the main benefit of the cultivars in this trial would be to provide a supply of quality apples until traditional fall apples are harvested. When selecting early season apples, in addition to evaluating their quality and productivity, growers are encouraged to also consider their sensitivity to fire blight, as significant differences occur as illustrated by this report.

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Relative Susceptibility of Certain Peach Cultivars to Summer Infection of Leaf Curl

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Peach and nectarine trees planted at Northwestern Washington Research and Extension Center, Mount Vernon, including some 40 different cultivars, suffered an unusual infection of peach leaf curl (Taphrina deformans) in the summer of 1986. The infection occurred as a consequence of a severe rainstorm on July 16, which resulted in nearly 1½" of rainfall in a 24-hour period. The onset of the infection was not anticipated and so no preventive spray had been applied. The range of susceptibility shown by the different cultivars (Table 1) thus gives a fair indication of those cultivars with some degree of natural resistance, at least to summer infection under conditions similar to those described above.

It is curious to note that a cultivar like the 'Cole' seedling, which has a very high resistance to the early spring infection of leaf curl, was considerably more susceptible (40%) to the summer infection. Other cultivars, e.g. 'Velvet' and 'Stark Sweet Melody' often show moderate to severe susceptibility to the early infection of leaf curl but remained relatively unaffected by the summer infection. Differences in leaf physiology between the early and the mature leaf, or the weather conditions

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Table 1. Peach leaf curl, summer infection—August 1, 1986.

	Percent New Leaves Infected After July 16, 1986 Storm		
Cultivar	% Leaf Curl	Cultivar	% Leaf Curl
Five Star	02	Independence nectarine	60
Pocahontas nectarine	05	Harbelle	63
Stark Sweet Melody	05	Stark Earliglo	65
Frost LCR Selection*	08	Golden Monarch	70
Velvet	10	Redhaven	70
Stark Sensation	10	Stark Crimson Gold	70
Stark Honeyglo	10	Sunshine	70
Veteran (planted 1986)	10	Topaz	70
Canadian Wonder	20	Vanity	75
Flavorcrest (planted 1986)	20	Ranger	75
Rosy Dawn	25	Stark Early Loring	77
Western Pride	30	Ruby Grand nectarine	80
Early Redhaven	30	Harko nectarine	80
Cherokee nectarine	37	Conrad LCR Selection	80
Cole LCR Selection	40	Roza	80
Herb Hale	40	Candor	90
Champion	40	Waverly	90
Honey Babe	50	Early Glory	90
Garnet Beauty	50	Zachary Taylor	90
Bellaire	60	Princes Anne	100
Harken	60	Vivid	100

*LCR Selection—Leaf curl resistant selections being evaluated at Northwestern Washington Research and Extension Center, Mount Vernon, Washington.

at some specific stage of leaf development, may account in part for this variable resistance.

Figures in Table 1 are averaged where more than one specimen of a given cultivar was observed, but in some cases this obscures differences in degree of infection between trees of the same variety planted in different locations. One tree of 'Champion,' for example, had only 10% of its leaves infected in one block, while another tree in a different area had 70% infected leaves. 'Rosy Dawn' in one location rated 5% infected leaves; in another block it rated 40%. Also, some cultivars that showed unexpectedly low levels of infection (e.g. 'Veteran,' 'Flavorcrest') were newly planted (spring 1986) trees. This suggest that differences in the amount of inoculant present in the surrounding environment may have an effect on the degree of infection.

However, taking the above into consideration, Table 1 still suggests a range of susceptibility that is useful as a guide for those seeking to grow peaches with some resistance to leaf curl infection.