

## YELLOW PEA: CDC CANARY

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**Year released to Select Seed Growers:** 2017

**Sub-licensed outside of SK:** SeCan

**International Distribution Rights:** Canterra Seeds Ltd./Meridian Seeds

**Plant Breeders Rights:** PBR'91

CDC Canary is an early maturing, yellow, semi-leafless field pea variety. CDC Canary was tested for two years in the field pea co-op registration Test "B" in 2013-2014. In these trials, the yield was 110% of the yellow pea check varieties CDC Golden and Agassiz (Table 2). In six years of testing in the co-op and regional trials in Saskatchewan (Table 1), CDC Canary yielded 97% and 98% of the check variety CDC Amarillo in the southern and northern geographies respectively. CDC Canary has PBR'91 protection.

### Strengths:

- Early maturity
- Good lodging resistance, similar to CDC Amarillo
- Medium-long vine length
- Powdery mildew resistance

### Neutral:

- Medium seed size
- Round seed shape, and slightly blockier than the checks
- Low seed coat breakage percent (similar to CDC Spectrum)
- Moderate protein concentration (similar to CDC Amarillo)
- Moderate cooking time
- Fair resistance to Mycosphaerella blight resistance and Fusarium wilt
- Moderate yield



**Table 1: Agronomic Performance for CDC Canary from Co-op and Regional Trials in Saskatchewan – Adapted from Varieties of Grain Crops 2019**

Variety	Year Registered	Years Tested	Yield % Amarillo		Maturity	Lodging (1-9)	Vine Length (cm)	Resistance to:					Seed Weight (g/1000)	Protein vs. CDC Amarillo	
			1, 2 & South 3*	North 3 & 4*				Mycosphaerella Blight	Powdery Mildew	Fusarium Wilt	Seed Coat Breakage	Seed Coat Dimpling			Greenness
CDC Amarillo (check)	2012	10	100	100	Medium	3.5	85	4.5	R	MR	Fair	Fair	Good	230	23.0
Abarth	2012	7	93	90	Early	3.5	75	5.0	R	I	Fair	Good	Good	280	-0.1
AAC Ardill	2013	7	103	99	Medium	3.5	85	4.5	R	MR	Good	Good	Good	230	-1.9
AAC Asher	2017	3	103	100	Medium	4.5	75	4.5	R	I		Fair	Good	260	-0.6
CDC Athabasca	2016	7	93	97	Medium	3.0	85	4.5	R	I	Fair	Fair	Good	300	+0.5
CDC Canary	2017	6	97	98	Early	3.5	85	4.5	R	I	Good	Fair	Fair	230	-0.1
AAC Carver	2014	5	103	100	Early	4.0	85	5.0	R	I	Good	Fair	Good	240	-1.3
AAC Chrome	2017	4	105	102	Medium	4.5	75	4.5	R	I	Good	Good	Good	240	-1.2
CDC Inca	2015	7	104	99	Medium	4.0	85	4.5	R	I	Good	Good	Fair	230	-0.8
AAC Lacombe	2013	6	96	99	Medium	3.5	85	5.0	R	I	Fair	Fair	Fair	250	-0.9
CDC Lewochko	2018	5	104	103	Medium	3.5	90	4.5	R	I	Good	Good	Good	230	0.7
CDC Meadow	2006	10	92	89	Early	4.0	85	5.0	R	I	Good	Good	Good	220	-0.6
AAC Profit	2018	3	101	110	Medium	4.5	90		R	I	Good	Good	Good	230	0.6
CDC Saffron	2011	10	98	92	Early	4.0	80	4.5	R	I	Good	Fair	Good	250	-0.4
CDC Spectrum	2016	7	104	102	Medium	3.5	85	4.5	R	I	Good	Good	Fair	240	0.5

Source: Varieties of Grain Crops 2019 (SaskSeed Guide)

\*Area 1: Brown soil zone; Area 2: Dark Brown; Area 3: Black; Area 4: Dark Gray

Lodging score: 1=Upright; 9=Completely lodged

Mycosphaerella blight score (1-9) 1=No disease, 9=Completely blighted

Seed coat dimpling: VG = 0-5%; G= 6-20%; F = 21-50%

Greenness: Good = 0-15%; Fair = 16-40%

**Table 1: Agronomic Performance of CDC Canary Compared to the Checks (Pea Co-op Test B, 2013-2014)**

Variety	Yield (kg/ha)	Yield (% mean of checks)	Days to Maturity	Vine Length (cm)	Lodging (pre-harvest)	Seed Weight (mg)	Seed Shape	Seed Coat Breakage (%)	Crude Protein (%)	Cooking Time (min)
CDC Golden (check)	4472	97	97	87	4.7	210	2.5	1.5	23.7	10.4
Agassiz (check)	4797	104	98	90	4.2	223	2.6	4.6	22.7	10.4
CDC Canary	5103	110	97	95	3.9	232	3.0	2.3	22.7	16.7
CV	8.3									
LSD 05	293		0.8	3.8	0.5	7.7	0.2	2.6	0.7	7.0
# locations	22		20	16	23	19	20	4	9	2

Source: CDC Pulse breeding group, U of S

Lodging score: 1=Upright; 9=Completely lodged

Seed shape: 1=Round; 5=Cubic

Cooking time = Mattson cooking time (min)

**Figure 1: Relative maturity of CDC Canary (centre) vs. CDC Lewochko (left) and CDC Athabasca (right)**



**Figure 2:** Seed from the 2014 Pea Co-op Test B at Brooks, AB of CDC Canary and check varieties Agassiz and CDC Golden



CDC Canary

Agassiz

CDC Golden