**Dryopteris erythrosora** - Autumn Fern (*Polypodiaceae*)

*D. erythrosora* is known as an accent fern with emerging fronds that are copper-red in color, slowly changing to kelly green by mid-summer. Autumn Fern is evergreen in southern climates.

**General Comments on Ferns:** Ferns are among the most adaptable of plants for residential landscapes. They are ideal for groundcover or border plantings in shady areas of the landscape. Ferns are an ancient type of vegetation that occupied the world long before the evolution of seed-producing plants. They are strictly foliage plants, since they reproduce without flowering. Most ferns used in midwestern and northeastern landscapes are shade loving woodland types, although there are sun tolerant ferns available through specialty catalogs. They will thrive best if located near trees, or on the east or north side of a building, where they will receive partial shade. Woodland ferns may grow quite poorly if subjected to hot afternoon sun. Ferns start growth very early in the spring, and retain their delicate leafy foliage until several light frosts freeze them back in the autumn. They are quite free from disease or insect pests, and thus are easy to grow in the native gardens or border plantings. Woodland ferns grow best in a soil which has a high humus content, almost pure leaf mold is ideal. The average garden soil may be made suitable for ferns by adding liberal quantities of peat moss or compost.

**FEATURES**

**Form**
- small herbaceous semi-evergreen fern
- maturing at about 1.5' tall x 2' wide
- arching clump growth habit

**Culture**
- partial shade to full shade
- performs best in moist, rich, deep, well-drained, organically-supplemented soils in partial shade; not tolerant of urban stress conditions, including sunny sites, high intensity reflected light, heat, drought, poor soils, compacted soils, or pollution
- propagated primarily by crown division, but also by spores
- Polypody Family (the largest Family of Ferns), with few disease or pest problems (crown rot can occur in poorly drained soils)
- moderately available in container form

**Foliage**
- delicate, fine-textured, and moderately shiny, unfolding from a fiddlehead (crosier) to a copper-red frond (autumnal in color, hence the common name) to form a gently arching glossy leaf that changes from copper to bronze to kelly green as it matures pinnately compound, to 2' long for each frond, with the foliage radiating and arching from the crown, sometimes with several flushes during the growing season, very slowly senescing and dying back in winter, being semi-evergreen in northern climates, but evergreen in southern climates

**Flowers**
- technically not applicable; many ornamentally insignificant brown-red sori (the reproductive structures) occur in July on the undersides of the leaflets

**Fruits**
- technically not applicable; spores are shed from the sori as the season progresses

**Twigs**
- not applicable

**Trunk**
- not applicable

**USAGE**

**Function**
- a low-growing accent foliage perennial for shady conditions found at north- or east-facing foundations, under large trees, in woodlands, or at the border; also effectively used in shady portions of Japanese gardens

**Texture**
- medium-fine texture
- average density

**Assets**
- new foliage emerges from the center of the crown as a copper-red color, which is unique among ferns semi-evergreen foliage

**Liabilities**
- not urban tolerant, and generally requiring good topsoil, well-drained subsoil, adequate and continuous moisture, and shady conditions to thrive

**Habitat**
- Zones 5 to 8
- Native to Japan and China

**SELECTIONS**

**Alternates**
- other plants for full shade or dappled shade situations, including ferns (*Athyrium, Matteuccia, Osmunda, Polystichum, etc.*), perennials (*Astilbe, Brunnera macrophylla, Hosta, Pulmonaria, Stylophorum diphyllum, etc.*), or groundcovers (*Gaultheria procumbens, Hedera helix, Mitchella repens, Symphytum grandiflorum, Vinca minor, etc.*)

**Variants**
- the species form is the only type commercially available