop Heat Units.
3. sww = soft white winter, srw = soft red winter, hrw = hard red winter.
4. Cultivar yield rankings may vary from year to year. Decisions are therefore best made using data with the greatest number of years.

Table 4: Ontario Performance Trial; Winter Wheat 2010 - Cumulative Yield Index¹
Summary for Area III², OCCC, August 2010

Class ³	Variety	5 year	4 year	3 year	2 year	2010
sww	Superior	101 ⁴	100	99	97	96
	D8006W (awned)	103	103	106	106	101
	Ava	106	106	107	110	103
	E1009W (awned)	100	99	100	104	109
	Ninja		98	95	93	100
	E0028W		107	107	110	106
srw	Emmit	107	106	107	107	101
	E1007R (awned)	107	107	107	108	110
	R045	99	99	99	98	103
	Becher	104	105	107	108	109
	R055	101	101	102	102	99
	Branson		102	102	101	101
	HY 116-SRW			101	105	105
	Brooklyn			103	102	104
	Palmer				99	100
	Laurel				98	95
	CM614					107
hrw	AC Morley	98	98	97	97	97
	AC Sampson	101	101	100	102	99
	Wentworth	102	101	103	104	100
	Benefit		97	95	94	90
	Princeton			97	97	103
	CARNAVAL (awned)			104	105	96
	Keldin (awned)				105	102
Means (t/ha)		5.45	5.28	5.44	5.90	6.02
Means (bu/ac)		81.0	78.5	80.9	87.8	89.5
Locations		14	12	9	6	3

Notes:

1. Values differing by less than 3 within a column may not represent true differences in yield. Yield Indices are Heritability Adjusted Relative Values (HARV), which favour results from trial locations with high repeatability. For more information, see: Yan, W. Use of HARV in Variety Trial Summaries.
2. Area III = East of Frontenac County.
3. sww = soft white winter, srw = soft red winter, hrw = hard red winter.
4. Cultivar yield rankings may vary from year to year. Decisions are therefore best made using data with the greatest number of years.

Table 5a: Ontario Winter Wheat Varietal Characteristics Based on Data from Area I, OCCC, August 2010

Variety	Fusarium Rating ¹	Years (Fusarium Data)	Test Weight (kg/hL)	Thousand Kernel Weight (g)	Winter Survival (%)	Height (cm)	Heading Date ² (JD)	Powdery Mildew (0-9) ³	Leaf Septoria (0-9) ³
Superior	S	9	73.5	41.6	98	99	151	2.3	2.3
AC Mackinnon	HS	9	73.8	41.8	100	97	149	2.4	2.8
D8006W	S	7	73.0	43.0	99	93	148	2.3	4.0
Ava	MR	4	75.6	39.2	100	101	151	3.4	2.6
E1009W	S	4	73.4	41.5	100	87	149	2.6	2.9
E0028W	HS	3	72.4	43.2	100	88	147	2.3	3.4
25W36	S	2	73.6	35.2	98	88	149	2.4	2.8
25R47	S	8	73.2	40.9	99	86	147	2.0	2.1
Emmit	MS	7	74.5	40.1	100	89	149	2.4	2.4
E1007R	S	6	74.9	40.2	100	88	147	1.4	1.7
R045	S	6	75.3	38.3	100	85	146	2.0	2.3
Huntley	MS	5	75.7	44.7	100	99	145	2.3	2.8
Becher	S	4	74.6	41.8	100	94	149	1.6	2.3
R055	S	4	74.3	37.7	97	85	148	1.9	2.9
25R56	S	4	72.8	34.2	99	81	147	3.4	2.3
Branson	S	3	73.2	37.4	99	79	145	1.7	2.0
25R51	MR	4	73.7	38.4	100	87	145	4.1	3.3
HY 116-SRW	S	2	73.4	43.9	100	92	148	1.3	2.1
Brooklyn	S	2	74.4	39.5	98	84	146	1.4	2.3
25R39	MS	2	74.4	39.4	100	86	148	3.9	2.0
Palmer	S	2	74.2	38.8	97	93	145	2.8	3.2
Laurel	HS	2	73.0	32.7	96	86	149	1.8	2.6
CM614	S	1	76.4	43.0	99	92	147	2.0	2.8
AC Morley	MR	9	77.2	38.8	100	115	150	2.6	2.7
Harvard	S	9	76.6	44.0	100	94	147	2.6	3.9
Wentworth	HS	4	78.0	47.0	99	98	148	3.6	3.0
Stanford	MS	3	74.9	45.6	99	82	150	1.5	3.2
Princeton	MS	2	76.7	44.5	99	96	150	2.6	3.9
Keldin	S	2	75.7	42.0	97	91	152	3.4	4.3
Means			74.6	40.6	99	91	148	2.4	2.8
Locations			3	3	2	3	3	2	3

Notes:

1. Fusarium ratings are based on Fusarium head blight ratings and deoxynivalenol (DON) levels from inoculated provincial trials.
MR=moderately resistant (best); MS=moderately susceptible; S=susceptible; HS=highly susceptible (worst).
2. Heading may vary from year to year and should only be used to indicate relative differences.
3. For ratings 0-9, a high score is undesirable.

For traits not reported on this table see other area trait tables or previous year's performance trials. Not all traits express themselves in any given year or area.

Table 5b: Ontario Winter Wheat Varietal Characteristics Based on Data from Area II, OCCC, August 2010

Variety	Fusarium Rating ¹	Years (Fusarium Data)	Test		Thousand		Winter Survival (%)	Lodging (0-9) ²	Height (cm)	Heading Date ³ (JD)	Powdery Mildew (0-9) ²	Leaf Rust (0-9) ²	Leaf Septoria (0-9) ²	Stem Rust (0-9) ²	Head Blight (%)
			Weight (kg/hL)	Protein (%)	Kernel Weight (g)	Protein (%)									
Superior	S	9	73.2	10.7	40.6	95	1.1	106	155	3.5	3.5	3.9	3.5	3.2	
AC Mackinnon	HS	9	71.5	9.5	37.1	98	0.6	100	152	2.9	1.5	4.6	4.0	10.7	
D8006W	S	7	69.3	10.4	35.9	98	1.7	90	150	1.8	1.5	5.1	1.5	7.5	
Ava	MR	4	75.5	10.1	38.7	98	1	104	155	4.1	1.5	4.1	1.5	1.5	
E1009W	S	4	71.5	10.8	37.6	98	0.8	87	152	2.1	5.0	5.0	3.5	3.9	
E0028W	HS	3	68.5	10.7	36.9	98	0.5	88	151	2.5	3.5	5.7	6.5	11.8	
25W36	S	2	71.3	10.6	32.7	98	2.2	87	153	2.5	1.0	5.0	0.5	5.9	
25R47	S	8	68.8	9.4	32.6	98	0.9	82	150	4.8	2.0	5.3	3.5	6.9	
Emmit	MS	7	72.1	10.5	38.1	99	0.6	92	152	3.9	4.5	4.3	6.0	4.1	
E1007R	S	6	73.0	10.0	35.3	99	0.2	87	151	3.0	2.0	5.0	6.0	5.3	
R045	S	6	72.0	10.4	33.9	98	0.3	85	150	4.5	1.0	5.0	6.0	5.9	
Huntley	MS	5	73.4	10.7	37.9	99	3.7	95	150	3.3	1.0	4.6	2.0	4.4	
Becher	S	4	70.9	10.2	34.5	97	1.3	94	152	3.5	0.5	4.3	5.5	8.3	
R055	S	4	71.9	10.2	32.0	98	1.8	84	151	2.8	0.5	4.8	3.5	4.4	
25R56	S	4	69.1	9.7	31.0	98	1.6	81	151	4.4	0.5	4.5	2.0	4.6	
Branson	S	3	71.8	9.7	34.7	98	0.3	83	150	1.8	1.0	4.0	5.0	8.5	
25R51	MR	4	67.8	10.0	31.1	99	0	81	150	4.8	0.5	5.4	1.5	4.9	
HY 116-SRW	S	2	72.6	10.2	40.5	98	1.6	96	152	1.0	0.0	3.9	5.5	7.4	
Brooklyn	S	2	70.3	9.8	31.7	97	0	85	150	5.2	0.5	5.5	6.5	7.1	
25R39	MS	2	71.3	9.1	37.3	97	1.1	84	152	4.8	1.5	4.3	4.5	2.6	
Palmer	S	2	71.3	9.5	33.3	95	1.3	94	150	4.2	1.0	4.8	3.5	6.4	
Laurel	HS	2	71.7	10.3	31.4	94	0.8	84	152	1.2	0.5	5.0	1.5	6.6	
CM614	S	1	72.7	11.1	34.7	97	2.2	91	151	3.1	1.5	5.0	5.5	5.4	
AC Morley	MR	9	76.8	11.3	38.9	98	2.9	111	154	2.9	2.5	3.8	2.0	3.8	
Harvard	S	9	75.9	11.8	41.4	98	0.6	93	151	4.2	2.5	5.0	0.5	4.7	
AC Sampson	S	9	72.7	10.1	40.6	98	1.1	101	156	2.7	5.5	4.0	0.5	10.3	
Wentworth	HS	4	75.7	11.5	46.7	98	0.8	99	153	4.1	2.5	5.1	4.5	7.6	
Stanford	MS	3	71.7	11.3	42.0	95	0.5	85	153	2.2	0.5	4.7	2.5	4.5	
Princeton	MS	2	74.8	11.1	42.6	97	0.3	97	153	5.1	0.0	5.0	4.0	7.1	
Keldin	S	2	73.2	11.0	40.3	88	1	92	156	3.8	2.0	4.7	0.0	7.5	
Means			72.1	10.4	36.7	97	1.1	91	152	3.4	1.7	4.7	3.4	6.1	
Locations			4	2	4	4	3	4	4	4.0	1.0	4.0	1.0	1.0	

Notes:

1. Fusarium ratings are based on Fusarium head blight ratings and deoxynivalenol (DON) levels from inoculated provincial trials.
MR=moderately resistant (best); MS=moderately susceptible; S=susceptible; HS=highly susceptible (worst).
2. For ratings 0-9, a high score is undesirable.
3. Heading may vary from year to year and should only be used to indicate relative differences.

For traits not reported on this table see other area trait tables or previous year's performance trials. Not all traits express themselves in any given year or area.

Table 5c: Ontario Winter Wheat Varietal Characteristics Based on Data from Area III, OCCC, August 2010

Variety	Fusarium Rating ¹	Years (Fusarium Data)	Thousand			Height (cm)	Heading Date ² (JD)	Leaf Septoria (0-9) ³
			Test Weight (kg/hL)	Kernel Weight (g)	Winter Survival (%)			
Superior	S	9	74.6	41.8	89	96	152	1.1
D8006W	S	7	73.9	42.4	98	80	150	1.0
Ava	MR	4	75.5	39.1	94	88	150	1.6
E1009W	S	4	74.6	40.0	98	79	151	1.1
Ninja	S	3	76.8	44.7	94	101	152	1.3
E0028W	HS	3	73.5	43.5	96	80	149	1.4
Emmit	MS	7	74.8	40.8	97	81	150	1.1
E1007R	S	6	75.7	39.0	96	77	150	1.9
R045	S	6	75.8	39.2	96	76	149	1.3
Becher	S	4	75.1	40.9	96	85	149	1.3
R055	S	4	75.3	36.7	98	77	150	1.3
Branson	S	3	75.3	36.7	93	79	149	1.4
HY 116-SRW	S	2	74.9	43.7	94	88	150	2.1
Brooklyn	S	2	75.5	39.0	91	78	150	1.4
Palmer	S	2	74.6	37.6	90	85	150	2.0
Laurel	HS	2	73.8	32.8	91	76	150	1.1
CM614	S	1	75.7	41.3	91	81	150	1.0
AC Morley	MR	9	76.5	40.7	97	106	151	2.0
AC Sampson	S	9	73.4	43.3	93	85	153	1.3
Wentworth	HS	4	77.7	48.3	99	86	150	1.0
Benefit	MS	3	77.1	42.3	97	106	150	1.6
Princeton	MS	2	76.9	47.6	97	81	150	0.9
CARNAVAL	MS	2	75.5	40.0	97	83	150	1.0
Keldin	S	2	76.5	44.5	91	87	152	1.0
Means			75.4	41.1	95	85	150	1.3
Locations			3	3	2	2	3	2

Notes:

1. Fusarium ratings are based on Fusarium head blight ratings and deoxynivalenol (DON) levels from inoculated provincial trials.
MR=moderately resistant (best); MS=moderately susceptible; S=susceptible; HS=highly susceptible (worst).
2. Heading may vary from year to year and should only be used to indicate relative differences.
3. For ratings 0-9, a high score is undesirable.

For traits not reported on this table see other area trait tables or previous year's performance trials. Not all traits express themselves in any given year or area.

Table 6: Ontario Winter Wheat Distributors 2010, OCCC, August 2010

Class ¹	Variety	Distributor
sww	Superior (TW93211)	Advantage Seed Growers
	AC Mackinnon (PRC9308)	PRO Seeds
	D8006W (GENESIS-D8006W) (awned)	Advantage Seed Growers
	Ava (TW122:001)	Hyland Seeds
	E1009W (GENESIS:E1009) (awned)	Parrish & Heimbecker / Southwest Ag Partners
	Ninja (95:056:187)	AAFC (Winter Wheat)
	E0028W	Parrish & Heimbecker / Southwest Ag Partners
srw	25W36 (XW05K)	Pioneer Hi-Bred
	25R47 (awned)	Pioneer Hi-Bred
	Emmit (TW044.094)	Hyland Seeds
	E1007R (GENESIS:E1007R) (awned)	Parrish & Heimbecker / Southwest Ag Partners
	R045 (GENESIS:R045)	Advantage Seed Growers
	Huntley (IL98.5258) (awned)	SeCan Association
	Becher (CM708)	C & M Seeds
	R055 (GB069R)	Parrish & Heimbecker / Southwest Ag Partners
	25R56 (XW04A)	Pioneer Hi-Bred
	Branson (M00-3701)	Hyland Seeds
	25R51 (awned)	Pioneer Hi-Bred
	HY 116-SRW (WF116-072)	Hyland Seeds
	Brooklyn (CM153)	C & M Seeds
	25R39 (XW06M)	Pioneer Hi-Bred
	Palmer (CM714)	C & M Seeds
Laurel (CM3534)	C & M Seeds	
CM614 (CM8-7777)	C & M Seeds	
hrw	AC Morley (H242.31.1)	Advantage Seed Growers
	Harvard (CM98036)	C & M Seeds
	AC Sampson	Bramhill Seeds
	Wentworth (TW070:015)	Hyland Seeds
	Benefit (95-094-197)	PRO Seeds
	Stanford (ACS52062) (awned)	C & M Seeds
	Princeton (ACS54037)	C & M Seeds
	CARNAVAL (TW061-002) (awned)	Synagri
Keldin (ACS55017) (awned)	C & M Seeds	

Notes:

1. sww = soft white winter, srw = soft red winter, hrw = hard red winter

