



Vegetatively Propagated Conifers for Georgia

Dr. John M. Ruter
 Department of Horticulture - Tifton
 The University of Georgia

Nature of Work: New plants and cultivars are needed to fuel the growth of the nursery industry. Conifers are important landscape plants in many parts of the United States, but have been overlooked in the Southeast. New "screening" material is needed to replace the leyland cypress. In 1997, a conifer evaluation project was initiated at the Tifton campus. Some of the best plants from that trial were vegetatively propagated in December, 2002. Rooted liners were shifted to #1 containers in 2003. On May 12, 2004, plants were shifted into #7 containers at the CANR. The substrate consisted of 6:1 pinebark and sand amended with (in lbs. per cu. yd.) dolomitic limestone (4.0), Micromax (1.5), Gypsum (1.5), Osmocote Pro 18-8-8 (14.0), and Talstar (2.0). Plants were topdressed with Scotts 17-6-8 + minors on August 5 at the rate of 36 g/pot. Final growth measurements were recorded on October 1, 2004. Three replicate plants for each selection were grown.

Results and Discussion:

Final Height (inches) Height:Width ratio

<i>Calocedrus formosana</i>	27	1.1
<i>Calocedrus macrolepis</i>	30	1.2
<i>Cedrus deodara</i> 'Kashmir'	32	2.4
<i>Chamaecyparis obtusa</i> 'Crippsii'	26	1.2
<i>Chamaecyparis obtusa</i> (Dwarf selection)	12	1.4
<i>Cryptomeria japonica</i> 'Araucarioides'	25	1.1
<i>Cryptomeria japonica</i> 'Cristata'	20	1.1
<i>Cryptomeria japonica</i> 'Sekkan'	45	1.5
<i>Cupressus duclouxiana</i>	64	2.3
<i>Cupressus glabra</i> 'Chaparral'	29	2.3
<i>Cupressus himalaica</i>	50	1.8
<i>Cupressus lusitanica</i>	50	1.8
<i>Nageia nagi</i>	32	1.7
<i>Platycladus orientalis</i> (Xian Shan)	53	2.2
<i>Sequoia sempervirens</i> 'Soquel'	37	1.3
<i>Taiwania cryptomeroides</i>	32	1.3
<i>Taiwania flousiana</i>	33	1.7
<i>Thuja occidentalis</i> 'Pumila Sudsworth'	20	1.4
<i>Thuja occidentalis</i> 'Sunkist'	13	1.1

Significance to Industry: This research provides information useful for scheduling the production of ornamental conifers. Many of the selections would require additional growth before being saleable in a #7 container. All conifer selections grew well and there were no disease problems during the growing season. Some of the conifers such as *Calocedrus*, *Cedrus* and *Taiwania* exhibit plagiotropic (horizontal) growth, thus needing staking and demonstrating the importance of cutting position for production. *Cupressus himalaica*, which has pendulous branches, also requires staking. To view mature specimens, arrange to visit the author in Tifton.