# Plants For Lakefront Revegetation









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### The benefits of revegetation with native plants have been widely published. The following is a summary of the advantages of replanting a shoreline:

- 1. Food source for wildlife.
- 2. Protective cover for small fish and other animals.
- 3. Source of nesting material for reptiles, birds, and small mammals.
- 4. Shade for fish and humans (cypress trees).
- 5. Erosion control and soil stabilization.
- 6. Aesthetics and landscaping appeal.
- 7. Animal attractor.
- 8. Nutrient uptake.
- 9. Plant competition for preventing encroachment of invasive exotics such as hydrilla.
- 10. Living surface for small insects and other invertebrates important to fisheries.

### The plants listed in this document are species that can be used to provide one or more of the above. Below is a brief explanation of the terms used in this document:

**Average Height:** Typical height of the plant from substrate to top of leaves (not flowers).

**Leaf Type:** Shape of mature leaves. **Leaf Size:** Length of mature leaves.

Flower Type: Arrangement and/or number of flowers per stem or stalk.

Flower Color: Color of the plant's flowers.

Flowering Season: Spring (April, May, June), summer (July, Aug, Sept),

fall (Oct, Nov, Dec), and winter (Jan, Feb, Mar). **Habitat:** Most common areas where plant is found. **Wildlife Value:** Animals that utilize the plant.

**Distribution:** Location within the state – South, Central, and North Florida.

**Overwinter:** Survivability, leaf drop, or leaf burn occurrence.

**Common Uses:** Reasons why plant is used – erosion control, landscape, fish habitat, nesting, etc.

**Soil:** Suggested planting substrate such as sand or muck.

**Light:** Shade or sun preference.

**Salinity:** Tolerance to brackish water (low – freshwater, medium – brackish,

high – estuaries).

Propagation: How a plant reproduces or spreads. Rhizomes are underground stems that produce daughter plants.

**Pest Problems:** Insect, small mammal or reptile damage, and grass carp if they have been stocked in the waterbody.

Growth Rate: Slow, medium, or fast growth.

Water Depth: Typical recommended water depth of planting (not the maximum depth a plant can survive).

**Density:** Typical recommended spacing of plantings.

**Planting:** Planting suggestions to improve survivability.

Survivability: Low, medium or high.

**Cost:** Retail and wholesale cost per plant (does not include labor). Cost is dependent on the quantity, size, and time of year purchased. These cost figures are an average based on several sources checked in 2001-2002.

### **HIBISCUS**

(Hibiscus coccineus (red) • Hibiscus laevis (white to pink) • Hibiscus moscheutos (white to cream) • Hibiscus grandiflorus (light-pink))

#### **DESCRIPTION**

**Average Height:** 5 to 6 ft

Leaf Type: Ovate, some strongly lobed

Leaf Size: 4 to 6"

Flower Type: Single flower per leaf axil, numerous on plant

Flower Color: Red. white or pink Flowering Season: Spring to summer

Habitat: Marshes, edges of streams and lakes

Wildlife Value: Shelter for small birds; butterfly attractor

**Distribution:** Statewide

Overwinter: Leaves and stems die back; resprout in spring

Common Uses: Flowering shrub

#### PLANTING REQUIREMENTS

Soil: Sand to muck, prefers acid soils

**Light:** Medium to high

Salinity: Low (except H. coccineus and H. grandiflorus, occasionally in brackish marshes)

**Propagation:** Seeds (and cuttings)

Pest Problems: None

**Growth Rate:** Medium to fast

Water Depth: Moist soils and seasonal wet areas

**Density:** 5 ft apart

Planting: Trim branches to avoid leggy appearance and to promote bloom production

**Survivability:** High (using small potted plants) **Cost:** Retail \$15.00 3 gal

Wholesale \$ 4.00 - 6.00 3 gal (250 minimum order)

# **HIBISCUS**

Hibiscus coccineus (red) • Hibiscus laevis (white to pink) Hibiscus moscheutos (white to cream) • Hibiscus grandiflorus (light-pink)





### **BALD CYPRESS**

#### (Taxodium distichum)

#### **DESCRIPTION**

Average Height: 60 to 80 ft

**Leaf Type:** Tiny on green, feather-like branchlets

**Leaf Size:** 1/4" to 3/8" long

**Flower Type:** No flowers; seeds formed in small, round female cones **Flower Color:** Cones green to brown; pollen formed in long delicate cones

Flowering Season: Pollen released in spring

Habitat: Marshes, rivers, lakes

Wildlife Value: Habitat for fish and other aquatic animals; birds nest in upper branches; wood ducks and

mammals feed on seeds **Distribution:** Statewide

**Overwinter:** Branchlets drop during late fall to early winter (one of a few deciduous conifers)

**Common Uses:** Either along the shoreline or offshore; frequently grouped in clusters of 3 or more, good

shade tree during spring through fall

#### **PLANTING REQUIREMENTS**

**Soil:** Sand to muck **Light:** Medium to high

Salinity: Low to medium (brackish)

**Propagation:** Seeds **Pest Problems:** None

**Growth Rate:** Medium, about 1 to 2 ft/yr **Water Depth:** Upland to 36" of water

**Density:** 10 ft apart

Planting: Grows well in dry (if watered frequently during establishment) to wet soil; don't plant in too deep

of water to increase survivability (seeds must be unflooded to germinate)

**Survivability:** High with small trees

Cost: Retail \$ 15.00 3 gal 5-6 ft \$ 25.00 7 gal 6-8 ft \$ 50.00 15 gal 8-10 ft

> Wholesale \$ 4.00 - 5.35 | 3 gal | 5-6 ft (100 minimum order) \$ 14.00 - 15.00 | 7 gal | 6-8 ft (100 minimum order)

\$ 35.00 – 40.00 15 gal 8-10 ft (100 minimum order)

# **BALD CYPRESS**

Taxodium distichum





### GOLDEN CANNA

(Canna flaccida)

#### **DESCRIPTION**

**Average Height:** 3 to 4 ft **Leaf Type:** Lance shape **Leaf Size:** 12 to 18" long

Flower Type: A few large flowers on a short spike

Flower Color: Yellow

**Flowering Season:** Mid spring to summer **Habitat:** Marshes, ponds, and lake margins

Wildlife Value: Butterfly attractor

**Distribution:** South, Central and North Florida (west to Franklin County) **Overwinter:** Hard freeze will brown upper leaves (lower leaves will remain

green), but will not kill plant

Common Uses: Ornamental plant with large, showy flowers producing season-

long color

#### **PLANTING REQUIREMENTS**

**Soil:** Sand to muck **Light:** Medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: Insect (aphids) leaf damage, not a preferred grass carp plant

**Growth Rate:** Fast

Water Depth: Dry, moist soils to intermittent flooding

**Density:** 18" apart

**Planting:** Will survive in low sunlight, but requires full sun to produce blooms

Survivability: High

**Cost:** Retail \$ 6.00 1 gal

Wholesale \$0.25 - 0.45 bareroot (1000 minimum order)

\$ 1.50 1gal (1000 minimum order)

# GOLDEN CANNA

(Canna flaccida)





### ALLIGATOR FLAG

(Thalia geniculata)

#### **DESCRIPTION**

Average Height: 6 to 8 ft Leaf Type: Lance shape Leaf Size: 1 to 2 1/2 ft long Flower Type: Panicled spikes

Flower Color: Purple

Flowering Season: Spring to summer

Habitat: Marshes, rivers

Wildlife Value: Habitat for aquatic animals; butterfly attractor; ducks and mammals feed on seeds

**Distribution:** Statewide

Overwinter: Dies back in winter; resprouts from rhizomes during spring

Common Uses: Can be used in partial shade areas and as protective cover for wildlife

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck

**Light:** Low/medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: Insect (aphids and spider mites) leaf damage, not a preferred grass carp plant

**Growth Rate:** Fast

Water Depth: Moist soils and intermittent flooding

**Density:** 3 ft apart

Planting: Strong winds can cause some leaf damage in unprotected areas

Survivability: High

**Cost:** Retail \$ 4.50 1 gal

Wholesale \$0.40 - 0.57\$ bareroot (1000 minimum order)

# ALLIGATOR FLAG

(Thalia geniculata)





### SOUTHERN BLUE-FLAG

(Iris virginica)

#### **DESCRIPTION**

**Average Height:** 2 to 2 1/2 ft

Leaf Type: Ribbon shape, or strap-like

**Leaf Size:** 2 to 2 1/2 ft long

Flower Type: Single flower at a time on short spike

Flower Color: Blue to blue-purple

Flowering Season: Spring

**Habitat:** Marshes, ponds and streams

Wildlife Value: Habitat for small aquatic animals; butterfly attractor

**Distribution:** Central and North Florida

**Overwinter:** Evergreen

Common Uses: Ornamental plant with showy flowers, especially when planted in dense groupings

#### **PLANTING REQUIREMENTS**

**Soil:** Sand to muck **Light:** Medium to high

Salinity: Low

**Propagation:** Seeds; rhizomes

Pest Problems: Infrequent caterpillar and aphid damage; not a preferred grass carp plant

Growth Rate: Medium

Water Depth: Water's edge, moist soils to intermittent flooding

**Density:** 1 to 2 ft apart

**Planting:** Will survive in low sunlight, but requires full sun to produce blooms

Survivability: High

**Cost:** Retail \$ 3.50 1 gal

Wholesale \$0.25 - 0.30 bareroot (1000 minimum order)

1.75 - 2.00 1gal (1000 minimum order)

# SOUTHERN BLUE-FLAG

(Iris virginica)





### SWAMP LILY

(Crinum americanum)

#### **DESCRIPTION**

**Average Height:** 2 ft

Leaf Type: Ribbon shape, or strap-like

**Leaf Size:** 12 to 24" long

Flower Type: 2 to 6 flowers on long stalk

Flower Color: White

Flowering Season: Spring to summer

Habitat: Marshes, rivers

Wildlife Value: Habitat for small aquatic animals; ducks and mammals feed on seeds

**Distribution:** Statewide

Overwinter: Hard freeze will cause leaves to turn yellow and burn, but will not kill plant

**Common Uses:** Along shoreline as a border plant; showy fragrant flowers

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck **Light:** Low to medium

Salinity: Low to medium (brackish)

**Propagation:** Seeds

Pest Problems: None, not a preferred grass carp plant

Growth Rate: Medium

Water Depth: Edge to 3" of water, seasonal wet areas

**Density:** 2 ft apart

Planting: Make sure leaves are above water and not in an area flooded all year; in nature, it's usually found

in partial or deep shade Survivability: High

**Cost:** Retail \$ 4.00 1 gal

Wholesale \$0.40 - 0.50\$ bareroot (1000 minimum order)

\$ 1.50 – 2.00 1 gal (1000 minimum order) \$ 3.50 - 5.00 3 gal (1000 minimum order)

# **SWAMP LILY**

(Crinum americanum)





### **DUCK POTATO**

(Sagittaria latifolia)

#### DESCRIPTION

**Average Height:** 2 1/2 ft **Leaf Type:** Arrowhead shape **Leaf Size:** 7 to 10" long

Flower Type: In whorls of 3 flowers on tall flowering stalk

Flower Color: White

**Flowering Season:** Spring to fall **Habitat:** Marshes, rivers, lakes

Wildlife Value: Habitat for fish and other aquatic animals; butterfly attractor; waterbirds and mammals feed

on seeds and tubers **Distribution:** Statewide

Overwinter: Hard freeze will brown margins of leaves, but will not kill plant

Common Uses: Along edge of shoreline, usually landward of arrowhead and pickerelweed

#### PLANTING REQUIREMENTS

Soil: Sand to muck Light: Low to high Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: Leaf spots and aphid damage occasionally; not a preferred grass carp plant

Growth Rate: Medium

Water Depth: Edge to 6" of water

**Density:** 2 ft apart

**Planting:** Make sure leaves are above water; plant landward of Sagittaria lancifolia

Survivability: High

**Cost:** Retail \$ 3.50 1 gal

Wholesale \$0.35 - 0.55 bareroot (1000 minimum order)

# **DUCK POTATO**

(Sagittaria latifolia)





### **ARROWHEAD**

(Sagittaria lancifolia)

#### **DESCRIPTION**

Average Height: 3 ft Leaf Type: Lance shape Leaf Size: 9 to 12" long

**Flower Type:** In whorls of 3 flowers on tall flowering stalk

Flower Color: White

Flowering Season: Spring to fall **Habitat:** Marshes, rivers, lakes

Wildlife Value: Habitat for fish and other aquatic animals; butterfly attractor; ducks and mammals feed on

seeds and tubers

**Distribution:** Statewide

Overwinter: Hard freeze will brown margins of leaves, but will not kill plant

Common Uses: Along shoreline, it's light-green leaves and white flowers are a good contrast to the dark-

green leaves and purple flowers of pickerelweed

#### PLANTING REQUIREMENTS

**Soil:** Sandy to muck **Light:** Medium to high

**Salinity:** Low to medium (brackish) **Propagation:** Seeds and rhizomes

Pest Problems: Weevils infrequently feed on flowering stalks; yellowing of leaves

during late fall; not a preferred grass carp plant

Growth Rate: Medium

Water Depth: 6 to 12" of water

**Density:** 1 to 2 ft apart

**Planting:** Make sure leaves are above water; tends to grow in slightly shallower water than pickerelweed

Survivability: High

**Cost:** Retail \$ 2.50 1 gal

Wholesale \$0.25 - 0.55\$ bareroot (1000 minimum order)

\$ 1.25 4" pot (1000 minimum order)

# **ARROWHEAD**

(Sagittaria lancifolia)





### **PICKERELWEED**

(Pontederia cordata)

#### **DESCRIPTION**

**Average Height:** 3 ft

Leaf Type: Lance to heart shape

**Leaf Size:** 7 to 10" long **Flower Type:** Spike **Flower Color:** Purple

Flowering Season: Spring to fall **Habitat:** Marshes, rivers, lakes

Wildlife Value: Habitat for fish and other aquatic animals; stems provide surface for apple snail attachment;

butterfly attractor; ducks and mammals feed on seeds

**Distribution:** Statewide

Overwinter: Hard freeze will brown leaves, but will not kill plant

**Common Uses:** Along shoreline as a border plant, provides good erosion control

#### PLANTING REQUIREMENTS

**Soil:** Sand or muck **Light:** Medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

**Pest Problems**: Not a preferred grass carp plant; insect (borer and weevil) damage on leaves and stems is not

uncommon, but usually will not kill plant

Growth Rate: Medium

Water Depth: 6 to 18" of water

**Density:** 1 to 2 ft apart

**Planting:** Make sure leaves are above water; tends to grow in slightly deeper water than arrowhead

Survivability: High

**Cost:** Retail \$ 2.25 1 gal

Wholesale \$0.25 - 0.45\$ bareroot (1000 minimum order)

\$ 1.25 4" pot (1000 minimum order)

# **PICKERELWEED**

(Pontederia cordata)





### SAND CORD GRASS

(Spartina bakeri)

#### DESCRIPTION

**Average Height:** 4 1/2 ft

**Leaf Type:** Rolled or curled grass leaves

**Leaf Size:** 10 to 30" long

Flower Type: Narrow cluster of small spikes

Flower Color: Bronze

Flowering Season: Summer to fall

Habitat: Marshes, lakes

Wildlife Value: Habitat for small animals; waterfowl and songbirds feed on seeds

**Distribution:** Statewide

Overwinter: Hard freezes may cause some leaf browning

Common Uses: Along shoreline in fresh and brackish waters; good erosion control

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck **Light:** Medium to high

**Salinity:** Low to medium (brackish to saline tidal marshes)

**Propagation:** Seeds and rhizomes (division)

**Pest Problems:** None **Growth Rate:** Medium

Water Depth: Dry to moist soils; can survive in dry soils and extended flooded areas for long periods of

time

**Density:** 3 ft apart

**Planting:** Establish at or above shoreline in moist soils

Survivability: High

**Cost:** Retail \$ 3.50 1 gal

\$ 8.50 3 gal

Wholesale \$ 0.35 bareroot (1000 minimum order)

\$ 1.40 – 1.75 1 gal (1000 minimum order) \$ 3.50 - 4.00 3 gal (1000 minimum order)

# SAND CORD GRASS

(Spartina bakeri)





### SOFT RUSH

(Juncus effusus)

#### DESCRIPTION

**Average Height:** 3 to 4 ft

Leaf Type: Leaves inconspicuous; stems green, round, tubular

Leaf Size: Blades absent; stems elongated with stiff green bract rising above flower cluster

Flower Type: Cluster of spikelets Flower Color: Greenish-brown Flowering Season: Summer

**Habitat:** Marshes

Wildlife Value: Habitat (shelter and nesting) for aquatic mammals and birds; ducks and small mammals feed

on seeds

**Distribution:** Statewide **Overwinter:** Evergreen

Common Uses: Along shoreline in fresh and brackish water areas; good erosion control plant

#### PLANTING REQUIREMENTS

**Soil:** Sandy to muck **Light:** Medium to high

**Salinity:** Low to medium (brackish) **Propagation:** Seeds and rhizomes

**Pest Problems:** None; not a preferred grass carp plant

Growth Rate: Medium

Water Depth: Moist soils; can survive extended flooding

**Density:** 3 ft apart

**Planting:** Can be sectioned into individual plants or clumps

Survivability: High

**Cost:** Retail \$ 5.00 1 gal

Wholesale \$ 0.25 - 0.30 bareroot (1000 minimum order)

1.50 - 1.80 1 gal (1000 minimum order)

# SOFT RUSH

(Juncus effusus)





### **SPIKERUSH**

(Eleocharis cellulosa & interstincta)

#### **DESCRIPTION**

Average Height: 2 1/2 ft

Leaf Type: Leaves inconspicuous; stems green, round, tubular

Leaf Size: Blades are absent, stems elongated

Flower Type: Small short spike with scales, not showy

**Flower Color:** Yellow-brown **Flowering Season:** Spring to fall

Habitat: Marshes, lakes

Wildlife Value: Habitat for fish and other aquatic animals; ducks and mammals feed on seed head

**Distribution:** Statewide

**Overwinter:** Yellowing of stems

Common Uses: Adds diversity to shoreline plants and attracts wildlife

#### **PLANTING REQUIREMENTS**

**Soil:** Sand to muck **Light:** Medium to high

**Salinity:** Low to medium (brackish) **Propagation:** Seeds and rhizomes

Pest Problems: None; not a preferred grass carp plant

Growth Rate: Medium

Water Depth: 6 to 12" of water

**Density:** 2 ft apart

**Planting:** Prefers shallow water areas, clumps soon send out rhizomes

Survivability: High

**Cost:** Retail \$ 2.50 1 gal

Wholesale \$ 0.25 to 0.45 bareroot (1000 minimum order)

# **SPIKERUSH**

(Eleocharis cellulosa & interstincta)





### PASPALIDIUM GRASS

(Paspalidium geminatum)

#### **DESCRIPTION**

**Average Height:** 3 ft

Leaf Type: A grass; leaves with sheaths and blades

**Leaf Size:** 8 to 12" long

Flower Type: Spikelet seed head

Flower Color: Green Flowering Season: All year

Habitat: Marshes, rivers, and lakes

Wildlife Value: Excellent habitat for fish and other aquatic animals

**Distribution:** Statewide

**Overwinter:** Stems and leaves may brown in hard freeze

Common Uses: Planted in shallows beyond shoreline plants such as pickerelweed to improve fisheries

#### PLANTING REQUIREMENTS

Soil: Sand to muck Light: Medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: None, not a preferred grass carp plant

**Growth Rate:** Medium

Water Depth: 12 to 18" of water

**Density:** 2 ft apart

Planting: Leaves must be above water; place rhizomes on top or slightly below soil; weigh down if neces-

sary in windy areas

Survivability: Medium to high

**Cost:** Retail \$ 3.00 1 gal

Wholesale \$0.45 - 0.55 2" pot (1000 minimum order)

# PASPALIDIUM GRASS

(Paspalidium geminatum)





### **MAIDENCANE**

#### (Panicum hemitomon)

#### DESCRIPTION

**Average Height:** 3 ft

Leaf Type: A grass; leaves with sheaths and blades

**Leaf Size:** 7 to 11" long

Flower Type: Spikelet seed head

Flower Color: Green Flowering Season: Summer Habitat: Marshes, rivers, lakes

Wildlife Value: Excellent habitat for fish and other aquatic animals, especially invertebrates; seeds fed upon

by songbirds

**Distribution:** Statewide

Overwinter: Stems and leaves may brown in hard freeze

Common Uses: Planted in shallows beyond shoreline plants such as pickerelweed to improve fisheries

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck **Light:** Medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

**Pest Problems:** None, not a preferred grass carp plant

Growth Rate: Medium

Water Depth: 12 to 18" of water

**Density:** 2 ft apart

**Planting:** Make sure leaves are above water and rhizomes are firmly in soil

Survivability: Medium to high

**Cost:** Retail \$ 2.25 1 gal

Wholesale \$ 0.25 - 0.40 bareroot (1000 minimum order)

\$ 0.45 - 0.55 2" pot (1000 minimum order) \$ 0.75 - 0.80 4" pot (1000 minimum order)

# **MAIDENCANE**

(Panicum hemitomon)





### JOINTED FLAT SEDGE

(Cyperus articulatus)

#### **DESCRIPTION**

**Average Height:** 5 ft

Leaf Type: Leaves inconspicuous; stems green, round, tubular

Leaf Size: Blades are absent, stems elongated

Flower Type: Cluster of spikelets Flower Color: Light-brown Flowering Season: Summer to fall Habitat: Marshes, rivers, lakes

Wildlife Value: Habitat for fish and other aquatic animals; songbirds feed on seeds

**Distribution:** Statewide

**Overwinter:** Some browning of stems

Common Uses: Offshore, planted in deeper water

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck **Light:** Medium to high

**Salinity:** Low to medium (brackish) **Propagation:** Seeds and rhizomes

Pest Problems: None; not a preferred grass carp plant

**Growth Rate:** Medium

Water Depth: 18 to 30" of water

**Density:** 3 ft apart

**Planting:** Use small plants versus large mature plants; place between shoreline plants and bulrush/water lily plants; stems are frequently bent over mid-way to prevent whipping of plants in windy areas; new stems will

sprout.

Survivability: High

**Cost:** Retail \$ 4.00 1 gal

Wholesale \$0.60 - 0.85\$ bareroot (1000 minimum order)

# JOINTED FLAT SEDGE

(Cyperus articulatus)





### **BULRUSH**

(Scirpus californicus & validus)

#### **DESCRIPTION**

**Average Height:** S. californicus – 6 to 9 ft

S. validus – 4 to 5 ft

Leaf Type: Leaves inconspicuous. Stems green, round tubular, tall

Leaf Size: Reduced sheaths with blades absent.

Flower Type: Spikelets, not showy

Flower Color: Brown

Flowering Season: Spring to fall **Habitat:** Marshes, rivers, lakes

Wildlife Value: Excellent habitat for fish and other aquatic animals; stems provide surface for apple snail

and invertebrate attachment; ducks, songbirds and mammals feed on seeds

**Distribution:** Statewide

**Overwinter:** Generally evergreen

Common Uses: Plant offshore in deeper water to improve fisheries and for songbird/wading bird habitat

#### **PLANTING REQUIREMENTS**

**Soil:** Sandy or muck **Light:** Medium to high

**Salinity:** Low to medium (brackish) **Propagation:** Seeds and rhizomes

Pest Problems: At times insect damage can be heavy, especially during early fall; not a preferred grass carp

plant

Growth Rate: Medium

Water Depth: 24 to 36" of water

**Density:** 3 ft apart

**Planting:** Use small plants versus large mature plants; stems are frequently bent over mid-way to prevent whipping of plants in windy areas; weigh down plants in deeper water; seeds can be spread in shallow muddy

areas

Survivability: Medium

**Cost:** Retail \$ 2.60 1 gal

Wholesale \$0.35 - 0.45 bareroot (1000 minimum order)

# **BULRUSH**

(Scirpus californicus & validus)





### YELLOW WATER LILY

(Nymphaea mexicana)

#### **DESCRIPTION**

**Average Height:** Floating leaves **Leaf Type:** Roundish heart shapes

Leaf Size: 6" to 8" wide

Flower Type: Single flower per stem

**Flower Color:** Yellow **Flowering Season:** Summer

**Habitat:** Marshes, lakes and quiet streams

Wildlife Value: Habitat and shade for fish and other aquatic animals; mammals feed on tender stems

**Distribution:** Statewide

Overwinter: Perennial, majority of the leaves die off; overwintering rhizomes or stolons develop in late fall

and occasionally produce small leaves.

Common Uses: Deep water plant used to improve fisheries, showy yellow blooms attractive

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck **Light:** Medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: Insect leaf damage; turtles and small mammals feed on the leaves; not a preferred grass carp

plant

Growth Rate: Medium

Water Depth: 24" to 36" of water

**Density:** 5 ft apart

**Planting:** Place rhizome cluster just below soil (trim off stolons)

Survivability: Medium

Cost: Retail \$ 16.00 1 gal (multi-leaf)

Wholesale \$ 2.50 - 3.00 bareroot (1000 minimum order)

# YELLOW WATER LILY

(Nymphaea mexicana)





### FRAGRANT WATER LILY

(Nymphaea odorata)

#### **DESCRIPTION**

**Average Height:** Floating leaves

**Leaf Type:** Large, roundish heart shapes

**Leaf Size:** 10 to 18" wide

Flower Type: Single flower per stem

Flower Color: White

Flowering Season: Spring to fall

Habitat: Marshes, lakes, and quiet streams

Wildlife Value: Habitat and shade for fish and other aquatic animals; invertebrates attach on underside of

leaves; ducks and mammals feed on seeds and stems

**Distribution:** Statewide **Overwinter:** Evergreen

**Common Uses:** Deep water plant for fisheries; showy sweet-scented flowers aesthetically pleasing

#### PLANTING REQUIREMENTS

**Soil:** Sand to muck **Light:** Medium to high

Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: Insect and fungal leaf damage; ducks, turtles and small mammals feed on the leaves; not a

preferred grass carp plant **Growth Rate:** Medium

Water Depth: 30 to 36" of water

**Density:** 5 ft apart

Planting: Use a 18 to 24" long rhizome for planting, place on soil, weight down; leaf tear damage may occur

in windy areas **Survivability:** High

**Cost:** Retail \$ 16.00 1 gal

Wholesale \$0.90 - 1.20\$ bareroot (1000 minimum order)

# FRAGRANT WATER LILY

(Nymphaea odorata)





### **SPATTERDOCK**

(Nuphar luteua/advena)

#### **DESCRIPTION**

Average Height: Floating leaf or extending several inches above water surface

Leaf Type: Heart shaped, longer than wide

Leaf Size: 10 to 13" long

Flower Type: Single, ovoid shape flower per stem

Flower Color: Yellow

Flowering Season: Late winter to summer

Habitat: Marshes, rivers, lakes

Wildlife Value: Habitat and shade for fish and other aquatic animals; waterbirds feed on seeds

**Distribution:** Statewide

**Overwinter:** No freeze damage (see pest problem below) **Common Uses:** Deep water plant; good plant for fisheries

#### **PLANTING REQUIREMENTS**

**Soil:** Sand to muck **Light:** Medium - high

Salinity: Low

**Propagation:** Seeds and rhizomes

Pest Problems: Heavy insect damage to leaves and upper stems during winter; not a preferred grass carp

plant

**Growth Rate:** Fast in muck **Water Depth:** 30 to 36" of water

**Density:** 5 ft apart

Planting: Use small plant with submersed leaves or use 8 to 12" length rhizome for planting; place on soil,

weigh down, leaves may die off soon after planting with new sprouts occurring in several weeks

Survivability: High

**Cost:** Retail \$ 12.00 1 gal

Wholesale \$1.00 - 1.10\$ bareroot (1000 minimum order)



# **SPATTERDOCK**

(Nuphar luteua/advena)





## TAPE-GRASS, EEL-GRASS

(Vallisneria americana)

#### **DESCRIPTION**

**Average Height:** Plants submersed, 6 inches tall to several feet (horizontal length in flowing water)

**Leaf Type:** Ribbon shape

**Leaf Size:** 6 inches to several feet (in flowing water)

Flower Type: Single flower per stalk; only female flowers seen at surface

**Flower Color:** White, tiny green tube **Flowering Season:** Spring to summer

Habitat: Rivers, lakes

Wildlife Value: Excellent habitat for fish and other aquatic animals including invertebrates; waterfowl feed

on leaves and flowers **Distribution:** Statewide **Overwinter:** Evergreen

Common Uses: Excellent submersed species for fisheries; good competitor to invasive species such as

hydrilla; reduces turbidity from sediments

#### **PLANTING REQUIREMENTS**

Soil: Sand to muck Light: Low to high

**Salinity:** Low to medium (brackish)

**Propagation:** Seeds, rhizomes and winter buds

**Pest Problems:** Not a preferred grass carp plant; turtles feed on leaves

Growth Rate: Medium

Water Depth: 12" to 36" of water

**Density:** 2 ft apart

**Planting:** Plant in shallow water for best results; fence in area to prevent turtles from eating leaves; plant winter vegetative buds by burying them into the sediment 2 to 3" deep; make sure filamentous algae doesn't

cover water surface and shade out eel-grass

**Survivability:** Low

**Cost:** Retail \$ 1.00 bareroot

Wholesale \$0.25 - 0.30 bareroot (1000 minimum order)

# TAPE-GRASS, EEL-GRASS

(Vallisneria americana)



