

Table 15. Seedling reactions of entries in the 1995 Southern Regional Performance Nursery to leaf rust and tan spot. Data provided by R.M. Hunger and W.C. Siegerist, Oklahoma State University, Stillwater, OK.

C.I. OR SEL. NO.	ENTRY: NO	Seedling LR reaction			Tan spot reaction		
		Race 1	Race 2	Bulk	Rep 1	Rep 2	Rep 3
KHARKOF	1	3	3	3+	2	2	3
SCOUT66	2	3c	3	3	3	3	3
TAM-107	3	3	3+	3	4	4	4
HBZ374C	4	3+	3	3	3	3	3
OK91P648	5	3	X3-0;	3	3	2	3
OK93P735	6	X3c0;	X30;	X0;3-	3	3	3
OK93P656	7	3c	3	3	2	2	2
OK93P727	8	3+	3+	3	4	3	4
TX91D6913	9	3	3	3	4	4	4
TX91D6991	10	3	3	3+c	2	2	2
TX90V6313	11	3	3+	3+c	3	3	4
TX92V4135	12	3	3	3+	2	3	3
HBE0726-1	13	X30;	0;	X0;3-	2	2	2
TX92V3108	14	3-	3cn	3-c	3	3	3
HBI0531-A2	15	3	3	3+	3	3	4
TX93V5919	16	3	3	3+	1	1	2
TX93V5922	17	3	3-c	3-c	3	3	3
TX93V4927	18	3	3	3-	2	2	2
TX92V2519	19	3	3+	3-c	3	3	3
CO890323	20	3+	3	3+	2	2	2
CO900166	21	3+	3+	3+	3	3	3
KS92PO263-137	22	3	3	X0;3-c	3	3	3
KS93U206	23	0;	0;	0;	3	3	3
KS91H153-2	24	X30;	3	3-cn	4	4	4
N931058	25	3	3	3	3	4	4
NE91651	26	3=cn	X0;3-n	X0;3-c	3	3	3
NE90476	27	3=cn	3-n	X0;3-c	4	4	4
NE92458	28	3c	3-n	3-c	3	3	3
NE92614	29	3	3-nc	3+	3	3	2
NE92646	30	3	3c	3c	4	4	4
XH1706	31	3	X0;3-n	X0;3	3	3	3
XH1752	32	3c	3-c	3-c	4	4	4
XH1778	33	0;	0;	0;	4	4	3
XH1798	34	3c	X0;3-	X0;3-	4	3	3
W91-091	35	X0;3=n	0;	3	4	3	3
W91-287	36	3-	X0;3=	3-c	4	3	3
AP 7501	37	3-	X0;3=n	X0;3-c	4	4	3
WX92-0408	38	3	X0;3-n	X0;3-	3	2	2
WI89-163W	39	3	3	3c	4	4	4
WI90-540W	40	3	3-c	3+	2	2	1
W88-2619W	41	3	3+	3	4	3	4
T702	42	3c	3+	3	4	3	3
T834	43	3c	3	3	3	3	3
T812	44	3	X3-0;	3-c	4	4	4
T861	45	3	3	3	3	3	3

Avirulence/virulence formulas of races used in the seedling test were:  
Race 1 = 2a 3ka 9 16 19 / 1 2c 3 11 17 24 26 30; Race 2 = 2a 3ka 9 16 19  
26 30 / 1 2c 3 11 17 24; Bulk (urediniospores collected from 'Vona',  
'Chisholm' and 'Danne') = 9 16 19 26 / 1 2a 2c 3 3ka 11 17 24 30.  
Leaf rust reactions were obtained using Stakeman's system (USDA Bull.  
#E617, 1962, 53 pp) of coding rust reaction.

Seedlings were inoculated with equal numbers of conidia obtained from  
three isolates of *Pyrenophora tritici-repentis* at a final concentration of 2000  
conidia/ml. Seedling reaction to tan spot was rated as 1=small (1-2 mm),  
dark lesions with no or little chlorosis, 2=lesions 2-3 mm with some  
chlorosis, 3=lesions 2-3 mm with extensive chlorosis, and 4=lesions >3  
mm with coalescing chlorosis and/or necrosis. A reaction of '1' typically  
occurred on 'Red Chief' checks, and a reaction of '4' typically occurred on  
'Tam-105' checks.