

Estimated weekly crop water use for field crops in Michigan (in/week)					
Week of August 19 - 25					
Crop	Growth stage	Constantine		Entrican	Hart
Corn	Silk, Blister, Dough, Begin dent	1.27		1.22	1.27
	Full dent	1.15		1.11	1.15
	Black Layer	0.76		0.73	0.76
Soybeans	R2 Full bloom	1.27	1.22	1.27	
	R3 and R4 Begin pod/Full pod	1.27	1.22	1.27	
	R5 and R6 Begin seed/Full seed	1.27	1.22	1.27	
	R7 Begin Mature	1.15		1.11	1.15

This week, no major rainfall events were observed, and soybeans at the R5 and R6 stages, as well as corn in the dough and dent stages, will continue to have high water use. The goal for soybean irrigators should be to maintain at least 50% of the available soil water until most pods have yellowed (R8). Corn producers aiming to maximize test weight during dry late-summer conditions should similarly maintain at least 50% of soil water capacity until the crop reaches black layer. Typically, late August weather eases irrigation demands, requiring minimal water to achieve these goals. However, be mindful of disease risks-such as white mold in soybeans and tar spot in corn- that can be increased by prolonged plant moisture. Make sure that any additional irrigation offers benefits that outweigh the increased disease risk. Several tools are available to help schedule irrigation, which can be found in the [Irrigation Scheduling Tools - Factsheet #3](#).

The table above presents estimated crop water use for various field crops across three locations in Michigan. This data helps irrigation management decisions by showcasing potential crop evapotranspiration, calculated based on reference evapotranspiration and crop coefficients for each crop growth stage. It is crucial to note that crop water use values vary across regions due to differences in weather conditions, growth stages, agronomic practices and soil properties.

When using these values for irrigation scheduling, be mindful that they assume all applied irrigation water will be utilized by the plants without any loss. Also, these values do not account for any precipitation during the calculation week. For more tools and information on irrigation scheduling tools, please refer to: [Irrigation Scheduling Tools](#).

Reference evapotranspiration data was obtained from Enviroweather, which also offers a model for determining potential crop evapotranspiration. To access this tool, visit [Enviroweather](#), click on "Crops," select your crop and use the potential evapotranspiration tool by choosing your nearest weather station, the latest date of interest and other crop information.