

National Crop Monitoring and Yield Estimation Project,) Crop Monitoring and Yield Estimation of Maize on the Menemen Plain

Research Area	A 13 Soil Water Resources and Environment
Research Program	P07
Executive Institute	TAGEM
Supporting Institute/s	TAGEM, Nevşehir HBV Uni.
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Project Summary:

Increasing demand on agricultural products and dependence of agricultural production on the environmental conditions necessitate monitoring of crop production. Remote sensing makes easy the determination of input use efficiency and crop yield estimation in agriculture. In this project, soil management, cultivation and grain and biomass yields of maize, one of which is the most common crops on the Menemen Plain, will be studied during a 3 years' period. The potential yield of the region will be estimated by crop models, Hybrid-Maize and AquaCrop. Realized yields will be estimated by the models and analysis of satellite images. Soil characteristics and cultivation practices will be evaluated. Yield gap between potential yield and realized yield will be evaluated to establish attainable yield levels. At the end, potential of remote sensing and the crop model analysis will be determined for the crop area and crop yield estimations.

Key Words: Yield estimation, Crop Monitoring, Hybrid-Maize, AquaCrop, remote sensing