



## SUMMARY TRIAL REPORT

# The Use of TerraCottem<sup>®</sup> Universal in the cultivation of *Azalea indica*

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Research done at:

**Belgian Experimental Station for Ornamental Plants – PCS**

Mr. **Eric Beel**, Head of Research

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This report illustrates how TerraCottem<sup>®</sup> enhances plant growth and subsequently increases the plants' market price. By mixing TerraCottem<sup>®</sup> Universal with the soil the plant's average crown diameter increased from 30cm to 35cm, raising the wholesale price from € 3.30 to € 4.78 per plant.

### 1. SET - UP

Cuttings of the plant species *Azalea indica* (in total 2700) were planted in October 1993. Three cuttings per application were planted in 11cm diameter pots and filled with white peat. Three irrigation regimes were tested (11, 14 and 17 MJ/m<sup>2</sup>), as well as 3 application rates of a slow release fertiliser (0, 2 and 4 kg/m<sup>3</sup>) and 3 application rates of TerraCottem<sup>®</sup> Universal (3, 6 and 10 TC kg/m<sup>3</sup>). The crown diameter (CRDM) was measured after 1 year (October 1994). The CRDM determines the economical value of the plants.



### 2. RESULTS

- The best plant growth was observed for the highest irrigation regime (11 MJ/m<sup>2</sup>)
- The use of TerraCottem<sup>®</sup> Universal has a positive effect on the CRDM of *Azalea indica*
- The addition of slow release fertiliser has a negative influence on plant development

### 3. COST-BENEFIT ANALYSIS

(calculation based on the crown diameter and export prizes of *Azalea indica* for the 94-95 season)

#### Without TerraCottem® Universal

Irrigation frequency: 11 MJ / m<sup>2</sup>  
Fertilization: 2g of Osmocote 10-12 M / litre potting soil  
€ 1.98 per kilogram or € 0.0039 per litre potting soil  
Mean crown diameter: 31.9 cm  
Size: 30  
Breeder price: € 3.30 per plant

#### With TerraCottem® Universal

Irrigation frequency: 11 MJ / m<sup>2</sup>  
TerraCottem: 6g of TerraCottem/ litre potting soil  
€ 6.94 per kilogram or € 0.04 per litre potting soil  
Fertilization: 0g of Osmocote 10-12 M / litre potting soil  
- 0.0039 per litre  
Mean crown diameter: 36.4 cm  
Size: 35  
Breeder price: € 4.78 per plant

#### TerraCottem® Universal investment

Cost prize: € 0.04 – 0.0039 = € 0.0377 / litre

#### Extra yield

Breeder prize: € 4.78 – 3.30 = € 1.49 / plant

#### Net profit

€ 1.49 – 0.0377 = € 1.45

### 4. CONCLUSIONS

Mr. Erik Beel: "*The addition of TerraCottem® Universal has a positive effect on the crown diameter of the Azalea. The amount of fertilisers present in TerraCottem® Universal is already sufficient to cover the need for nutrients at the start of the cultivation.*"