Good Agricultural Practices for Producing a High Quality Peanut Product

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Components of Good Agricultural Practices

- Soil Management, Fertility, & Tillage
- Agronomics
- Pest Management
- Harvest
Soil Management, Fertility, & Tillage

• Select loamy sand or sandy loam soil with minimal slope to prevent erosion
• Take soil sample to determine soil pH and nutrient levels – adjust according to soil test recommendations
• Prepare land to provide seed bed for maximum seed to soil contact
• Conservation, or reduced, tillage works well for peanut, if done right
Soil Management, Fertility, & Tillage

• pH should be 6.0-6.5, add lime if below 6.0
• Make sure there is adequate calcium in top three inches of soil for proper seed development
  – “Pegging Zone” sample taken at plant emergence
• Boron, a micronutrient, should be applied just prior to or immediately after bloom initiation (about 35 DAP) for proper kernel development
• Monitor zinc (toxicity) and manganese (def)
Agronomics

- Rotation
  - Peanut in same field a minimum of once every three years
  - Grass crops (corn, grain sorghum) work best, cotton also works well
  - Avoid planting peanut following peanut or soybean
- Plant high quality seed – preferably from a seed certification program
- Select cultivars with known performance – information from variety testing program
Agronomics

• Plant 2-2.5 inches deep into well prepared seed bed with adequate moisture
• Planting date – varies from region to region, but in the SE, typically during May
  – Soil temperature is critical for seed germination and plant emergence, must be above 65°F
• Plant population – plant 6 seed per foot of row, with goal of 4 healthy plants per foot
• If planted under irrigation, use one of several research-based irrigation strategies
  – Peanut needs 2 inches of water per week during critical pod development through pod fill and seed maturation stages (weeks 10-17)
Weed Management

• Grasses and Broadleaf weeds
• Herbicides are best line of defense
  – Pre-plant incorporated (PPI)
  – Pre-emergence (after planting, but before crop emerges from soil)
  – Post-emergence (anytime after crop emergence)
• One excellent way to manage weeds in a peanut crop is by controlling them in the rotational crops preceding the peanut crop
Disease Management

- Foliar and soil-borne diseases
- Growing conditions in the SE favor disease development
- A long rotation minimizes disease pressure
- Good cultivar options with improved disease resistance, opportunity to reduce fungicide applications
- Peanut Rx is a tool producers can use to maximize disease control
Insect Management

• Thrips are a problem every year – producers must use a control strategy at planting
  – This insect transmits tomato spotted wilt virus
• Foliage feeding insects and those that feed on the pods
• Management of foliage feeding insects is based on economic thresholds
• Control of soil insects is more challenging
• IPM, or scouting, is best strategy
Nematode Management

• Microscopic, worm-shaped “critters” that feed on root system and/or pods
• Peanut root-knot nematode is most serious of numerous species
• Tifguard cultivar has very high level of resistance to PRKN
• Nematodes are a serious problems on many of the sandier fields in SW Georgia
• Rotation helps dramatically in reducing nematode numbers
Harvest

• Use Hull-Scrape Maturity Profile Method for determining optimum maturity
• Clean all equipment prior to entering a field
  – Clean out all debris from combine from previous year’s harvest
• Make sure drying wagons (trailers) are clean of all debris
• Run digger-shaker-inverters and combines at manufacturers recommended ground speed and RPM
Bottom Line

• Peanut producers in Georgia are educated on good agricultural practices for peanut via the University of Georgia Cooperative Extension County Agents
  – Peanut production publications
  – Grower meetings with pesticide applicator license re-certification
  – Field days

• We have the tools to produce and market a high quality peanut crop
Southern Peanut Growers

Southeastern Peanuts – The Flavor Standard!