

Project 5023
Small Grains Investigations

All work with small grains, wheat, oats, or barley, is carried on under this project, whether fall or spring seeded, irrigated or dry, on or off station.

The 59-60 budget for this work is \$4614.45.

Work done and results included in this report in the order listed is as follows:

Winter Wheat

Western Regional Hard Red	Station	25	Varieties
Intrastate Hard Red	Station	25	"
Short or stiff straw winter	Station	11	"
Off-Station winter wheat	Sanders County	10	"
" " " "	Lake "	10	"
" " " "	Ravalli "	10	"
" " " "	Missoula "	10	"
" " " "	Mineral "	10	"
Foundation Seed Production	Station		
Winter Wheat Summary and Comments			

Spring Wheat

Advance Yield Spring Wheat	Station	20	Varieties	Irrigated
Advance Yield Spring Wheat	Station	20	"	Dryland
Western Regional White Wheat	Station	15	"	Dryland
Off-Station Spring Wheat	Lake County	10	"	Irrigated
Off-Station Spring Wheat	Ravalli County	10	"	Irrigated
Off-Station Spring Wheat	Missoula County	10	"	Dryland
Off-Station Spring Wheat	Mineral County	10	"	Dryland
Single rows of Idaho Selections				
Foundation Seed Production --- Wheat Quality Plots				
Spring Wheat Summary and Comments				

Winter Barley

Male-sterile Character.

Spring Barley

Malting and Advance Yield	Station	10	Varieties	Irrigated
Intrastate and Station	Station	25	"	Irrigated
Advance Yield	Station	9	"	Dryland
Intrastate and Station	Station	25	"	Dryland
Off-Station Barley	Lake County	10	"	Irrigated
Off-Station Barley	Ravalli County	10	"	Irrigated
Off-Station Barley	Missoula County	10	"	Dryland
Off-Station Barley	Mineral County	10	"	Dryland
Barley Feed Strips		6	"	Dry. & Irrig.

Advanced Yield Nursery grown under irrigation at Creston, Montana, in 1959.
 Seeded: May 11, 1959 Area Harvested: 16 sq. ft.

Variety	C.I. or Sel. No.	Date Head.	Date Ripe	Pl. Ht.	Lodge %	Grams per Plot					Bu./ Acre	Test Weight
						1	2	3	4	Total		
1953 x Lee,												
B52-91	13242	7/13	9/15	42	0	755	625	610	600	2590	64.8	56.5
Centana	12974	7/18	9/15	44	0	775	610	570	590	2545	63.6	57.5
Ceres	6900	7/17	9/10	45	10	555	545	630	585	2315	57.9	59.25
Pilot	11945	7/16	9/10	42	0	640	605	550	520	2315	57.9	60.5
Lake	13413	7/22	9/15	42	0	610	430	650	600	2290	57.2	56.25
Rescue x 1831,												
B51-9	13304	7/20	9/15	43	0	685	615	465	505	2270	56.8	57.25
Thatcher ² x												
Rescue	B57-191	7/16	9/10	45	40	615	555	525	510	2205	55.1	55.75
Rescue-N1315 x												
G.B.	B52-92	7/16	9/15	42	0	595	575	475	520	2165	54.1	58.75
Selkirk	13100	7/16	9/10	43	0	620	565	555	385	2125	53.1	58.75
Thatcher x Lee	B55-4	7/15	9/12	40	0	475	510	545	590	2120	53.0	57.0
Lee	12488	7/13	9/15	42	0	585	500	490	510	2085	52.1	58.75
Thatcher x Lee	B55-5	7/14	9/10	40	0	500	600	530	450	2080	52.0	58.5
Thatcher ³ x												
Rescue	B57-196	7/18	9/10	42	10	460	520	535	560	2075	51.9	54.5
Thatcher	10003	7/14	9/10	42	5	560	470	495	545	2070	51.8	57.75
Th. 6 x K.F.,												
C.T. 233	13345	7/15	9/10	40	0	505	460	485	605	2055	51.4	59.5
Thatcher x R.L.												
2564, C.T.229	13332	7/16	9/10	42	0	525	460	570	485	2040	51.0	59.5
Rescue-N1315 x												
G.B.	B57-173	7/16	9/15	43	50	665	545	360	455	2025	50.6	57.25
Rescue	12435	7/16	9/10	44	50	630	545	410	430	2015	50.4	57.25
Conley	13157	7/18	9/15	44	0	590	495	450	475	2010	50.2	56.0
Chinook	13220	7/15	9/10	43	25	430	500	490	430	1850	46.2	58.75

Mean Yield - - - - - 54.1
 S.E. \bar{x} - - - - - 2.8
 L.S.D. (P = .05) - - 8.0
 C.V. = 5.18%

Advanced Yield Nursery grown on dryland at Creston, Montana, 1959
 Seeded May 6, 1959 Area harvested: 16 sq. ft.

Variety	C. I. or Sel. no.	Head. Date	Pl. Ht.	Grams per Plot				Total	Bu/A	Test Weight
				1	2	3	4			
Th. 6 x K.F., C.T. 233	13345	7/10	36	440	450	475	505	1870	46.75	57.25
1953 x Lee, B52-91	13242	7/8	40	465	435	450	480	1830	45.75	55.75
Centana	12974	7/12	38	405	440	475	495	1815	45.38	57.25
Pilot	11945	7/10	38	490	420	420	440	1770	44.25	54.5
Selkirk	13100	7/11	36	425	435	435	470	1765	44.12	54.75
Thatcher ² x Rescue	B57-191	7/10	38	385	385	500	480	1750	43.75	54.25
Lee	12488	7/7	38	395	450	420	475	1740	43.50	55.25
Thatcher x Lee	B 55-4	7/7	36	435	440	420	400	1695	42.38	52.75
Conley	13157	7/12	40	345	385	510	450	1690	42.25	55.0
Rescue x 1831, B51-9	13304	7/12	38	300	415	505	470	1690	42.25	57.0
Rescue	12435	7/10	40	515	330	470	365	1680	42.00	55.5
Thatcher	10003	7/9	38	410	375	465	430	1680	42.00	54.5
Thatcher ³ x Lee	B55-5	7/8	36	405	405	435	425	1670	41.75	55.75
Thatcher ³ x Rescue	B57-196	7/12	34	385	380	440	460	1665	41.62	54.5
Rescue-N1315 x G.B.	B57-173	7/11	38	425	410	445	365	1645	41.12	55.75
Chinook	13220	7/10	42	395	375	395	470	1635	40.88	58.75
Ceres	6900	7/11	38	360	465	430	345	1600	40.00	57.0
Rescue-N1315 x G.B.	B57-92	7/9	36	305	345	440	445	1535	38.38	54.5
Thatcher x R.L. 2564 C.T. 229	13332	7/10	36	325	330	415	420	1490	37.25	55.0
Lake	13413	7/14	34	305	350	420	345	1420	35.50	54.0

Mean Yield - - - - - 42.0
 S.E. \bar{x} - - - - - 2.2
 L.S.D. (P = .05) - - N.S.
 C.V. - - - - - 5.24%