Hard Red Spring Wheat and Durum Wheat Production Guide (continued)

A-1050, May 1998

Disease Management in HRS and Durum Wheat (continued)

Seed treatment

Chemical	Dosage (Formulations/ bu or cwt)	Disease Control[1] Loose Smut	Seedling Blights	Common Root Rot	Remarks
Benomyl					
Benlate	1-2 oz/bu	G-E	—	No	To be used in conjunction with a standard seed protectant.
Captan + Thiabendazole					
Agrosol Flowable	1.5 fl oz/bu	No	G-E	No	
Carboxin					
Vitavax 34	2-3 fl oz/cwt	E	(G)	No	
Carboxin + Captan					
Nu-Gro Captan 20 Carboxin 20	4 oz/cwt	E	E	No	
Seed Mate Captan -	4 oz/cwt	E	E	No	

Vitavax 20-20					
Enhance	4 oz/cwt	E	E	No	
Carboxin + Maneb					
DB-Green + Vitavax	2 oz/bu	E	E	No	DB Green + Vitavax and Enhance Plus contain 18.75% No lindane insecticide.
	Enhance Plus	2 oz/bu	E	E	
Carboxin + Thiram					
Vitaflo 280	5 oz/cwt	E	E	No	
Vitavax 200 Flowable	3-4 fl oz/cwt	E	(E)	No	
RTU-Vitavax-Thiram	5-6.8 fl oz/cwt	E	(E)	No	
Vitavax-T-L	5 -6.8 fl oz/cwt	E	(E)	No	
Vitavax Thiram Lindane	5 fl oz/cwt	E	(E)	No	Vitavax-T-L contains 8% lindane insecticide
Carboxin + Imazalil + Thiabendazole					
Vitavax Extra	3 fl oz/cwt	E	E	G-E	Also controls seed borne Septoria nodorum. Do not graze or feed livestock on treated acres for six weeks after planting.
RTU Vitavax Extra	5 fl oz/cwt	E	E	G-E	
Difenoconazole + Mefenoxam					
Dividend 32.8%	0.25 + 0.0425 fl oz/cwt	G	G	No	Do not graze until 55 days after planting. For commercial or on-farm use. Do not plant any crop other than wheat within 30 days in fields fields in which seeds were planted
Apron XLLS 33.3%	0.5 + 0.0425 fl oz/cwt	E	G-E	G	
Twin-Pak	1.0 + 0.0425 fl oz/cwt	E	G-E	G	
Dividend Xl RTA	2.5 fl oz/cwt	G	G	No	
	5 fl oz/cwt	E	G-E	G	
	10 fl oz/cwt	E	G-E	G	
Imazalil					
Agsco Double R	0.5-0.8 fl oz/bu	No	G	G-E	May be used with other fungicides. If used in combination with seed treatment products that contain lindane, treated seed should be planted as soon as possible. Do
Flo-Pro IMZ Flowable	0.25-0.5 fl oz/cwt	No	G	G-E	

Nuzone 10 ME	0.8-1.5 fl oz/cwt	No	G	G-E	not graze or feed livestock on treated acres for six weeks after planting.
Mancozeb					
Dithane WSP	1.3-2 oz/bu	No	G-E	No	Grain Guard Plus contains 18.75% lindane insecticide
Dithane ST	2-3.2 oz/bu	No	G-E	No	
Grain Guard	2 oz/bu	No	G-E	No	
Grain Guard Plus	2 oz/bu	No	G-E	No	
Manzate 200 DF	1.3-2 oz/bu	No	G-E	No	
Maneb					
Agsco DB Green		No	G-E	No	All combined with 18.75% lindane for wireworm control.
Granol NM	2 oz/bu	No	G-E	No	
Trinox, or Seed	(1.5 oz/bu Trinox)	No	G-E	No	
Mate Maneb-Lindane		No	G-E	No	
Agsco DB-Green L	3 fl oz/bu	No	G-E	No	Contains 8.6% lindane insecticide.
Maneb + Thiabendazole					
Granox Plus	1 oz/bu	—	G-E	No	
Metalaxyl + PCNB + Carboxin					
Prevail	3 oz/bu	E	E	No	For protection against smuts, Pythium and Rhizoctonia seedling disease complex.
PCNB (Terraclor)					
Terra-Coat LT-2N	2 fl oz/bu	No	G-E	No	
RTU-PCNB	3 fl oz/cwt	No	G-E	No	
PCNB Seed Coat	2 oz/bu	No	G-E	No	
Tebuconazole + Thiram					
Raxil-Thiram	3.5-4.6 fl oz/cwt	E	G-E	G	Do not graze wheat for 31 days after planting.
Thiram					
42-S Thiram	2 fl oz/bu	No	G-E	No	

Thiram 50WP	3.3 oz/cwt	No	G-E	No	
Thiram + Thiabendazole					
Agrosol T	6.6 fl oz/cwt	No	G-E	No	
Triadimenol					
Baytan 30F	0.75 fl oz/cwt for control of smuts 1.5 fl oz/cwt for control of seed borne glume blotch and for suppression of take-all, common root rot, 1.5 fl oz/cwt for early season foliar diseases	E	G-E	(G-E)	For use only through commercial seed treaters. Green forage may be grazed 40 days after seeding. Baytan 30 treated seed should not be planted at depths greater than 1►". Baytan 30 cannot be used in combination with any seed treatment insecticide such as Lindane.

1 P = Poor; F = Fair; G = Good; E = Excellent; N = No Control; ( ) = Not registered for the disease;
— = No Data

Foliar sprays.

		Disease Control[1]				
Chemical	**Dosage (Formul-ations/A)**	**Leaf[2] Spots**	**Leaf Rust**	**Stem Rust**	**Powdery Mildew**	**Remarks**
Benomyl						
Benlate	0.5 lb/A	—	—	—	G	Section 2 (ee) label issued or North Dakota for suppression of Fusarium head scab. Apply during the early lowering period for scab suppression. Do not apply within 21 days of harvest.

Copper						
Champion WP	1.5-2 lb/A	F-G	(G)	—	No	
Champ Formula	2 1-1.33 pt/A	F-G	(G)	—	No	
Kocide 101	1.5-2 lb/A	F-G	(G)	—	No	
Kocide 2000	1.25-1.5 lb/A	F-G	(G)	—	No	
Kocide DF	1.5-2 lb/A	F-G	(G)	—	No	
Kocide LF	1.33-2.66 pt/A	F-G	(G)	—	No	
Mancozeb						
Dithane DF	2.1 lb/A	G-E	E	(G-E)	No	Do not make more than 3 applications of mancozeb. Do not apply within 26 days of harvest. 0.75 to 1 quart rate of Dithane F45, or o lb rate of Dithane DF or Manzate 200 DF is covered by Section 2 (ee) label for ND, for use at tillering stage.
Dithane F-45	1.6 qt/A	G-E	E	(G-E)	No	
Dithane WSP	2 lb/A	G-E	E	(G-E)	No	
Manzate 200 DF	1-2 lb/A	G-E	E	(G-E)	No	
Penncozeb 80%	1-2 lb/A	G-E	E	(G-E)	No	
Penncozeb DF	1-2 lb/A	G-E	E	(G-E)	No	
Mancozeb + Copper						
Mankocide	2-2.66 lb/A	G	—	—	No	Do not apply within 26 days of harvest.
Propiconazole						
Tilt 3.6E Tilt Gel	2-4 fl oz/A	G-E	E	G-E	E	Apply at flag leaf emergence. 2 (ee) label permits use of 2-4 fl oz/A earlier in season, if disease symptoms appear. Do not apply after heads have emerged. Do not use more than 4 fl oz/A per season. Do not graze or feed livestock treated forage or cut green crop for hay or silage. After harvest, straw may be used for bedding or feed.
Triademfon						
Bayleton DF	2-6 oz/A	P	E	E	E	1-2 applications; do not apply over 16 oz/A; do not apply within 21 days powdery of harvest. Registered for

						Septoria mildew leaf blotch. If leaf blotch is severe 4-8 oz/A it is recommended that Bayleton rusts, Septoria be tank mixed with another leaf blotch registered fungicide with good activity against this disease.
Sulfur						
Sulfur DF	6-15 lb/A	—	—	—	G	Do not apply when temperatures are high (above 90 F). For powdery

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[2] Leaf spots include tan spot, Septoria leaf blotches and spot blotch.

[CONTINUE] [INDEX]

A-1050, May 1998

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