MOLECULAR BIOLOGY AND PLANT PHYSIOLOGY

Agronomy and Physiology Symposium - Carbon Dynamics in Cotton

John L. Snider

Each year at the Agronomy and Physiology Conference of the Beltwide Cotton Conferences, a special symposium is organized that brings together speakers with expertise in a common topic. In the past, speakers from these symposia, along with additional invited experts, have contributed chapters to topical books for The Cotton Foundation Reference Book Series. Recent book examples include Stress Physiology in Cotton (2011), Flowering and Fruiting in Cotton (2012), and Linking Physiology to Management (in press). The special symposium at the 2015 Beltwide Conferences addressed Carbon Dynam-

ics in Cotton, and it was decided at that time to submit a collection of papers on this topic to the Journal of Cotton Science. Consequently, the collection of review articles presented in the current issue addresses photosynthetic carbon acquisition, respiratory carbon losses, translocation of assimilate from source to sink, carbohydrate balance, and carbon partitioning in response to genotype, management, or environment. This special issue brings together physiologists with extensive experience in their chosen review topic and will provide readers with a valuable reference on carbon dynamics in cotton.

Fitzsimons	The Role of Temperature on the Diurnal Sucrose Source to Sink Balance
Grantz	Ozone Impacts on Carbon Dynamics in Cotton
Holaday	Effects of Chilling Temperatures on Photosynthesis
Mauney	Carbon Allocation in Cotton Grown in CO ₂ Enriched Environments
Pettigrew	Cotton Photosynthetic Regulation through Nutrient and Water Availability
Wells	The Use of Obsolete and Modern Cultivars to Examine Advances in Yield and Dry Matter Partitioning