

Technical Bulletin

Genes that fit *your* farm.

SeCan

Canada's Seed Partner

AB Tofield 6-Row Feed & Forage Barley



Progress Through Research
Le progrès grâce à la recherche

Description:

AB Tofield is a dual purpose smooth awned 6-row barley with excellent grain and forage yield potential. Agronomically AB Tofield is a medium height 6-row barley with very good lodging tolerance and will be well suited to all of western Canada.

Parentage: H97094002/Sundre

Strengths:

- Grain yield 107% of Vivar and CDC Austenson in registration trials
- Forage yield 105% of Vivar and 103% of CDC Austenson in forage barely registration trials
- **Smooth Awned**
- Very good lodging tolerance, better than all the checks in the 6-row registration trials including Amisk and Vivar

Neutral Traits:

- Medium height, +6cm compared to Vivar and Amisk
- Medium-Late maturity, +2 days later than Vivar
- Forage quality similar to the checks Vivar and AC Ranger
- Slightly lower TKW and % plump compared to the average of the registration checks

Weaknesses:

- Susceptible to FHB

Breeder:

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Field Crop Development Centre
Alberta Agriculture and Rural Development
Lacombe, Alberta

PBR 91 Protected

2017 and 2018 Western Cooperative Six-Row Barley Registration Trials

Variety	Grain Yield % AC Ranger	Heading (days)	Maturity (days)	Height (cm)	Lodging 1 = erect 9 = flat	1000 Kernel Weight g	Test Weight g/hl	% Plump
AC Ranger	100	53.7	90.0	78.9	3.7	43.5	62.4	83.9
Vivar	100	54.9	89.2	74.2	3.4	44.6	62.1	86.2
Celebration	93	52.6	86.1	80.9	3.5	38.9	63.0	89.9
Amisk	98	54.4	88.9	73.9	3.6	43.1	60.8	93.3
AB Tofield	108	55.8	91.0	80.0	2.4	42.4	63.6	85.0

2017 and 2018 Western Cooperative Forage Barley Registration Trials

Variety	Forage Yield % AC Ranger	Height (cm)	Lodging 1 = erect 9 = flat	Crude Protein %	NDF %	ADF %	IVTD %	Starch %	CC (cow d/ha)	ADG (kg/d)	NDF 30-NDF
AC Ranger	100	74.9	1.4	9.2	43.6	25.4	75.2	19.4	625	0.69	42.9
CDC Austenson	103	74.5	1.2	8.6	43.0	25.0	75.1	18.4	645	0.71	41.9
CDC Cowboy	107	96.9	1.6	8.0	44.6	27.0	73.5	17.5	690	0.63	40.3
Vivar	101	71.0	1.4	8.7	44.1	26.5	74.6	18.2	639	0.64	42.2
AB Tofield	106	75.4	1.3	8.6	44.5	25.8	74.2	18.2	668	0.67	41.7

NDF = neutral detergent fibre, ADF = acid detergent fibre, IVTD = in-vitro true digestibility, CC = carrying capacity, ADG = average daily gain

For more information, call 1-800-665-7333 or visit www.secan.com

Seed Manitoba 2024 - Barley Comparison

Variety	Site Years Tested	Yield bu/ac	Protein %	Relative Maturity +/- 88 days	Height +/- 89cm	Test Weight +/- 48.7lb/bu	Rough or Smooth Awns	Lodging	Loose Smut	Surface Borne Smut	Root Rot	Netted Net Blotch	Spotted Net Blotch	Spot Blotch	Stem Rust	FHB
AB Advantage (6R)	30	109	13.3	+1	+15	0	S	VG	MR	I	---	MS	I	I	I	S
CDC Austenson (2R)	79	116	12.3	+1	0	+0.5	R	G	S	R	I	MS	R	MR	I	I
CDC Churchill (2R)*	41	114	12.3	+1	-5	-0.2	R	G	MS	MR	---	MR	MR	I	MR	MS
CDC Durango (2R)	29	114	12.5	+2	-3	+0.1	R	G	S	R	---	MR	MS	I	I	I
CDC Renegade (2R)	29	107	12.7	+1	+7	-0.3	S	F	I	MR	---	MS	MR	MS	MR	MR
Esmá (2R) VUA	30	115	12.2	+1	-10	-0.4	---	G	NT	NT	NT	NT	NT	NT	NT	NT
KWS Kellie (2R) VUA	29	106	12.1	1	-11	-1.5	---	P	NT	NT	NT	NT	NT	NT	NT	NT
AB Tofield (6R)	29	111	12.2	+1	+5	+1	S	VG	MR	MR	---	MS	I	I	R	S

Lodging Ratings: F=Fair; G=Good; VG=Very Good Disease Ratings: R=Resistant; MR=Moderately Resistant; I=Intermediate; MS=Moderately Susceptible; S=Susceptible, NT = Not tested

2024 Saskatchewan Varieties of Grain - Barley Comparison

Variety	Years Tested	# Rows	Awn Type	Yield (% of AAC Synergy)		Relative Maturity	Lodging	Net Form Net Blotch	Spot-Form Net Blotch	Spot Blotch	Scald	Loose Smut	Other Smuts	Root Rot	Stem Rust	FHB
				Area 1&2	Area 3&4											
AAC Synergy	7	2	R	100	100	M	F	MR	R	R	S	S	I	I	MR	I
AB Advantage	7	6	S	103	100	VL	VG	MS	I	I	I	MR	I	---	I	S
CDC Austenson	7	2	R	102	103	M	G	MS	R	MR	S	S	R	I	I	I
CDC Churchill*	7	2	R	105	104	M	G	MR	MR	I	S	MS	MR	---	MR	MS
CDC Durango	5	2	R	107	107	M	VG	MR	MS	I	MS	S	MR	---	I	I
CDC Renegade	4	2	S	107	97	M	F	I	MR	MS	S	MS	MR	---	MR	MR
Esmá VUA	4	2	R	106	100	M	G	---	---	---	---	---	---	---	---	---
KWS Kellie VUA	4	2	R	107	98	L	G	---	---	---	---	---	---	---	---	---
AB Tofield	6	6	S	106	105	L	G	MS	I	I	I	---	MR	---	R	S

M=Medium; L=Late; F=Fair; G=Good; VG=Very Good; P=Poor; VP=Very Poor Disease Ratings: R=Resistant; MR=Moderately Resistant; I=Intermediate; MS=Moderately Susceptible; S=Susceptible

2024 Alberta Seed Guide – Feed and Food Barley Comparison

Variety	2 or 6 Row	Awn Type	Most Recent Year of Testing	Station Years	Yield % AAC Synergy			Maturity Days +/- AAC Synergy	Test Weight lb/bu	TKW (g)	Height (cm)	Resistance to Lodging	Disease Tolerance						
					Overall Yield	Low <113 (bu/ac)	High >113 (bu/ac)						Loose Smut	Other Smuts	Scald	Spot Form Net blotch	Net Form Net Blotch	Spot Blotch	FHB
AAC Synergy (bu/ac)					124	86	146	93											
AAC Synergy	2	R	2023	131	100	100	100	0	53	49	81	F	S	I	S	R	MR	R	I
AB Advantage	6	S	2020	32	104	100	106	+2	52	48	102	G	MR	I	I	I	MS	I	S
CDC Austenson	2	R	2023	101	100	94	103	+2	54	49	81	G	S	R	S	R	MS	MR	I
CDC Churchill*	2	R	2023	42	103	101	104	+2	53	46	77	G	MS	MR	S	MR	MR	I	MS
CDC Durango	2	R	2023	41	106	98	109	+2	54	50	79	VG	S	R	MS	MS	MR	I	I
CDC Renegade	2	S	2022	26	102	109	97	+4	52	52	90	F	I	MR	S	MR	I	MS	MR
Esmá VUA	2	R	2022	26	110	114	107	+3	52	51	69	VG	NT	NT	NT	NT	NT	NT	NT
KWS Kellie VUA	2	R	2022	26	114	121	110	+5	52	50	66	VG	NT	NT	NT	NT	NT	NT	NT
AB Tofield	6	S	2021	24	104	102	105	+1	52	43	84	G	MR	MR	I	I	MS	I	S

R=Rough; VG=Very Good, G=Good, F=Fair; P=Poor; VP=Very Poor; Disease Ratings: R=Resistant; MR=Moderately Resistant; I=Intermediate; MS=Moderately Susceptible; S=Susceptible, NT = Not tested
*Malting barley for comparison

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