HYDROPONIC INTENSIVE WORKSHOPS

at the Controlled Environment Agriculture Center

October 2018

Lettuce Workshop
October 12-15, 2018

Controlled Environment Agriculture Center
1951 East Roger Road, Tucson, AZ 85719

College of Agriculture and Life Sciences
CONTROLLED ENVIRONMENT AGRICULTURE CENTER
October 12\textsuperscript{th}, 8:30am – 6:30pm

Introduction

Tour of CEAC Campus & Analysis of Structures & Systems

Common Questions

Greenhouse Basics
- Greenhouse site selection
- Greenhouse designs & materials
- Environmental control – including sizing heaters & fans

“Greening the Greenhouse”
- Resource use Optimization

Certifications & GHP / GAP
- GHP / GAP
- Certified Naturally Grown, Organic, and other labels
- Audits, check-ups, and maintenance of certifications

*Light Breakfast Provided*

* Lunch provided *
October 13\textsuperscript{th}, 8:30am – 6:30pm
8:30am - Coffee & Previous Day Discussions

* Light Breakfast Provided*

Deciphering your greenhouse – “Virtual Grower”
• Projecting heating costs
• Forecasting performance

Crop registration forms
• Data collection and measurements

Environmental control & system maintenance & monitoring
• Set-points and setup
• Monitoring methods
• System maintenance
• Plant/Environment Relationships
• Real-time monitoring – CEAC/tomatoes live

* Lunch Provided*

Propagation
• Substrate choices and starting materials
• Seeds and seeding
• Germination conditions
• Scheduling

Plant protection (Chapter 4)
• Introduction to the pests: Insects, Mites & Diseases
• Integrated pest management (IPM)
• Control approaches
October 14th, 8:30am – 6:30pm
8:30am - Coffee & Previous Day Discussions

IPM, Disease, and Deficiencies
• Common pests and treatment procedures
• Diseases common to production
• Nutrient deficiencies

Growing Lettuce
• Nutrition
• Spacing and layout
• Crop maintenance and monitoring
• Harvesting

*Light Breakfast Provided*

Post-harvest & Food safety
• Post-harvest procedures
• Packaging, storage, and shipment
• Food safety procedures
• Safe production and handling procedures

*Lunch Provided*

October 15th, 8:30am – 6:30pm
8:30am - Coffee & Previous Day Discussions

Economics of production
• Materials costs and consumption
• Operating costs
• Financials

*Light Breakfast Provided*

Business Considerations
• Business planning
• Marketing
• Customers and Selling

*Lunch Provided*