

PROJECT TITLE: Soft White Winter Wheat Evaluation

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OBJECTIVE:

To evaluate soft white winter wheat lines for adaptability, yield, quality and disease resistance in western Montana.

RESULTS:

A smaller soft white wheat nursery was designed in cooperation with Bozeman to evaluate released varieties more specifically adapted for northwestern Montana. Fifteen soft white varieties were grown with Neely, a standard hard red variety used for comparison purposes. Yields were good, although slightly below yields from the Western Regional Nursery grown in 1994. Most entries yielded above 110 bu/A with Cashup having the highest at 131.5 bu/A. The majority of entries had sufficient hardiness to over winter except for McDermid which had 15% winter survival in the spring. McDermid did re-establish well later in the season to produce 96 bu/A. Test weights were normal for the season and averaged 59.4 lb/bu. Three entries had greater than 60 lb/bu test weights. All the soft whites were short to mid height while Neely had a greater height that contributed to lodging during the season.

SUMMARY:

In the first year of a smaller soft white winter wheat evaluation several varieties provided both good yields and test weights while demonstrating excellent lodging resistance.

FUTURE PLANS: With this specific nursery we will continue evaluation of soft white winter wheat cultivars adapted to western Montana.

Table 1. Agronomic data from the Soft White Winter Wheat Nursery grown on the Northwestern Agricultural Research Center in Kalispell, MT. Planted: September 20, 1994 Harvest: August 28, 1995

VARIETY		YIELD BU/A	TEST WT LB/BU	WINTER SURVIV	HEADING DATE	HEIGHT INCHES	LODGING INDEX
CASHUP	CASHUP	131.49	59.43	99.33	159.33	34.78	.00
PI497672	MALCOLM	129.87	59.17	98.33	158.67	35.43	.00
PI552427	MACVICAR	129.07	58.60	99.33	158.67	35.43	.00
CI 17909	LEWJAIN	125.84	60.07	99.67	163.67	36.09	.00
PI536995	KMOR	124.23	58.63	99.33	162.33	36.09	.00
CI 17860	NEELEY	121.00	62.30	99.67	159.00	43.31	17.03
PI536994	ELTAN	119.39	60.60	99.33	163.33	38.71	.00
PI559718	W301	118.58	58.30	97.33	158.33	32.81	.00
BANNER	BANNER	116.97	59.63	98.00	156.67	34.12	.00
CI 11755	STEPHENS	116.16	58.13	97.67	157.33	34.12	.00
PI511763	MADSEN	115.35	59.30	98.33	162.00	36.09	.00
CI 17419	DAWS	114.55	61.57	98.67	163.00	36.09	.00
CI 17954	HILL 81	113.74	59.77	98.67	162.67	38.06	.00
BZ6W90-4	BZW690-470	110.51	59.70	98.33	154.00	34.12	.00
MCDERMID	MCDERMID	95.99	58.07	15.33	159.33	33.46	.00
PI560129	GENE	90.35	56.90	97.33	158.33	32.81	.00
MEAN		117.07	59.39	93.42	159.79	35.72	1.06
LSD (.05)		22.05	1.21	2.35	2.17	1.64	7.44