Celosia plumosa Cockscomb[1]

Edward F. Gilman and Teresa Howe[2]

Introduction

Celosia has two types of flowers, the cockscomb, *Celosia cristata* and the plume types, *Celosia plumosa*. The tight, velvety texture of the cockscomb flowers look like brain tissue to some people. The fluffy, light, airy texture of the plume types blow freely in a breeze and are planted more often. Both come in a variety of colors.

Figure 1. Full Form - *Celosia plumosa* 'Apricot Brandy': Apricot Brandy Cockscomb.
Credits: Edward F. Gilman

General Information

Scientific name: *Celosia plumosa*

Pronunciation: see-LOE-see-uh ploo-MOE-suh

Common name(s): cockscomb

Family: *Amaranthaceae*

Plant type: annual

USDA hardiness zones: all zones (Figure 2)

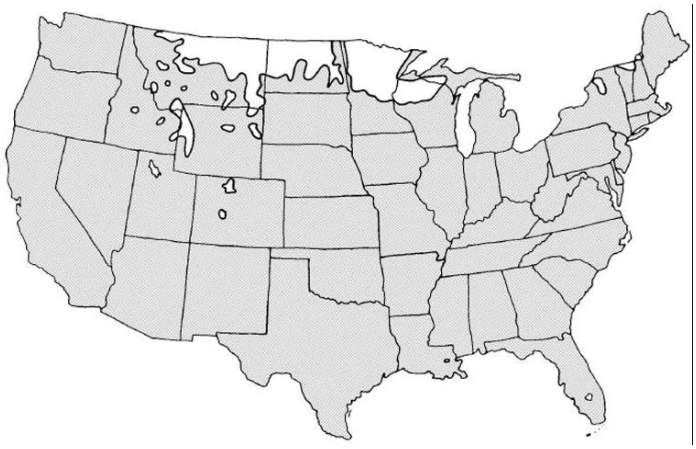

Figure 2. Shaded area represents potential planting range.

Planting month for zone 7: Jun; Jul

Planting month for zone 8: May; Jun; Jul

Planting month for zone 9: Apr; May; Jun; Jul; Aug; Sep; Oct; Nov

Planting month for zone 10 and 11: Apr; May; Jun; Jul; Aug; Sep; Oct; Nov

Origin: not native to North America

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Invasive potential: may self-seed each year

Uses: edging; mass planting; container or above-ground planter

Availability: generally available in many areas within its hardiness range

Description

Height: .5 to 2 feet

Spread: .5 to 1 feet

Plant habit: upright

Plant density: moderate

Growth rate: moderate

Texture: fine

Foliage

Leaf arrangement: alternate

Leaf type: simple

Leaf margin: entire

Leaf shape: linear; oblong

Leaf venation: bowed

Leaf type and persistence: not applicable

Leaf blade length: 2 to 4 inches

Leaf color: purple or red

Fall color: not applicable

Fall characteristic: not applicable

Flower

Flower color: yellow; pink; purple; orange

Flower characteristic: showy

Fruit

Fruit shape: no fruit

Fruit length: no fruit

Fruit cover: no fruit

Fruit color: not applicable

Fruit characteristic: inconspicuous and not showy

Trunk and Branches

Trunk/bark/branches: not applicable

Current year stem/twig color: green

Current year stem/twig thickness: medium

Culture

Light requirement: plant grows in full sun

Soil tolerances: acidic; sand; loam; clay

Soil salt tolerances: unknown

Plant spacing: 6 to 12 inches

Other

Roots: not applicable

Winter interest: not applicable

Outstanding plant: not particularly outstanding

Pest resistance: long-term health usually not affected by pests

Use and Management

The plants prefer a fertile, moist soil with lots of organic matter. They do best in full sun but will tolerate partial shade. The flowers can be dried with red flowers giving best results. Any check in growth of young plants will bring them into bloom prematurely. This spoils later blooming. Causes of premature blooming are exposure to cold temperatures when planted too early, or remaining in packs or flats too long in the spring. Celosia grows one to one and a half feet tall and is spaced 10 to 12 inches apart.

The heads may be larger if the seed is planted directly into the garden. If started indoors they germinate in one week at 70°F to 75°F. Plant indoors six weeks before the desired outdoor planting date. Seedlings should be grown warm and on the dry side.

Cristata cultivars include the dwarf 'Jewel Box' and 'Olympia' series and the taller (18 to 24 inches) 'Floradale' and 'Chief' series. Plumosa series and cultivars include the dwarf 'Kimono' and 'Geisha' series and the taller types including 'Apricot Brandy', 'Castle' series, 'Century' series, 'Forest Fire' and 'New Look'.

Pests and Diseases

Mites can cause loss of healthy green foliage coloration, but this pest is not common on celosia.

Leaf spots may occasionally attack celosia, but the problem is not serious.