

## Southwestern Idaho: Treasure Valley

### Winter Wheat

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#### Background and Assumptions



The University of Idaho's costs and returns estimates are based on economic costs, not accounting costs. All resources are valued at a market rate or "opportunity cost". Input prices are taken from the U of I's annual survey of agricultural supply companies. The selling price is a historical average, not a current year's price. The cost estimate shown here is typical for growing winter wheat in southwestern Idaho. Production practices most closely resemble those in Canyon, Payette and Owyhee counties. Although production practices may be similar for individual farms, each farm has a unique set of resources with different levels of productivity, different production problems, and therefore different costs. Farm size, crop rotation, age and type of equipment, and the quality and intensity of management are all crucial factors that influence costs.

#### The Model Farm

This costs and returns estimate models a 1,200 acre farm with 300 acres in winter wheat. In addition to winter wheat, the farm grows 300 acres of potatoes or sugarbeets, 300 acres of corn, 150 acres of dry beans or onions, and 150 acres of alfalfa seed or alfalfa hay. The farm uses a concrete ditch and siphon tube irrigation system with water delivered to the farm from an irrigation district. The district charges a flat fee per acre for water.

#### Production Practices

After harvest of the previous crop, the ground is disc ripped, roller harrowed and planted in the fall. The field is corrugated once after planting. The crop is harvested and hauled to storage by a custom operator in July. Fertilizer is applied by a custom applicator before planting in the fall and again in the spring. A post emergence two way tank mix herbicide



Table 1. 2009 Irrigated Soft White Winter Wheat Southwestern Idaho.

Final  
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Item	Quantity Per Acre	Unit	Price or Cost	Value or Cost/Acre
<b><u>Ownership Costs:</u></b>				
				\$1.25
				\$51.00
				\$175.00
				\$15.00
				\$30.00
<b>Total Ownership Costs</b>				\$272.25
<b>Ownership Costs per Unit</b>				\$2.09
<b>Total Costs per Acre</b>				\$638.53
<b>Total Cost per Unit</b>				\$4.91
Returns to Risk				-\$47.03

Notes:

<b><u>Breakeven Analysis:</u></b>	- 10%	Base Yield	+ 10%
<u>Price</u>	117	130	143
Operating Cost Breakeven	\$3.13	\$2.82	\$2.56
Ownership Cost Breakeven	\$2.33	\$2.09	\$1.90
Total Cost Breakeven	\$5.46	\$4.91	\$4.47
		Price	\$1.90



Table 4. Ranging Analysis

Net Returns Per Acre Above Operating Costs For Wheat: Sww  
Yield (bu/acre)

	91.00	104.00	117.00	130.00	143.00	156.00	169.00
3.19	-69	-30	9	48	87	127	166
3.64	-28	17	62	107	152	197	242
4.10	14	65	116	167	218	269	319
4.55	55	112	168	225	282	339	396
5.01	97	159	222	285	348	410	473
5.46	138	206	275	343	412	481	549
5.92	179	254	329	403	478	552	627

Net Returns Per Acre Above Cash Costs For Wheat: Sww  
Yield (bu/acre)

	91.00	104.00	117.00	130.00	143.00	156.00	169.00
3.19	-290	-251	-212	-173	-134	-95	-56
3.64	-249	-204	-159	-114	-69	-25	20
4.10	-207	-157	-106	-55	-4	47	98
4.55	-167	-110	-53	4	61	117	174
5.01	-125	-62	1	64	126	189	252
5.46	-84	-15	54	122	191	259	328
5.92	-42	33	107	182	257	331	406

Net Returns Per Acre Above Total Costs For Wheat: Sww  
Yield (bu/acre)

	91.00	104.00	117.00	130.00	143.00	156.00	169.00
3.19	-341	-302	-263	-224	-184	-145	-106
3.64	-300	-255	-210	-165	-120	-75	-30
4.10	-258	-207	-156	-105	-54	-3	48
4.55	-217	-160	-104	-47	10	67	124
5.01	-175	-113	-50	13	76	139	201
5.46	-134	-66	3	72	140	209	277
5.92	-92	-18	57	131	206	281	355

The practices and chemicals specified in this publication are based on survey information representative of typical operations. They are not recommendations. ALWAYS read and follow the instructions printed on the pesticide label. Due to constantly changing pesticide laws and labels, some pesticides may have been cancelled or had certain uses prohibited. Use pesticides with care. Do not use a pesticide unless both the pest and the plant, animal or other applicable site are specifically listed on the label. Store pesticides in their original containers and keep them out of the reach of children, pets and livestock. To simplify information, trade names have been used. No endorsement of named products is intended nor is