

NURSERY/LANDSCAPE

2009 FFA CAREER DEVELOPMENT EVENT

Sponsored by:
Department of Horticulture and Landscape Architecture
Oklahoma State University
Division of Agricultural Sciences and Natural Resources

Contest Superintendent

David Hillock
358 Ag Hall
405-744-5158
david.hillock@okstate.edu

Contest Details

Pre-Registration by 8 am Monday, April 20, is required to participate in this event. (See FFA Nursery/Landscape CDE website (http://www.okstate.edu/ag/asnr/hortla/needham/extension/ffa/ffa_cde.html) for online pre-registration. The FFA instructor will need to indicate at pre-registration which practicum activity has been selected for each of his/her contestants.)

Date: Saturday, April 25, 2009
Time: 8:00 AM
Location: Oklahoma Botanical Garden and Arboretum Educational Center

NEW CDE RULE: Students with cell phones or PDAs during the competition WILL be disqualified.

This event will test students' knowledge of the production and landscape use of ornamental plants. Be sure to check out OSU's Department of Horticulture and Landscape Architecture homepage at <http://www.hortla.okstate.edu> for additional FFA-CDE information, including sample exams and photos for identification! Always consult OCES Fact Sheets, accessible from the web address above, for the most up-to-date information.

Each school may enter only one team, consisting of 3 or 4 members, in this event, and only those schools without a team may enter one or two individuals to compete for individual awards. Only those students who are competing will be allowed to participate in the event. **The score for a team consisting of four members will be calculated from its three highest scoring members' accrued points.** No personal tools or supplies, except for pencils and pens, may be brought to the event unless specified in the event description.

The event will consist of five parts.

All Contestants, whether participating as a team member or individual, will participate in all of the following event components:

- I. General Knowledge (150 points) — This portion of the event will consist of 50 questions addressing content from *Introduction to Horticulture--Second Edition*, published by the Oklahoma Department of Career and Technology Education. Each question is worth 3 points. Questions may be of the multiple choice, true-false, and/or matching format(s). Questions may or may not be written exactly as they are in the core. Although the exam will cover "general horticulture" knowledge, it will focus on nursery/landscape knowledge.
- II. Identification of Plants, Pests, Disorders, Equipment and Supplies (150 points)
 - Plant Identification (75 points) — Each contestant will be required to identify 25 specimens (3 points each) from the Nursery/Landscape Identification list. Contestants will receive an ID Card listing all possible specimens as shown on the attached list. Contestants must place the ID number,

representing the appropriate name, next to the number of the specimen to be identified. Duplicate specimens may be used and may be represented by whole plants, stem cuttings, flowers, and/or a leaf or stem sample.

- Plant Disorder Identification (45 points) — Each contestant will be required to identify 15 specimens (3 points each) from the attached list. Duplicate specimens may be used and may be represented by the actual organism (insect, fruiting bodies from pathogenic fungi, or weeds for example) and/or by symptoms on plant parts such as leaves, stems or roots. When a problem is presented with an affected plant, a “Disorder” label will be with the item to designate identification of the problem rather than the plant.
- Equipment and Supplies Identification (30 points) — Each contestant will be required to identify 10 pieces of equipment from the attached list.

Each Contestant, whether participating as a team member or individual, will participate in only ONE of the following practicum activities:

- III. Practicum (50 points) — In the case of teams, the FFA instructor will have the responsibility of assigning each team member to a different practicum activity. A contestant participating as an individual may choose only one of the practicum activities in which to participate. Only one student from each school will be permitted in a given practicum activity. Each practicum activity will consist of a hands-on task and/or up to twenty-five questions about the practicum activity.

This year’s four practicum activities are as follows:

- A. Verbal Practicum, *Plant Clinic* — The participant will assume the role of an employee in a retail garden center. The participant will address a request for information about identification and treatment of a plant disorder. The pest or problem involved will come from the list used in Phase 3, Section 2 – Identification of Pests & Disorders. A sample of the affected plant may be presented, or the customer may describe the disorder verbally in response to questions by the participant. Each participant will be furnished with a set of specimen labels of common retail-packaged garden chemicals, which may be used to recommend an appropriate treatment. One minute will be provided for review of these materials prior to the customer arrival. Note that non-pesticide treatment may be appropriate or requested in some cases. Seven minutes will be allowed for completion of this practicum. Scoring criteria are presented on the “Verbal Customer Assistance” scorecard, to be recorded by the judge.
- B. Judging — This portion of the contest will consist of judging two classes of four like specimens of balled and burlapped shrubs or trees, containerized shrubs or trees, groundcovers, or bedding plants. Plants will be placed without reasons being given.
- C. Equipment Maintenance — Tools from the list in Phase 3, a part for a tool, and/or an operating manual will be presented with answer choices of possible maintenance needs, corrective actions, and/or operating specifications. Examples of possible choices are low oil, uneven height setting, blade needs sharpening, incorrect gas:oil ratio provided, or replace broken handle. Equipment will be placed to allow observing all components in the answer choices without handling the item. If handling should be required, allowance for this will be stated with the answer choice. Students have 10 minutes to complete this phase.
- D. Potting Nursery Stock — Each participant will be furnished a supply of plants, nursery containers or pots of appropriate size, and media. Hand pruners, a label, and a marking pen will also be provided. (Personal pruners are allowed, if desired.) The participants will pot the plants, one per container, using standard nursery practices. Plant division or grading of liners may be involved. One finished container will be labeled. Seven minutes will be allowed for potting up to 10 containers. An official will observe and score each participant during this practicum. Scoring criteria are presented on the “Potting Nursery Stock” scorecard.

**OKLAHOMA STATE NURSERY/LANDSCAPE FFA-CDE
PLANT IDENTIFICATION CARD**

(2006 revision)

Contestant Name _____ Contestant Number _____

School _____ Advisor _____

Place the correct ID number from the list beside the proper specimen number.

- | | |
|---|--|
| 1. Abelia, Glossy / <i>Abelia</i> × <i>grandiflora</i> | 49. Magnolia, Chinese (Saucer) / <i>Magnolia</i> × <i>soulangiana</i> |
| 2. Adam's Needle / <i>Yucca smalliana</i> | 50. Maple, Amur / <i>Acer tataricum</i> ssp. <i>ginnala</i> |
| 3. Arborvitae, Oriental / <i>Platycladus orientalis</i> | 51. Maple, Japanese / <i>Acer palmatum</i> (Palmatum group) |
| 4. Ash, Green / <i>Fraxinus pennsylvanica</i> | 52. Maple, Red / <i>Acer rubrum</i> |
| 5. Ash, White / <i>Fraxinus americana</i> | 53. Maple, Shantung / <i>Acer truncatum</i> |
| 6. Azalea / <i>Rhododendron</i> cv. | 54. Maple, Silver / <i>Acer saccharinum</i> |
| 7. Barberry, Crimson Pygmy / <i>Berberis thunbergii</i> 'Atropurpurea Nana' | 55. Maple, Sugar / <i>Acer saccharum</i> |
| 8. Barberry, Mentor / <i>Berberis</i> × <i>mentorensis</i> | 56. Mimosa (Silktree) / <i>Albizia julibrissin</i> |
| 9. Birch, River / <i>Betula nigra</i> | 57. Oak, Bur / <i>Quercus macrocarpa</i> |
| 10. Butterfly Bush / <i>Buddleia davidii</i> | 58. Oak, English / <i>Quercus robur</i> |
| 11. Box, Common / <i>Buxus sempervirens</i> | 59. Oak, Live / <i>Quercus virginiana</i> |
| 12. Cedar, Blue Atlas / <i>Cedrus libani</i> ssp. <i>atlantica</i> 'Glauca' | 60. Oak, Pin / <i>Quercus palustris</i> |
| 13. Clematis / <i>Clematis</i> × <i>jackmanii</i> | 61. Oak, Red / <i>Quercus rubra</i> |
| 14. Cotoneaster, Spreading / <i>Cotoneaster divaricatus</i> | 62. Oak, Sawtooth / <i>Quercus acutissima</i> |
| 15. Crabapple, Flowering / <i>Malus</i> cv. | 63. Oak, Water / <i>Quercus nigra</i> |
| 16. Crape Myrtle / <i>Lagerstroemia indica</i> cv. | 64. Olive, Russian / <i>Elaeagnus angustifolia</i> |
| 17. Cypress, Bald / <i>Taxodium distichum</i> | 65. Osage Orange / <i>Maclura pomifera</i> |
| 18. Dogwood, Flowering / <i>Cornus florida</i> | 66. Pear, Bradford / <i>Pyrus calleryana</i> 'Bradford' |
| 19. Elm, American / <i>Ulmus americana</i> | 67. Pecan / <i>Carya illinoensis</i> |
| 20. Elm, Lacebark / <i>Ulmus parvifolia</i> | 68. Periwinkle, Common / <i>Vinca minor</i> |
| 21. Euonymus, Patens / <i>Euonymus kiautschovicus</i> | 69. Photinia / <i>Photinia</i> × <i>fraseri</i> |
| 22. Euonymus, Winged / <i>Euonymus alatus</i> | 70. Pine, Austrian / <i>Pinus nigra</i> |
| 23. Firethorn / <i>Pyracantha coccinea</i> | 71. Pine, Japanese Black / <i>Pinus thunbergii</i> |
| 24. Forsythia, Border / <i>Forsythia</i> × <i>intermedia</i> cv. | 72. Pine, Mugo / <i>Pinus mugo</i> |
| 25. Fountain Grass, Purple / <i>Pennisetum setaceum</i> 'Rubrum' | 73. Pine, Scots / <i>Pinus sylvestris</i> |
| 26. Ginkgo (Maidenhair Tree) / <i>Ginkgo biloba</i> | 74. Pistache, Chinese / <i>Pistacia chinensis</i> |
| 27. Hackberry, Common / <i>Celtis occidentalis</i> | 75. Planetree, American (Sycamore) / <i>Platanus occidentalis</i> |
| 28. Hawthorn, Washington / <i>Crataegus phaenopyrum</i> | 76. Plum, Purpleleaf / <i>Prunus cerasifera</i> |
| 29. Heavenly Bamboo / <i>Nandina domestica</i> | 77. Privet, Amur / <i>Ligustrum amurense</i> |
| 30. Holly, Burford / <i>Ilex cornuta</i> 'Burfordii' | 78. Privet, Japanese / <i>Ligustrum japonicum</i> cv. |
| 31. Holly, Chinese / <i>Ilex cornuta</i> cv. | 79. Quince, Japanese (Flowering) / <i>Chaenomeles speciosa</i> |
| 32. Holly, English / <i>Ilex aquifolium</i> | 80. Raintree, Golden / <i>Koelreuteria paniculata</i> |
| 33. Holly, Japanese / <i>Ilex crenata</i> cv. | 81. Redbud, Eastern / <i>Cercis canadensis</i> |
| 34. Holly, Oregon Grape / <i>Mahonia aquifolium</i> | 82. Rhododendron, Catawba / <i>Rhododendron catawbiense</i> |
| 35. Holly, Yaupon / <i>Ilex vomitoria</i> | 83. Rose / <i>Rosa</i> cv. |
| 36. Honeylocust, Thornless / <i>Gleditsia triacanthos</i> var. <i>inermis</i> | 84. Rose-of-Sharon / <i>Hibiscus syriacus</i> |
| 37. Honeysuckle, Japanese / <i>Lonicera japonica</i> | 85. Smoke Tree / <i>Cotinus coggygria</i> |
| 38. Hydrangea, Oak Leaf / <i>Hydrangea quercifolia</i> | 86. Spirea / <i>Spiraea</i> × <i>vanhouttei</i> |
| 39. Ivy, Boston / <i>Parthenocissus tricuspidata</i> | 87. Spruce, Colorado / <i>Picea pungens</i> |
| 40. Ivy, English / <i>Hedera helix</i> | 88. Sweet Gum / <i>Liquidambar styraciflua</i> |
| 41. Juniper, Creeping / <i>Juniperus horizontalis</i> cv. | 89. Tuliptree / <i>Liriodendron tulipifera</i> |
| 42. Juniper, Chinese / <i>Juniperus chinensis</i> cv. | 90. Viburnum, Burkwood / <i>Viburnum</i> × <i>burkwoodii</i> |
| 43. Kentucky Coffeetree / <i>Gymnocladus dioica</i> | 91. Waxmyrtle, Southern / <i>Myrica cerifera</i> |
| 44. Laurel, Cherry / <i>Prunus laurocerasus</i> | 92. Willow, Weeping / <i>Salix</i> × <i>sepulcralis</i> var. <i>chrysocoma</i> |
| 45. Lilac, Common / <i>Syringa vulgaris</i> cv. | 93. Wintercreeper / <i>Euonymus fortunei</i> 'Coloratus' |
| 46. Lily Turf / <i>Liriope muscari</i> | 94. Wisteria, Chinese / <i>Wisteria sinensis</i> |
| 47. Linden, Little Leaf / <i>Tilia cordata</i> | 95. Yew / <i>Taxus</i> spp. and cv. |
| 48. Magnolia, Bullbay (Southern) / <i>Magnolia grandiflora</i> | |

**OKLAHOMA STATE NURSERY/LANDSCAPE FFA-CDE
2006 PESTS AND DISORDERS IDENTIFICATION**

Contestant Name _____ Contestant Number _____

School _____ Advisor _____

Diseases

- | | |
|-----------------|----------------------|
| 101 Anthracnose | 106 Cedar-Apple Rust |
| 102 Apple Scab | 107 Crown Gall |
| 103 Black Spot | 108 Fireblight |
| 104 Botrytis | 109 Powdery Mildew |
| 105 Canker | 110 Root Rot |

Insects and Related Pests

- | | |
|-----------------|-----------------|
| 111 Aphid | 118 Scale |
| 112 Bagworm | 119 Spider Mite |
| 113 Borer | 120 Snail/Slug |
| 114 Fungus Gnat | 121 Thrips |
| 115 Lace Bug | 122 Whitefly |
| 116 Leafhopper | 123 White Grub |
| 117 Leaf Miner | |

Physiological Problems

- | | |
|---------------------------------------|-----------------------|
| 124 Frost/Freeze Injury | 128 Mechanical Injury |
| 125 Iron Deficiency | 129 Pot-bound Roots |
| 126 Leaf Scorch (drought/winter burn) | 130 2,4-D Injury |
| 127 Nitrogen Deficiency | |

Weeds

- | | |
|------------------------|----------------------|
| 130 Annual Bluegrass | 137 Henbit |
| 131 Broadleaf Plantain | 138 Mare's Tail |
| 132 Buckhorn Plantain | 139 Nutsedge |
| 133 Carolina Geranium | 140 Oxalis |
| 134 Chickweed | 141 Purslane |
| 135 Crabgrass | 142 Shepherd's Purse |
| 136 Dandelion | 143 White Clover |
| | 144 Wild Onion |

**OKLAHOMA STATE NURSERY/LANDSCAPE FFA-CDE
EQUIPMENT AND SUPPLIES IDENTIFICATION**
(2006 revision)

Contestant Name _____ Contestant Number _____

School _____ Advisor _____

Place the correct ID number from the list beside the proper item number.

- | | | |
|----------------------------------|----------------------------------|--------------------------------|
| 201 Aerifier | 243 Impulse sprinkler | 285 Solenoid valve |
| 202 Anvil-and-blade pruner | 244 Landscape fabric | 286 Spark plug gap gauge |
| 203 Architects scale | 245 Leaf rake | 287 Sphagnum moss |
| 204 Ball cart (B&B truck) | 246 Loppers | 288 Spray suit |
| 205 Bark mulch | 247 Mattock | 289 Square point (flat) shovel |
| 206 Bark medium | 248 Maul | 290 String trimmer |
| 207 Bow saw | 249 Measuring wheel | 291 Tape measure |
| 208 Brick paver | 250 Mist nozzle (mist bed) | 292 Thatch rake |
| 209 Broadcast (cyclone) spreader | 251 Mower blade balancer | 293 Timeclock |
| 210 Bubbler head, irrigation | 252 Nursery container, 1 gal. | 294 Topsoil |
| 211 Bulb planter | 253 Nursery container, 2 gal. | 295 Tree caliper |
| 212 Burlap | 254 Nursery container, 3 gal. | 296 Tree wrap |
| 213 Compressed air sprayer | 255 Nursery spade | 297 Trowel |
| 214 Chain saw | 256 Oscillating sprinkler | 298 T-square |
| 215 Drip emitter, irrigation | 257 Peat moss | 299 Vermiculite |
| 216 Dry-lock wall block | 258 Pick axe | 300 Verticut mower |
| 217 Duster | 259 Perlite | 301 Water breaker |
| 218 Dust mask | 260 Planting bar | 302 Wire tree basket |
| 219 Edger | 261 Pole pruner | |
| 220 Edging | 262 Polyethylene film | |
| 221 Engineers scale | 263 Polyethylene pipe | |
| 222 Erosion netting | 264 Pop-up irrigation head | |
| 223 Fertilizer tablet | 265 Post-hole digger | |
| 224 Galvanized pipe | 266 Power blower | |
| 225 Garden (spading) fork | 267 Power hedge trimmer | |
| 226 Garden (bow) rake | 268 Pruning saw | |
| 227 Garden spade | 269 PVC (polyvinylchloride) pipe | |
| 228 Gas mask | 270 Reel mower | |
| 229 Grading rake (aluminum) | 271 Resin-coated fertilizer | |
| 230 Grafting band | 272 Respirator | |
| 231 Grafting tool | 273 Rotary mower | |
| 232 Granular fertilizer | 274 Rototiller | |
| 233 Gravity drop spreader | 275 Round point shovel | |
| 234 Grass shears | 276 Safety goggles | |
| 235 Ground limestone | 277 Sand | |
| 236 Hearing protection | 278 Scoop shovel | |
| 237 Hedge shears | 279 Shade fabric | |
| 238 Hoe | 280 Sharpening stone | |
| 239 Hook-and-blade pruners | 281 Siphon proportioner | |
| 240 Hose-end sprayer | 282 Soaker hose | |
| 241 Hose-end washer | 283 Soil auger | |
| 242 Hose repair coupling | 284 Soil sampling tube | |

Nursery/Landscape

Name: _____ Chapter: _____

State: _____ Team No.: _____

Member No.: _____

POTTING NURSERY STOCK PRACTICUM SCORECARD

	POSSIBLE POINTS	MEMBER SCORE
POTTING PROCESS (35 POINTS)		
PREPARATION OF PLANTS		
<ul style="list-style-type: none"> • Plants selected for quality and uniformity • Inspects/prunes/grooms damaged parts • Prunes excess root length • Handles plants properly 	10	
PLACEMENT OF PLANTS IN CONTAINERS		
<ul style="list-style-type: none"> • Plant centered and vertical • Roots carefully and properly spread • Plant at proper depth • Plant roots covered 	10	
MEDIA FILLING AND SETTLING__		
<ul style="list-style-type: none"> • Sufficient media added • Media settled by bumping • Plant remains stable 	10	
LABELING OF COMPLETED UNITS_____		
<ul style="list-style-type: none"> • Plant (variety) name and date • Legible 	2	
SAFETY PRACTICES APPLIED_____		
<ul style="list-style-type: none"> • Proper cutting technique • Tool closed when finished • Minimal clutter/good organization in work area 	3	
POTTING PRODUCTIVITY (15 POINTS)_____		
NUMBER OF UNITS COMPLETED_____	10	
QUALITY OF UNITS COMPLETED_____		
<ul style="list-style-type: none"> • Overall quality and uniformity of lot 	5	
TOTAL POINTS (50 POINTS)		

Judge's Name

Judge's Signature/Date

Nursery/Landscape

Name: _____ Chapter: _____

State: _____ Team No.: _____

Member No.: _____

VERBAL CUSTOMER ASSISTANCE PRACTICUM SCORECARD

	POSSIBLE POINTS	MEMBER SCORE
CONVERSATION (35 POINTS)		
APPROACH		
<ul style="list-style-type: none"> • Effective greeting and offer to help • Positive, enthusiastic; not hesitant 	4	
PERSONALITY		
<ul style="list-style-type: none"> • Pleasant, friendly manner • Not pushy in selling 	7	
VOICE		
<ul style="list-style-type: none"> • Easy to hear and understand • Proper grammar used; good speaking form 	7	
INFORMATION REQUESTED FROM CUSTOMER		
<ul style="list-style-type: none"> • Determines assistance needs • Effectively ask details/preferences 	7	
SALESMANSHIP		
<ul style="list-style-type: none"> • Effective; tries to expand sale • Develops customer confidence in product/service 	7	
CLOSING		
<ul style="list-style-type: none"> • Repeats order, handles payment (as applicable) • Asks if instructions understood • Thank you close 	3	
PRODUCT/PROBLEM/PROCEDURE PRESENTATION * (15 POINTS)		
CORRECT PRODUCT/PROCEDURE/SELECTIONS	6	
CORRECT PRODUCT/PROBLEM INFORMATION PROVIDED	6	
CLARITY OF INFORMATION PROVIDED TO CUSTOMER	3	
Total Points	(50 points)	

* Includes, as applicable, evaluation of order form for completeness, spelling and arithmetic accuracy, clarity.

Judge's Name

Judge's Signature/Date



Directions

From Highway 51 & Sangre Road:
1/2 mile North, 1/4 mile East,
South side of the road

