Soil erodibility by wind is directly related to the percentage of dry nonerodible surface soil aggregates larger than 0.84 mm in diameter. From this percentage, the wind erodibility index (I-factor) is determined. The I-factor is an expression of the , stability of these soil aggregates against breakdown by tillage and abrasion from wind erosion. Soils are placed in Wind Erodibility Groups (WEG) having similar percentages of dry soil aggregates larger than 0.84 mm as shown in the following table.

Table 1 - Descriptions of Wind Erodibility Group (WEG)

WEG	Properties of Soil Surface Layer	Dry Soil Aggregates >0.84mm Percent	Wind Erod Index T/Ac/Yr
1	Very fine sand, fine sand, sand, or coarse sand.	1	310
2	Loamy very fine sand, loamy fine sand, loamy sand, loamy coarse sand, or sapric (1) organic soil materials.	10	134
3	Very fine sandy loam, fine sandy loam, sandy loam, or coarse sandy loamy.	25	86
4	Clay, silty clay, noncalcareous clay loam, or silty clay loam with >35 percent clay content.	25	86
4L	Calcareous loam, silt loam, clay loam, or silty clay loam.	25	86
5	Non calcareous loam and silt loam with <20 percent clay content, or sandy clay loam, sandy clay, and hemic (1) organic soil materials.	40	56
6	Noncalcareous loam and silt loam with >20 percent clay content, or noncalcareous clay loam with <35 percent clay content.	45	48
7	Silt, noncalcareous silty clay loam with >35 percent clay content and fibric (1) organic soil material.	50	38
8	Soils not suitable for cultivation due to coarse fragments or wetness; wind erosion is not a problem.	--	--

(1) See Soil Taxonomy for definition.

For areas on slopes less than 500 feet long facing into prevailing wind, the I value is to be increased as shown in Table 2. The adjustment applies only if the change in slope rises 3 percent or more. In some areas, virtually all wind erosion problems relate to knoll erodibility. Also, under many tillage systems, wind erosion is controlled except on knolls. As the upper third and crest of the knoll begins to erode, saltation may continue downwind across the field. Therefore, knoll erodibility may be affecting erosion over a high percentage of a field although only a small percent may actually be knolls.

TABLE 2 - Knoll Erodibility I Correction Factor

Knoll Facing Wind; Rise in Percent Slope (along Prevailing wind erosion direction)	I Value Adjustment for knoll (Multiply)
3	1.3
4	1.6
5	1.9
6	2.3
8	3.0
10	3.6
10 - 15*	2.0
15 - 20	1.4
20+	1.0

* Factors above 10 percent are SCS estimates.

If the distance a to c is less than 500 feet and the field upwind of point a is flat, consider the change in slope to be the slope of the bc segment. If the distance a to c is greater than 500 feet but the distance b to c is less than 500 feet, consider the change in slope to be the difference between the ab slope and the bc slope.

Example: For a very fine sandy loam soil on a 4 percent rise in steepness of slope facing the wind, multiply the I value of 86 Tons/Ac./Yr. by 1.6 = 138, the corrected I for this site. (Round to 134 for the nearest available E table.)