

# Refresher Course: Iowa's CSR Index

Longtime readers of *LandOwner* know we have written about Iowa's CSR index many times. But, new readers frequently ask about the CSR and its meaning. This happens often enough that we've made this story a regular annual feature. So, with apologies to longtime readers, here's our refresher course on the CSR.

**“CSR = Corn Suitability Rating.** It is an index developed by Iowa State University to rate each different soil for its potential to produce corn. It is based on soil properties, average weather and the inherent potential of each kind of soil. The CSR also assumes:

- adequate management;
- natural weather conditions, hence no irrigation;
- artificial drainage where required;
- soils not affected by frequent floods;
- no land leveling or terracing.

The CSR for any field or farm can be modified by sandy spots, rock outcroppings, field boundaries, wet spots and other special soil conditions.

The index provides a relative ranking of all soils in the state based on their potential to produce corn. As such, the index can be used to rate one soil's yield/production potential against another over a period of time.

It is an intricate rating system that covers all of the approximate 400 soil types in the state plus the more than 1,600 soil map units. A soil type is the name of the soil, such as Clarion loam. A soil map is the soil type plus slope and any other key features — for example: Clarion loam, 5% to 9%, slope, moderately eroded. Latitude and longitude are also included.

The top rating of the index is 100 — a CSR of 100 would be the absolute ideal type of land for growing corn. We are not aware of any land that carries a 100 CSR, but we can't rule out the possibility that some spots of CSR 100 land do exist. Usually when we look at whole farm CSRs, the highest we see are in the low 90s. That's because most farms have a waterway or shallow draw somewhere with at least a little bit of slope — factors that reduce the index.

**How to use the CSR.** You can use a farm's CSR three ways. First, you can use it to compare two pieces of ground. Second, you can compare the farm's CSR versus the county average to see how the farm compares to all the farms in the county. The map above, provided by Iowa State University, shows the average CSRs by county.

Notice that those highly productive counties in north-west Iowa do not average the same CSR as the counties in central Iowa. While you may argue the soils in the north-

