

OHIO CAREER DEVELOPMENT EVENTS
FLORICULTURE

Effective August 1, 2004.

Purpose

The floriculture CDE is an educational activity designed as a practical method of teaching students to identify various horticulture plants, disorders, insects and diseases that affect the floriculture industry. The skills students learn in evaluating floriculture products gives them the opportunity to become better producers and consumers of these products. The written test and the practicum will truly test the student's ability to handle practical situations in the floriculture industry.

Date

State: Spring

Location

State: OSU/ATI

CDE Rules

1. Each school may enter an unlimited number of dues paid FFA members as participants, the top 4 scores will be considered the "team" and the top 3 scores will be the team score of record.
2. Under no circumstances will any contestant be permitted to touch or handle plant materials being used for identification purposes.
3. Any communication between contestants during the CDE will disqualify the contestant(s) from the CDE.
4. No team, team member, or team coach shall visit the CDE facilities to observe plant materials within a week of the event date. Any group or individual reported and proven to be doing this will be disqualified from the competition.
5. Any contestant caught cheating during the CDE will be disqualified.
6. Contestants must bring clipboards and number 2 pencils.
7. No cell phones, pagers, walkie talkies or any other communication device are allowed
8. No programmable calculators are allowed.

CDE Format

The CDE will have five phases including:

1. Plant Identification 35 specimens.(35 common, 15 scientific)
2. Other Identification 50 specimens consisting of:
Insects, diseases, weeds and disorders 20 specimens
Supplies and equipment 25 specimens
Floral pieces 5 specimens
3. Written Test 50 questions
4. Placing Classes 5 classes
5. Practicums 2 skills

Scoring Guide

1. Individual
Plant Identification 75 points
Other Identification 55 points
Written Test 50 points
Placing Classes 50 points
Practicums 65 points
Total Possible 295 points
2. Team
295 points x 3 individuals
= 885 Total Possible Points

Plant Identification (75 points, 50 minutes)

Fifty (35) specimens from the following list will be displayed for the contestants to identify by their common names. Contestants will also be responsible for identifying 15 of these specimens by their scientific names. The scorecard will be like the attached list of plant materials except the common names will be in alphabetical order. Scientific names from the flowering pot plant and foliage pot plant sections of this guide will also be listed in alphabetical order. All plants, cut flowers, live and dried floral materials will be tested for and alphabetically on the scorecard.

Cut flowers

Common
Acacia
Yarrow
Monkshood
Agapanthus
Allium
Ginger
Alstromeria
Queen Anne's Lace
Anemone
Anthurium Flower
Snapdragon
Monte Casino Aster
Astilbe
Banksia
Bouvardia
China Aster
Orchid Cattleya
Cornflower
Waxflower
Larkspur
Lily of the Valley
Orchid cymbidium
Delphinium
Orchid dendrobium
Chrysanthemum Spray
Chrysanthemum Standard
Carnation
Carnation (miniature)
Heather
Lisianthus
Forsythia
Freesia
Gardenia
Gerbera
Gladiolus
Gladiolus Miniture
Gypsophila
Sunflower
Heliconia
Hydrangea
Iris
Leptospermum

OCF (Short List)

Botanical
Acacia dealbata
Achillea filipendulina
Acontium napellus
Agapanthus africanus
Allium species
Alpinia purpuata
Alstroemeria hybrids
Ammi majus
Anemone coronatra
Anthruium andareanum
Anthirrhinum majus
Aster ericodies
Astilbe hybrids
Banksia prionotes
Bouvardia species
Callistephus chinensis
Cattleya species
Centaurea cyanus
Chamelaucium uncinatum
Consolida ambigua
Convallaria majalis
Cymbidium species
Delphinium elatum
Dendrobium species
Dentranthemum x grandiflorum
Dentranthemum x grandiflorum
Dianthus caryophyllus
Dianthus caryophyllus nana
Erica species
Eustoma grandiflorum
Forsythia x intermedia
Freesia hybrids
Gardenia augusta
Gerbera jamesonii
Gladiolus hybrids
Gladiolus X colvilli
Gypsophila paniculata
Helianthus annuus
Heliconia species
Hydrangea macrophylla
Iris hybrids
Leptospermum species

Pincushion Protea	<i>Leucospermum cordifolium</i>
Liatris	<i>Liatris spicata</i>
Lily Asiatic	<i>Lilium hybridum</i>
Lily Oriental	<i>Lilium hybridum</i>
Statice Caspia	<i>Limonium latifolium</i>
Statice Annual	<i>Limonium sinuatum</i>
Stock	<i>Matthiola incana</i>
Bells of Ireland	<i>Moluccella laevis</i>
Daffodil	<i>Narcissus pseudonarcissus</i>
Bells of Ireland	<i>Moluccella laevis</i>
Daffodil	<i>Narcissus pseudonarcissus</i>
Nerine Lily	<i>Nerine hybrids</i>
Oncidium Orchid	<i>Oncidium hybrids</i>
Star of Bethlehem	<i>Ornithogalum thyrsoides</i>
Orchid Phalaenopsis	<i>Phalaenopsis hybrids</i>
Pink Mink Protea	<i>Protea neriifolia</i>
Ranunculus	<i>Ranunculus asiaticus</i>
Rose Sweetheart	<i>Rosa hybrids</i>
Rose Spray	<i>Rosa hybrids</i>
Rose Standard	<i>Rosa hybrids</i>
Solidago (Golden Aster)	<i>Solidago species</i>
Solidaster	<i>Solidaster hybrids</i>
Stephanotis	<i>Stephanotis floribunda</i>
Bird -of- Paradise	<i>Strelitzia reginae</i>
Lilac	<i>Syringa vulgaris</i>
Tulip	<i>Tulipa hybrids</i>
Calla Lily	<i>Zantedeschia species</i>

Foliage Plant List

Common	Botanical
Aluminum plant	<i>Pilea cadierei</i>
Arrowleaf (Nephtytis)	<i>Syngonium podophyllum</i>
Baby rubber plant	<i>Peperomia obtusifolia</i>
Boston fern	<i>Nephrolepis exalta</i>
Chinese evergreen	<i>Aglaonema speices</i>
Croton	<i>Codiaeum variegatum</i>
Dumbcane	<i>Diffenbachia species</i>
Grape ivy	<i>Cissus rhombifolia</i>
Hawaiian schefflera	<i>Schefflera arboricola</i>
Heart-leaf philodendron	<i>Philodendron scandens oxycardium</i>
Jade plant	<i>Crassula argentea</i>
Norfolk Island pine	<i>Araucaria heterophylla</i>
Parlor palm	<i>Chameaedorea speices</i>
Peace lily	<i>Spahtiphyllum hybrids</i>

Pothos	<i>Epipremnum aureum</i>
Prayer plant	<i>Maranta leuconeura erthroneura</i>
Red margined dracaena	<i>Dracaena cincta</i>
Rubber plant	<i>Ficus elastica</i>
Snake plant	<i>Sansevieria trifasciata</i>
Spider plant	<i>Chlorophytum comosum</i>
Wandering jew	<i>Tradescantia zebrina</i>
Weeping fig	<i>Ficus benjamina</i>

Flowering Potted Plants Ohio FFA

Common	Botanical
African violet	<i>Saintpaulia ionantha</i>
Amaryllis	<i>Hippeastrum hybrids</i>
Azalea	<i>Rhododendron simsii hybrids</i>
Chrysanthemum	<i>Dendranthema X grandiflorum</i>
Cineraria	<i>Pericallis hybrida</i>
Crocus	<i>Crocus species</i>
Cyclamen	<i>Cyclamen persicum</i>
Easter lily	<i>Lilium longiflorum</i>
English primrose	<i>Primula vulgaris</i>
Gloxinia	<i>Sinningia speciosa</i>
Grape hyacinth	<i>Muscari species</i>
Holiday cactus	<i>Schlumbergera truncata</i>
Hyacinth	<i>Hyacinthus orientalis</i>
Hydrangea	<i>Hydrangea macrophylla</i>
Kalanchoe	<i>Kalanchoe blossfeldiana</i>
Paper white narcissus	<i>Narcissus tazetta 'Paper White'</i>
Persian violet	<i>Exacum affine</i>
Poinsettia	<i>Euphorbia pulcherrima</i>
Tulip	<i>Tulipa hybrids</i>

Design Greens

Common	Botanical
Bear Grass	<i>Xerophyllum tenax</i>
Boxwood	<i>Buxus sempervirens</i>
Camellia Foliage	<i>Camellia japonica</i>
Cedar	<i>Cedrus species</i>
Croton	<i>Codiaeum variegatum</i>
Emerald Palm	<i>Chamaedorea species</i>
English Ivy	<i>Hedera helix</i>
Eucalyptus	<i>Eucalyptus species</i>
Galax	<i>Galax aphylla</i>
Hawaiian Ti	<i>Cordyline terminalis</i>
Holly	<i>Ilex aquifolium</i>
Horsetail	<i>Equisetum hyemale</i>
Huckleberry, Huck	<i>Vaccinium ovatum</i>
Italian Ruscus, Smilax Ruscus	<i>Ruscus aculeatus</i>

Leatherleaf, Bakerfern
Myrtle
Noble Fir
Oregon Fern
Pittosporum
Plumosus
Salal
Scotch Broom
Silver Fir
Sprenger Asparagus Fern
Tree Fern
Silver Fir

Rumohra adiantiformis
Myrtus communis
Abies procera
Nephrolepis exaltata
Pittosporumbira
Asparagus Setaceus
Gaultheria shallon
Cytisus scoparius
Abies alba
Asparagus densiflours 'Sprengri'
Asparagus pyramidalis
Abies alba

White Pine

Pinus strobus

Bedding Plants

Ageratum
Calabracoa
Celosia
Coleus
Dusty miller
Fuschia
Geranium
Impatiens
Lobelia
marigold
new guinea impatiens
non stop begonia
osteospermum
pansy
petunia
Petunia- wave
portulaca
salvia
snapdragon
Streptecarpis
sweet alyssum
Sweet potato vine
verbena
vinca- flowering
vinca- trailing
wax begonia
zinnia

vegetables/Herbs

basil
cabbage
onion
oregano
pepper
thyme
tomato.

Supplies and Equipment

General Supplies

bulb planter
cell pack
fertilizer injector
flat
floral preservative
heating cable
mechanical seeder
perlite
plug tray
slow release fertilizer
soilless media
spaghetti tube
sphagnum peat moss
sprayer
thermostat
vermiculite
water breaker

Florist Tools

boutonniere pin
casket saddle
chenille stem
chicken wire
corsage pin
corsage bag
floral foam
floral tape
florist knife
florist shears
hyacinth stake
paddle wire
ribbon shears
steel pick
water tube
waterproof tape
waxed string
wire easel
wired wooden pick
wristlet

Design containers

centerpiece bowl
compote
bud vase
ginger vase
rose bowl

Container types

azalea pot
bulb pan
hanging basket
standard pot

Ribbon Sizes

#3
#9
#40

Wires

18 gauge
24 gauge
28 gauge

Floral arrangements and corsages

cascading bouquet
circular mound
clutch bouquet
colonial bouquet
diagonal
double end corsage
equilateral triangle
hogarth
horizontal
isosceles triangle
right triangle
vertical
zig zag

Deficiencies

nitrogen deficiency
potassium deficiency
phosphorus deficiency
iron deficiency

Insects

aphid
fungus gnat
mealybug
2 spotted spider mite
thrip
whitefly
scale

Diseases

fungal leaf spot
bacterial leaf spot
bacterial stem rot
root rot
botrytis
damping off
powdery mildew

Dried floral material

raffia
sheet moss
spanish moss
wheat
transparent oak
eucalyptus

lotus pods
german statice
ting tings
wheat

Written Exam (45 minutes)

A written exam consisting of 25 true/false statements will administered to each contestant. Each question will be worth 1 point. Problem solving type questions may be incorporated into the exam.

Placing Classes (50 points, 20 minutes)

Plants and flowers in each pot or container will be judged as a group and placed first, second, third, and fourth. Plants or flowers may not be touched or handled.

1. Cut flowers

four containers from one or more of the following groups will be judged.

- a. roses b. carnations c. standard chrysanthemums
d. spray chrysanthemums

The following scale of points may be used as a basis of evaluation. *Value in parentheses refers to max:
Condition 25 Uniformity 10; freedom from bruise and blemish 5; substance 10)*

Form 20-(Uniformity 5;immature or over mature 5; size and proportion 5)*

tem and Foliage 20 (Uniformity 5; strength and/ or straightness 5; foliage quality 5; size and proportion 5)*

Color 20 (Uniformity 5; intensity 5)*

Size 15 (Uniformity 5; deduct point in relation to development and condition-oversized or undersized)*

100 total

2. Flowering Potted Plants

Four plants from one or more of the following groups will be judged:

- a. Geranium
b. Chrysanthemum
c. African violet
d. New Guinea Impatiens

The following scale of points may be used as a basis for evaluation.

Cultural perfection 40

Floriferousness (effect of floriferousness) 20

Size of plant 20

Color of bloom 10

Size of bloom 10

100 total

3. Foliage Plants.

Four plants from one or more of the following groups will be judged:

- a. Boston fern
b. Dieffenbachia
c. Philodendron
d. English ivy
e. Spathiphyllum
f. Schefflera

The following scale of points may be used as a basis for evaluation.

Cultural perfection (health and vigor) 35 points

Size of plant 35 points

Form or symmetry 30 points

100 total

Flower Arrangement

Four arrangements from one of the following classes will be judged:

- a. Circular mound
- b. Hogarth
- c. Horizontal
- d. L-shaped
- e. Scalene triangle
- f. Symmetrical triangle
- g. Vertical

The following scale of points may be used as a basis for evaluation:

Design 50

Color 20

Mechanics 15

Condition 15

100 total

Practicum

All contestants will complete a sales invoice described under Item A (32 points). On the day of the event, the event director will select one of the following four practicums - in which all contestants will participate.

The four additional practicums are:

Planting rooted chrysanthemum cuttings;

Decorating a potted chrysanthemum;

Making a corsage; and

Making a bud vase

Each student will be responsible for providing florist shears and a knife for making a corsage if this practicum is selected.

1. Sales Invoice (32 points, 5 minutes)

The contestant will be given a sample problem and a blank sales invoice upon arriving at the practicum site. The contestant will have seven minutes to complete the sales invoice. A current tax table will be provided.

SAMPLE PROBLEM

Customer:

Mrs. Brenda Denlinger

428 Curry Ave.

Columbus, Ohio 43216

Phone 456-1213

Items Purchased:

One Sympathy Arrangement (no preference) at \$35.00

Occasion: Funeral

Recipient: Charles Davidson Services

Westland Funeral Home

Columbus, Ohio 43221-0990

Message: With Deepest Sympathy Mr. and Mrs. James Denlinger and Family

Date/Time of Viewing: 6 to 9 PM Monday

Customer will be billed

The customer called in the order by phone.

Connell's Flowers has a \$2.00 delivery charge within the city of Columbus.

2. Planting Rooted Chrysanthemum Cuttings

Cuttings - 33 points, 5 minutes

In this phase of the CDE, contestants will be given 10 rooted chrysanthemum cuttings from which to select five cuttings to plant in a 6 1/2 inch azalea pot. Appropriate potting mix, label, and pencil are provided for each contestant to use in completing this task. The time limit is five minutes.

BASIS FOR EVALUATION

Criteria #1-6, 5 points each and #7 worth 3 points= 33 points total

- 1 selection of uniform cuttings
- 2 filling pot with soil to proper depth
- 3 proper placement of cuttings
- 4 planting to proper depth

- 5 labeling of pot
- 6 watering of potted cuttings
- 7 general appearance (freedom from handling damage). 3 points

3. Decorating a Potted Chrysanthemum - 33 points, 6 minutes

In this phase of the event, the student will decorate a potted chrysanthemum using materials found at the event site. A potted chrysanthemum, florist wire, wire cutters, five different colors of wrap materials, five different colors of bow materials, scissors, and wood picks will be provided. Upon arriving at the practicum site, the student will read a card that will indicate a "holiday" situation that they must decorate the chrysanthemum for. A five minute time limit will be allotted for completion of this task. The finished product will be evaluated as follows:

- a. Remove all damaged or yellow foliage.
- b. Selection of foil for the pot. Foil should harmonize with the color of the blooms.
- c. Cut foil to proper length. Foil should extend 4" to 6" beyond the rim of pot.
- d. Properly fold and press the foil around the pot.
- e. Construct a #9 satin ribbon that will harmonize with the color of the flowers and foil.
- f. Width of the bow should be no wider than the width and span of the top pot to be decorated.
- g. Bow is firmly wired to a 6" wood pick.
- h. Select the most attractive side of the plant for placement of the bow (focal point).

4. Making a Corsage - 33 points, 10 minutes

In this phase of the event, the student will construct either a single or double flower corsage as per the instruction of the judge at the CDE site. When arriving at the practicum site, the student will find stems of flowers, foliage, floral tape, wire, ribbon, mist bottle, corsage pins, corsage bags and/or boxes, and accessories. Each student must provide their own floral shears and knife. A eight minute time limit will be allotted for completion of this task. The finished product will be evaluated as follows:

- a. Product is finished
- b. Design shape and style

- c. Harmony of materials
- d. Bow
- e. Mechanics
- f. Packaging
- g. Originality

5. Making a Bud Vase (33 Points, 7 min.)

In this phase of the event, the student will construct a bud vase with a bow, suitable for an office desk. When arriving at the practicum site, the student will find a bud vase, stems of the flowers, foliage, wire, ribbon and/or accessories. Each student must provide their own floral shears and cutting tool. A seven minute time limit will be allotted for completion of this task. The finished product will be evaluated as follows:

- a. Product is finished
- b. Design shape and style
- c. Harmony of materials
- d. Bow
- e. Mechanics
- f. Proportion
- g. Originality

A sample scorecard is located in this guide.

References

The following references are available from the Ohio Ag Ed Curriculum Materials Service.

Books and Bulletins

A Manual for Flower Judging

Ball Pest and Disease Manual 2nd. edition

Tips on Growing Bedding Plants, 3rd. edition

The Introduction to Greenhouse Production, 2nd. edition, by Dr. Robert McMahonn, ATI

Floral Design and Marketing by Dr. Gary Anderson, ATI.

Slides Series

An Introduction to Greenhouse Work

Greenhouses and Related Structures
Common Insects and Mites of Greenhouse Crops, Revised, 1985
Managing Plant Health in the Greenhouse
Diseases of Greenhouse Flower Crops
Greenhouse Crops
Pot "Mums"
Poinsettia
Easter Lilies.
Geranium
Bedding Plants
Bedding Plant Equipment
Crops for a Cool or Cold Greenhouse
Foliage Plants
Diagnosing Problems on Indoor Plants
A General Health Guide for Indoor Plants
Selecting and Using Pesticides on Indoor Plants
Dried Materials
Corsage Construction
Silk Wedding Arrangements
Floral Tributes
Cut Florists Foliage and Branches
Fresh Cut Florists Flowers
Wedding Bouquets
Wedding Decorations
Computer Software
Selecting House Plants
Other References
Ball Red Book, 16th edition, George J. Ball, Inc.
The Commercial Greenhouse, 2nd. edition, James W. Boodley, Delmar Publishers
Greenhouse Operation and Management, 5th edition, Paul

V. Nelson, Reston Publishing Company
Bedding Plants IV, E. Jay Holcomb, Ball Publishing.8
PRACTICUM A
SALES INVOICE SCORESHEET

Contestant Number _____

Contestant Name _____

School _____

Sales Score sheet values: 1.5 points per item= 30 points
Neatness worth 2 points=32 points possible

1. Phone number
2. Date: month and day
3. Date/year
4. Customer name
5. Customer's street address
6. Customer's city, state, and zip code
7. Recipient's name
8. Recipient's address
9. Occasion
10. Message
11. Sender
12. Quantity
13. Description of Item
14. Price
15. Service charges
16. Tax
17. Phone/In store
18. Delivery date
19. Total price
20. Method of payment
21. Neatness

PRACTICUM B
PLANTING CHRYSANTHEMUM CUTTINGS
SCORECARD

Contestant Number _____

Contestant Name _____

School _____

Criteria #1-6 worth 5 points each, #7 worth 3 points each=
33 points possible

- 1 Selection of uniform cuttings
- 2 Filling pot with soil to proper depth
- 3 Proper placement of cuttings
- 4 Planting to proper depth
- 5 Labeling of pot
- 6 Watering of potted cutting
- 7 General appearance (freedom from handling damage)- 3 points

PRACTICUM C
DECORATING A POTTED CHRYSANTHEMUM

Contestant Number _____

Contestant Name _____

School _____

(each listed below are worth 4 points each except the last one worth 1 point=33 points possible)

Removed all damaged or yellow foliage.

Selection of foil for pot. Foil harmonized with the color of the blooms.

Foil cut to proper length. Foil should extend 4" to 6" beyond the rim of the pot.

Properly folded and pressed the foil around the pot.

Constructed a #9 satin ribbon bow (no wider than the width of the pot) that harmonized with the color of the flowers and foil.

Bow firmly wired to a 6" wood pick.

Selected the most attractive side of the plant for placement of the bow (focal point).

Overall harmony and superior design (worth only 1 point).

PRACTICUM D
MAKING A CORSAGE

Contestant Number _____

Contestant Name _____

School _____

Product is Finished 5 _____

Design Shape and Style 5 _____

Harmony of Materials 5 _____

Bow 5 _____

Mechanics 5 _____

Packaging 5 _____

Originality 3 _____

TOTAL POINTS (33) _____

PRACTICUM E

MAKING A BUD VASE

Contestant Number _____

Contestant Name _____

School _____

Product is Finished 5 _____

Design Shape and Style 5 _____

Harmony of Materials 5 _____

Bow 5 _____

Mechanics 5 _____

Proportion 5 _____

Originality 3 _____

TOTAL POINTS (33) _____