Organic Production of Vegetable and Herb Transplants.

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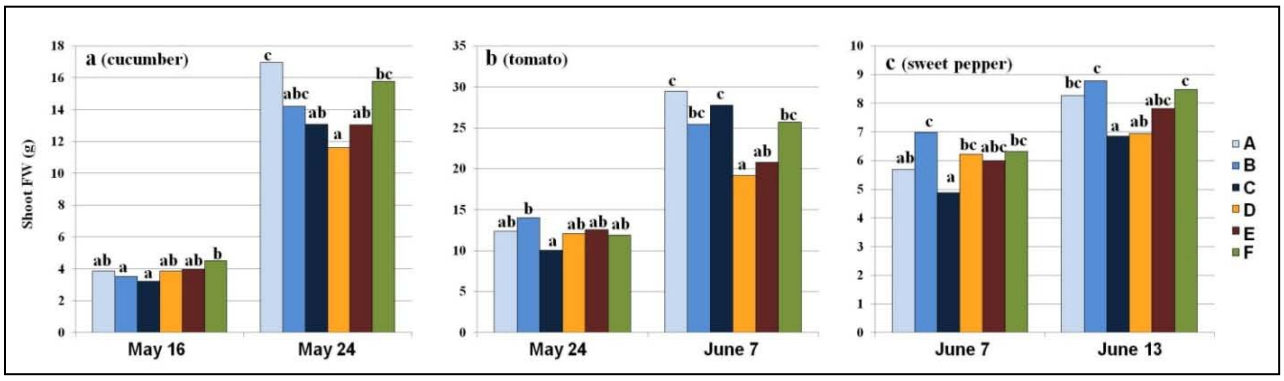
Background :

Demand for organic vegetable transplants, whether coming from vegetable growers or home gardeners, has increased significantly in Canada. As growth of seedlings is highly affected by substrate physical properties, elaborating an adequate fertilisation based on solid amendments is crucial to obtain quality transplants. A project was undertaken at Jardinerie Fortier to develop an organic greenhouse production system for vegetable and herb transplants.

Project Overview:

Six solid fertilizations were tested: A complete fertilizer recipe consisting of crab meal, kelp meal, compost, bat guano and feather meal (A: 50%, B: 100% and C: 150% of recommended concentrations); D: crab meal and kelp meal only; E: crab meal, compost and kelp meal only; F: crab meal, kelp meal, compost, and feather meal only. Two plant evaluations were done for each plant type (11 to 39 days following transplanting). Each time, plant quality and biomass were evaluated. Plant biomass tends to decrease with an incomplete fertilizer recipe, with treatment B having the lowest biomass accumulation. Fertilization A, B and C resulted in a similar biomass for all three species.



Conclusions:

These results showed that half of the concentration of the complete fertilizer recipe resulted in quality vegetable transplants. Most significant differences were observed when plants had reached marketability when solid fertilizers were becoming sparse.

Acknowledgments: This research was funded through Canada's Organic Science Cluster, which in turn was funded by the Canadian Agri-Science Clusters Initiative of Agriculture and Agri-Food Canada's Growing Forward Policy Framework and its industry partner, La Jardinerie Fortier, QC. We are grateful to Jonathan Fortier who has conducted all trials at the commercial experimental greenhouse facility.