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SUMMARY SHEETS: ATTRIBUTES OF WISCONSIN LAKE PLANTS

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and

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> Open-File Report 91-4 117 p.

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SPECIES: Acorus calamus SPECIES CODE: ACOCA COMMON NAME: sweetflag BASIC INFORMATION* Life form: E Life cycle: P Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown -Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Water- Other Other Musk- Substrate Potenfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value Ρ х -_ -Х Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Roots Cuttings Tubers buds Seeds ------------------х HERBICIDE SUSCEPTIBILITY* Endothall Diguat 2-4,D Glyphosate Fluridone Simazine ------ - - - - - - - - -Ν N С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Brasenia schreberi SPECIES CODE: BRASC COMMON NAME: watershield **BASIC INFORMATION*** Life form: FL Life cycle: P Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ----0 Y D D Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Water-Fish fowl Food fowl bird bird rat stabili- tial food value cover food cover food zation nuisance value ----- ----- ----- ----- ------ ------G S X С Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Roots Cuttings Tubers buds Seeds --------_ _ _ _ _ _ _ _ _ ---------Х x x HERBICIDE SUSCEPTIBILITY* 0 / D 01 1... ----~ •

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
N	N	С	-	N	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Carex sp. or spp. SPECIES CODE: CARSP COMMON NAME: --**BASIC INFORMATION*** Life form: E Life cycle: B Status: -Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown -----------------Ι Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S	F	Х	-	-	-	Х	-	S

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Transplants	Whole plants	Roots	Cuttings	Tubers	Winter buds	Seeds	
х	-	х	-	-	-	х	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

COMMON NAME: bristly sedge BASIC INFORMATION* Life form: E Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ----_ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Water-Fish fowl Food fowl bird bird rat stabili- tial food value cover food cover food zation nuisance value F Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Roots Cuttings buds Tubers Seeds ------------------------------

SPECIES CODE: CARCO

HERBICIDE SUSCEPTIBILITY*

SPECIES: Carex comosa

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
					_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

COMMON NAME: hornwort **BASIC INFORMATION*** Life form: S Life cycle: P Status: A Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Lide cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown Y v V S Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water-Water- Other Other Musk-Substrate Potenfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value X S,F F X F.S Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Cuttings Tubers buds Roots Seeds --------- - - - -..... ----Х HERBICIDE SUSCEPTIBILITY*

SPECIES CODE: CERDE

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	С	С	-	С	С	

SPECIES: Ceratophyllum demersum

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ceratophyllum echinatum SPECIES CODE: CEREC COMMON NAME: spiny hornwort **BASIC INFORMATION*** Life form: S Life cycle: -Status: R Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ---------------------S -Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Waterfowl Food fowl bird bird rat stabili- tial Fishfood value cover food cover food zation nuisance value -------Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS***

	Whole				Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
-	-	-	-	-	-	-	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Chara sp. or spp. SPECIES CODE: CHASP COMMON NAME: muskgrass **BASIC INFORMATION*** Life form: S Life cycle: -Status: A Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown Ν v ν 0 Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Waterfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value X F G Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Roots Cuttings Tubers buds Seeds _ _ _ _ _ _ _ -------------------------Х Х HERBICIDE SUSCEPTIBILITY*

EndothallDiquat2-4,DGlyphosateFluridoneSimazine?NNNC

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Cyperus sp. or spp. SPECIES CODE: CYPSP COMMON NAME: --BASIC INFORMATION* Life form: E Life cycle: B Status: -Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Turbidity Summer drawdown Winter drawdown Substrate ------------.... Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Waterfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value ----------_ _ _ _ _ _ F S Х Х S Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	x	X	-	х	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
_	_	_	_	-	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Decodon verticillatus SPECIES CODE: DECVE COMMON NAME: swamp loosestrife **BASIC INFORMATION*** Life form: E Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Turbidity Winter drawdown Substrate Summer drawdown -----...... -Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Waterfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value ---- -------- ---- -----S Ρ Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Dulichium arundinaceum COMMON NAME: pond sedge **BASIC INFORMATION*** Life form: E Life cycle: -Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown 0 Y Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water-Water-OtherOtherMusk-SubstratePoten-fowlFoodfowlbirdratstabili-tialFishfoodvaluecoverfoodcoverfoodzationnuisancevalue Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Roots Cuttings Tubers buds Seeds -_

SPECIES CODE: DULAR

HERBICIDE SUSCEPTIBILITY*

Diquat 2-4,D Glyphosate Fluridone Simazine Endothall -

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Eleocharis sp. or spp.

SPECIES CODE: ELESP

COMMON NAME: --

BASIC INFORMATION*

Life form: E

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Life cycle: B

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
Т	G	•	S	х	Х	-	-	F,S,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	х	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
					-
_	_	_	_		_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Eleocharis acicularis SPECIES CODE: ELEAC COMMON NAME: needle spike-rush **BASIC INFORMATION*** Life form: S-E Life cycle: -Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ----Н Y Ι D Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili- zation		
						2411011		
-	F	-	-	-	-	-	х	S

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	Х	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Eleocharis palustris

SPECIES CODE: ELEPAL

COMMON NAME: creeping spike-rush

BASIC INFORMATION*

Life form: E Life cycle: - Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	F	Х	-	-	-	-	-	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	х	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Eleocharis robbinsii SPECIES CODE: ELEROB COMMON NAME: --BASIC INFORMATION* Life form: E Life cycle: - Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Elodea sp. or spp. SPECIES CODE: ELOSP COMMON NAME: --**BASIC INFORMATION*** Life form: S Life cycle: P Status: -Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Summer drawdown Winter drawdown Substrate Turbidity -------------------Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-WaterfowlFoodfowlbirdbirdratstabili-tialFishfoodvaluecoverfoodcoverfoodzationnuisancevalue F Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter

TransplantsplantsRootsCuttingsTubersbudsSeedsXX-X----

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
					_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Elodea canadensis

COMMON NAME: common waterweed

BASIC INFORMATION*

Life form: S Life cycle: P Status: A

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown

S	Y	v	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial		
F	F	-	-	-	-	-	Х	-	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole			Winter		
Transplant	s plants	Roots	Cuttings	Tubers	buds	Seeds
X	Х	-	X	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	С	N	-	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Equisetum sp. or spp.

SPECIES CODE: EQUSP

COMMON NAME: --

BASIC INFORMATION*

Life form: E

Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
F	Р	-	-	-	Х	Х	х	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

-	-	-	-	-	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

COMMON NAME: water horsetail BASIC INFORMATION* Life form: E Life cycle: P Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown N Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-WaterfowlFoodfowlbirdbirdratstabili-tialFishfoodvaluecoverfoodcoverfoodzationnuisancevalue Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants plants Roots Cuttings Tubers buds Seeds ------------------ ------..... -

SPECIES CODE: EQUFL

HERBICIDE SUSCEPTIBILITY*

SPECIES: Equisetum fluviatile

Endothall Diquat 2-4,D Glyphosate Fluridone Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Eriocaulon septangulare SPECIES CODE: ERISE COMMON NAME: pipewort **BASIC INFORMATION*** Life form: S Life cycle: -Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Summer drawdown Winter drawdown Turbidity ---------. -----Н Ν Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES*

Water	· _	Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-		-	_	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter			
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Heteranthera dubia

SPECIES CODE: HETDU

COMMON NAME: water star grass

BASIC INFORMATION*

Life form: S

Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
			• • • • • • • • • • • • • • • • • • • •
0	Y	-	-

Life cycle: P

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases. V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S	Р	-	-	-	-	-	х	F,S

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole			m . 1	Winter	0 1 -
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-		-		-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	С	N	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

COMMON NAME: spiny-spore quillwort BASIC INFORMATION*

Life cycle: -

Life form: S

SPECIES: Isoetes echinospora

Status: R

SPECIES CODE: ISOEC

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
-	-	-	-	-	-	-	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES CODE: ISOMA SPECIES: Isoetes macrospora COMMON NAME: lake guillwort **BASIC INFORMATION*** Life form: S Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Turbidity Substrate Summer drawdown Winter drawdown -------------------Н _ Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk-Water-Substrate Potenfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value -----Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter			
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Juncus sp. or spp.

SPECIES CODE: JUNSP

COMMON NAME: --

BASIC INFORMATION*

Life form: E Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
				•				
-	-		-	-	-	х	X	S

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Transplants	Whole	Poots	Cuttingo	Tubers	Winter	Seeds	
-	-		5	Tubers	buus	seeus	
-	-	-	-	-	-	-	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
_	_	_	_	_	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES CODE: JUNPE SPECIES: Juncus pelocarpus COMMON NAME: brown-fruited rush BASIC INFORMATION* Life form: E Life cycle: -Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ---------------------Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-		-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	С	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Lemna sp. or spp.

SPECIES CODE: LEMSP

COMMON NAME: --

BASIC INFORMATION*

Life form: FF

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	v	v

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	х	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
N	С	N	-	С	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Lemna minor

COMMON NAME: small duckweed

BASIC INFORMATION*

Life form: FF Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	Y	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	G	-	-	-	-	-	Х	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	x	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
N	С	N	-	С	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Lemna trisulca

SPECIES CODE: LEMTR

COMMON NAME: forked duckweed

BASIC INFORMATION*

Life form: FF Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili- zation		
-	G	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter			
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	Х	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_		_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES CODE: LOBDO SPECIES: Lobelia dortmanna COMMON NAME: water lobelia BASIC INFORMATION* Life form: S Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Summer drawdown Winter drawdown Turbidity --------------------Η Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water-Water- Other Other Musk-Substrate Potenfowl Food fowl bird bird rat stabili- tial Fish food value cover food cover food zation nuisance value -----Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat **PROPAGATION METHODS*** Whole Winter Transplants Cuttings Tubers buds plants Roots Seeds ---------------------- - - - - -----

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Megalodonta beckii SPECIES CODE: MEGBE COMMON NAME: water marigold **BASIC INFORMATION*** Life form: S Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown _____ ----------------S Ν I Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
	· •							
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: S Life cycle: P

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl :	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter	Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	х	-	Х	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	C	С	-	-	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum alterniflorum

COMMON NAME: alternate flowered water milfoi

BASIC INFORMATION*

Life form: S

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	N	-	-

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili- zation		
-	-	-	-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
• • • • • • • • • • • • •						
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum exalbescens SPECIES CODE: MYREX COMMON NAME: spiked water milfoil **BASIC INFORMATION*** Life form: S Life cycle: -Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown S N,Y v v Substrate preference: S-soft, H-hard, O-no preference

Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	F	-	-	-	-	-	Х	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
			••••		
?	-	-	-	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum farwellii SPECIES CODE: MYRFA COMMON NAME: Farwells water milfoil **BASIC INFORMATION*** Life form: S Life cycle: -Status: R Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Summer drawdown Winter drawdown Substrate Turbidity --------------_ _ _ _ _ _ _ _ _ _ S Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES*

Water-Water-OtherOtherMusk-SubstratePoten-fowlFoodfowlbirdratstabili-tialFishfoodvaluecoverfoodcoverfoodzationnuisancevalue

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum heterophyllum

COMMON NAME: various leaved water milfoil

BASIC INFORMATION*

Life form: S Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	-	v	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown; I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fow1	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum spicatum

SPECIES CODE: MYRSPI

COMMON NAME: Eurasian water milfoil

BASIC INFORMATION*

Life form: S Life cycle: - Status: I,N

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	N	v	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
						zacion		
				-		-		

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	С	С	N	С	?

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum tenellum

COMMON NAME: dwarf water milfoil

BASIC INFORMATION*

Life form: S Life cycle: -

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
H	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Myriophyllum verticillatum

COMMON NAME: whorled water milfoil

BASIC INFORMATION*

Life form: S Life cycle: -

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
		•••·	
0	N , Y	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	· _

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Najas sp. or spp.

SPECIES CODE: NAJSP

COMMON NAME: --

BASIC INFORMATION*

Life form: S Life cycle: A

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	S	-	-	-	X	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	х	-	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
C	С	- elas	-	?	С	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Najas flexilis

SPECIES CODE: NAJFL

COMMON NAME: slender naiad

BASIC INFORMATION*

Life form: S

Status: A

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
Н	N	v	I

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili- zation		
S,F	Е	-	-	-	-	-	Х	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	С	N	N	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Najas gracillima

SPECIES CODE: NAJGR

COMMON NAME: --

BASIC INFORMATION*

Life form: S Life cycle: - Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	N	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Najas guadalupensis

COMMON NAME: southern naiad

BASIC INFORMATION*

Life form: S

Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown

-	N	-	D

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,F	E	-	-	-	-	-	х	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		_	Winter	
Transplants	•	0		buds	Seeds
_		 			

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	С	N	-	С	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Najas marina

SPECIES CODE: NAJMA

COMMON NAME: spiny naiad

BASIC INFORMATION*

Life form: S Life cycle: -

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,F	F	-	-	-	-	-	х	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nelumbo lutea

SPECIES CODE: NELLU

COMMON NAME: American lotus

BASIC INFORMATION*

Life form: FL Life cycle: P Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	v	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-	-	Х	Х	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	Х	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
?	?	С	?	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nitella sp. or spp.

SPECIES CODE: NITSP

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COMMON NAME: nitella

BASIC INFORMATION*

Life form: S

Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdown00--

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	-	-	-	-	С	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nuphar sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: FL Life cycle: P

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

						Substrate stabili-		Fish
						zation		
-	-	-	-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
N	N	С	С	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nuphar advena

...

COMMON NAME: yellow pond lily

BASIC INFORMATION*

Life form: FL Life cycle: P Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	0	D	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
?	-	С	С	?	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nuphar microphyllum

SPECIES CODE: NUPMI

COMMON NAME: yellow pond lily

BASIC INFORMATION*

Life form: FL Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

for	wl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S		F	-	S	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole					
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-		-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
_	_				

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nuphar variegatum SPECIES CODE: NUPVA COMMON NAME: bull-head pond lily BASIC INFORMATION* Life form: FL Life cycle: P Status: A Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Turbidity Substrate Summer drawdown Winter drawdown -----_____ -----........ S Ν v D Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	F	-	-	-	-	-	•	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	X	-	-	æ	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nymphaea sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: FL Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fow1	Food	fow1	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	Р	-	S,T,F	-	-	Х	х	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	Х	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazíne
?	N	С	С	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nymphaea odorata

SPECIES CODE: NYMOD

COMMON NAME: fragrant water lily

BASIC INFORMATION*

Life form: FL Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
	····		
0	Y	v	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili-	tial	
						zation		value
						-		F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
?	-	С	C	С	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Nymphaea tuberosa

SPECIES CODE: NYMTU

COMMON NAME: white water lily

BASIC INFORMATION*

Life form: FL Life cycle: P Status: A

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	0	-	D

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Transplants	Whole plants	Roots	Cuttings	Tubers	Winter buds	Seeds
 X		 X	 -	x	 -	 X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

 SPECIES: Phragmites australis
 SPECIES CODE: PHRAU

 COMMON NAME: common reed
 BASIC INFORMATION*

 BASIC INFORMATION*
 Life form: E

 Life form: E
 Life cycle: P

 Status: I
 Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
						x		

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	Ċ	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Polygonum sp. or spp.

SPECIES CODE: POLSP

COMMON NAME: --

BASIC INFORMATION*

Life form: FL-E Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	E	-	-	-	-	Х	Х	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole			Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	N	С	С	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES CODE: POLAM SPECIES: Polygonum amphibium COMMON NAME: water knotweed BASIC INFORMATION* Life form: FL Life cycle: P Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown -----------------0 Y Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	Е	-	-	-	-	Х	Х	-

Drawdown: I-increases with drawdown, D-decreases, V-variable response

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Polygonum coccineum

SPECIES CODE: POLCO

COMMON NAME: water heartsease

BASIC INFORMATION*

Life form: FL Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	I	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	G	-	-	-	~	Х	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Pontederia cordata SPECIES CODE: PONCO COMMON NAME: pickerel-weed **BASIC INFORMATION*** Life form: E Life cycle: P Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ----0 Ν

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S	Р	х	-	-	X	-	х	С

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Whole					Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
Х	-	Х	-	-	-	X	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	.	?	?	N	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: S Life cycle: P

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-	-	-	Х	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-		-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	?	-	-	?	С	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton amplifolius SPECIES CODE: POTAM COMMON NAME: large-leaf pondweed **BASIC INFORMATION*** Life cycle: P Life form: S Status: A Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown -----------_____ ---v S O,N

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S	F	-	-	-	-	-	-	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Transplants	Whole plants Roots Cuttings			Winter Tubers buds Seeds		
X		X	X			х Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	?	N	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton berchtoldii

SPECIES CODE: POTBE

COMMON NAME: --

BASIC INFORMATION*

Life form: S

Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdownHY--

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	-	-	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton capillaceus

SPECIES CODE: POTCA

COMMON NAME: --

BASIC INFORMATION*

Life form: S

Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	-	-

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	F	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton crispus

SPECIES CODE: POTCR

COMMON NAME: curly-leaf pondweed

BASIC INFORMATION*

Life form: S Life cycle: - Status: C,N

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdownSY--

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T	P	-	-	-	-	-	Х	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	B	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	С	N	-	С	С	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton diversifolius

COMMON NAME: water-thread pondweed

BASIC INFORMATION*

Life form: S Life cycle: - Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	-	-	I

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial		
S	F	-	-	-	-	-	-	-	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
* * • • • • • • •					
С	?	N	-	С	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton epihydrus

SPECIES CODE: POTEP

COMMON NAME: ribbon-leaf pondweed

BASIC INFORMATION*

Life form: S Life cycle: - Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	0	-	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

						Substrate stabili-		Fish
food	value	cover	food	cover	food	zation	nuisance	value

S,T,F	G	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
• • • • • • • • • • • • • • • • • • •						
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	-	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton filiformis

SPECIES CODE: POTFI

t

COMMON NAME: thread-leaf pondweed

BASIC INFORMATION*

Life form: S Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

 Substrate
 Turbidity
 Summer drawdown
 Winter drawdown

 0
 N

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl food	Food	fowl cover	bird food	bird cover	rat food	Substrate stabili- zation	tial nuisance	value
						-		

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter	Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	-	-	-	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton foliosus

SPECIES CODE: POTFO

COMMON NAME: leafy pondweed

BASIC INFORMATION*

Life form: S Life cycle: P

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

 Substrate
 Turbidity
 Summer drawdown
 Winter drawdown

 S
 Y

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T,F	G	-	-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	-	-	-	Х	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	С	N	-	C	С	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton friesii SPECIES CODE: POTFR COMMON NAME: Fries pondweed **BASIC INFORMATION*** Life form: S Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbicity Turbidity Summer drawdown Winter drawdown ---------N Substrate preference: S-soft, H-hard, O-no preference

Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,F	G	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

\$

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
	_			_	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton gramineus

SPECIES CODE: POTGR

COMMON NAME: variable-leaf pondweed

BASIC INFORMATION*

Life form: S

Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

Life cycle: P

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
Н	0 , N	-	V

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T	G	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	X	х	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall Diquat 2-4,D Glyphosate Fluridone Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton illinoensis

SPECIES CODE: POTIL

COMMON NAME: Illinois pondweed

BASIC INFORMATION*

Life form: S Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

 Substrate
 Turbidity
 Summer drawdown
 Winter drawdown

 0
 N

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water	-	Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	F	-	-	-	-	-	X	С

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton natans

SPECIES CODE: POTNA

Status: A

COMMON NAME: floating-leaf pondweed

BASIC INFORMATION*

Life form: S Life cycle: P

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	0	D	I

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T	G	-	-	-	-	Х	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	X	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	С	?	-	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton nodosus SPECIES CODE: POTNO COMMON NAME: long-leaf pondweed BASIC INFORMATION*

Life form: S Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	Y	-	•

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S	G	-	-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	Х	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	?	N	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton oakesianus

COMMON NAME: --

BASIC INFORMATION*

Life form: S

Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

 Substrate
 Turbidity
 Summer drawdown
 Winter drawdown

 H

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

		Winter				
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_		_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton obtusifolius

SPECIES CODE: POTOB

COMMON NAME: --

BASIC INFORMATION*

Life form: S Life cycle: -

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	birđ	rat	Substrate stabili- zation	tial	
								 F.C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole			Winter				
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds		
-	-	-	-	-	-	-		

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
_	_	-	_	_	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton pectinatus

COMMON NAME: sago pondweed

BASIC INFORMATION*

Life form: S

Status: A

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	Y	-	V

Life cycle: P

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	Е	-	-	-	-	-	Х	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter				
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
Х	-	Х	X	X	-	X	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
С	С	N	-	С	C	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton praelongus

SPECIES CODE: POTPR

Status: C

COMMON NAME: white-stem pondweed

BASIC INFORMATION*

Life form: S Life cycle: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdownSN--

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T,F	F	-	-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
· · · · · · · · · · · · · · · ·						
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
				_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton pusillus

SPECIES CODE: POTPUS

COMMON NAME: small pondweed

BASIC INFORMATION*

Life form: S Life cycle: P Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	Y	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T,F	G	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

		Winter				
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	-	د.	-	Х	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	С	N	-	-	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton richardsonii SPECIES CODE: POTRI COMMON NAME: clasping-leaf pondweed BASIC INFORMATION* Life form: S Life cycle: P Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown -------------V 0 O.N Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water-Water- Other Other Musk-Substrate Potenfowl Food fowl bird bird rat stabili- tial Fish

food	value	cover	food	cover	food	zation	nuisance	value
S,T,F	G	-	-	-	-	e	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	Х	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	N	N	-	С	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton robbinsii

SPECIES CODE: POTRO

COMMON NAME: fern pondweed

BASIC INFORMATION*

Life form: S

Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	0	-	D

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Whole					Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
-	-	-	-	-	-	-	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
	-					

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton spirillus

Status: I

COMMON NAME: spiral-fruited pondweed

BASIC INFORMATION*

Life form: S Life cycle: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	F	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
Х	х	-	-	-	-	Х	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	<u> -</u>	-	-		-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

^{*} X-plant useful or usable method, - information unknown or unreported

SPECIES: Potamogeton strictifolius

COMMON NAME: stiff pondweed

BASIC INFORMATION*

Life form: S Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown H - - -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fow1	bird	bird	rat	Substrate stabili- zation	tial	
S	G	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	С	N	-	-	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton vaginatus

SPECIES CODE: POTVAG

COMMON NAME: swift-water pondweed

BASIC INFORMATION*

Life form: S Life cycle: -

Status: R,EN

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
		•••••	
0	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
••••						
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
	_	_	-	_	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Potamogeton zosteriformis

SPECIES CODE: POTZO

COMMON NAME: flat-stem pondweed

BASIC INFORMATION*

Life form: S

Status: A

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	N	-	V

Life cycle: P

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

					Substrate		
					 stabili. zation		
S	F	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

— — .	Whole	-			Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	-	-	-	X	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	N	N	-	-	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ranunculus sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: S Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili-		
food	value	cover	food	cover	food	zation	nuisance	value
S,F	P	-	-	-	-	-	-	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	x	-	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
	·					
?	С	?	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ranunculus aquatilis

SPECIES CODE: RANAQ

COMMON NAME: white water crowfoot

BASIC INFORMATION*

Life form: S

Life cycle: - Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fow1	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter			
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
• • • • • • • • • • • • • • • • • • •						
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
?	С	-	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ranunculus longirostris

SPECIES CODE: RANLO

COMMON NAME: stiff water crowfoot

BASIC INFORMATION*

Life form: S Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	0	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

						Substrate stabili-		Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ranunculus reptans

COMMON NAME: spearwort

BASIC INFORMATION*

Life form: S

Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown H - - -

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ranunculus trichophyllus SPECIES CODE: RANTR COMMON NAME: white water crowfoot

BASIC INFORMATION*

Life form: S Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	*	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
	_	_	_	_	_

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Riccia fluitans

SPECIES CODE: RICFL

COMMON NAME: --

BASIC INFORMATION*

Life form: FF

Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	Y	-	-

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole					
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Ruppia maritima SPECIES CODE: RUPMA COMMON NAME: ditch grass **BASIC INFORMATION*** Life form: S Life cycle: P Status: R,N Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Turbidity Substrate Summer drawdown Winter drawdown ---------_ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ -----Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Water- Other Other Musk- Substrate Poten-Water-

						stabili- zation		
S,T,F	Е	-	S	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	X	X	-	х	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
N	С	N	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sagittaria sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: E Life cycle: - Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
						 -		

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
N	N	С	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sagittaria cuneata

COMMON NAME: arum-leaved arrowhead

BASIC INFORMATION*

Life form: S-E Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,T	F	-	-	-	-	х	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	_		_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sagittaria graminea

SPECIES CODE: SAGGR

COMMON NAME: grassy arrowhead

BASIC INFORMATION*

Life form: S-E Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-10

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sagittaria latifolia

COMMON NAME: common arrowhead

BASIC INFORMATION*

Life form: E Life cycle: P Status: A

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
			•••••
0	0,Y	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili- zation		
-	F	-	-	-	-	Х	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
		16 6 6 6				
Х	-	-	-	X	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sagittaria rigida

Status: I

COMMON NAME: stiff arrowhead

BASIC INFORMATION*

Life form: E Life cycle: P

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	Y,N	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
<i>-</i>						
	-	-	-	х	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-		-	-	-	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Scirpus sp. or spp.

SPECIES CODE: SCISP

COMMON NAME: --

BASIC INFORMATION*

Life form: E Life cycle: P

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

						Substrate		Tri -1-
						stabili- zation		
-	-	X	S,T	X	X	Х	Х	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	X	-	х	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
N	?	С	-	С	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Scirpus acutus

COMMON NAME: hard-stem bulrush

BASIC INFORMATION*

Life form: E Life cycle: P Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	Ε	-	-	-	-	Х	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	Х	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Scirpus americanus

COMMON NAME: chairmakers's rush

BASIC INFORMATION*

Life form: E Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	N	-	I

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S	G	-	-	-	-	Х	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	Х	-	Х	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Scirpus fluviatilis

SPECIES CODE: SCIFL

COMMON NAME: river bulrush

BASIC INFORMATION*

Life form: E Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
						 Х		 -

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
						
Х	-	Х	-	X	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	_	_	_	_	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Scirpus subterminalis

SPECIES CODE: SCISU

Status: I

COMMON NAME: --

BASIC INFORMATION*

Life form: E Life cycle: P

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both

Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili-	tial	
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Scirpus validus

SPECIES CODE: SCIVA

COMMON NAME: great bulrush

BASIC INFORMATION*

Life form: E Life cycle: P

Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	N	I	I

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	х	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
Х	-	X	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sparganium sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: FL-E Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
						stabili- zation		
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	Х	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
			• • • • • • • • • • •			
С	N	N	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Sparganium chlorocarpum

SPECIES CODE: SPACH

COMMON NAME: --

BASIC INFORMATION*

Life form: FL-E Life cycle: - Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	-	v	v

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

						Substrate		T1 -1-
						stabili- zation		
-	F	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
_	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	_	_	_	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

 SPECIES: Sparganium eurycarpum
 SPECIES CODE: SPAEU

 COMMON NAME: common bur-reed

 BASIC INFORMATION*

 Life form: FL-E
 Life cycle: P

 Status: I

 Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating

 Life cycle: A-annual, P-perennial, B-both

 Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered,
N-non native

 HABITAT PREFERENCE*

 Substrate
 Turbidity

0 0,Y - -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
S	F	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	X	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
		÷				
_	-	-	_	_	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Spirodela polyrhiza SPECIES CODE: SPIPO COMMON NAME: great duckweed BASIC INFORMATION* Life form: FF Life cycle: P Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ----------Y D Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	G	-	-	-	-	-	Х	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	X	-	-	-	x	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	С	?	-	?	С

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Typha sp. or spp.

COMMON NAME: --

BASIC INFORMATION*

Life form: E Life cycle: P Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-		_

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
T,F	P	Х	S	Х	Х	Х	X	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
			· · · · · · · · ·			
X	-	Х	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
N	С	?	С	?	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Typha angustifolia

SPECIES CODE: TYPAN

COMMON NAME: narrow-leaf cat-tail

BASIC INFORMATION*

Life form: E Life cycle: P Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	Y	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water	-	Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
	<u></u>							
-	-	-	-	-	-	Х	-	S,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	Х	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Typha latifolia

COMMON NAME: broad-leaf cat-tail

BASIC INFORMATION*

Life form: E Life cycle: P Status: C

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
0	N,Y	v	V

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
X	-	Х	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	-	_	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Utricularia sp. or spp. SPECIES CODE: UTRSP COMMON NAME: --BASIC INFORMATION* Life form: S Life cycle: P Status: -Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown ------------------Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili– zation	tial	
_	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
N	С	N	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Utricularia geminiscapa

COMMON NAME: --

BASIC INFORMATION*

Life form: S

Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdownS---

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-		-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
			• • • • • • • • • • •	*******		
_	_	_	_	_	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Utricularia gibba

SPECIES CODE: UTRGI

COMMON NAME: humped bladderwort

BASIC INFORMATION*

Life form: S Life cycle: - Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
S	-	-	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

					Substrate		D (.1
					stabili- zation		
-	-	 -	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
	,			-	
-	-	-	-	C	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Utricularia intermedia

COMMON NAME: flat-leaf bladderwort

BASIC INFORMATION*

Life form: S Life cycle: -

Status: R

×.

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fow1	bird	bird	rat	Substrate stabili- zation	tial	

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
_	_	-			_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Utricularia purpurea

SPECIES CODE: UTRPU

COMMON NAME: purple bladderwort

BASIC INFORMATION*

Life form: S Life cycle: - Status: R

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate	Turbidity	Summer drawdown	Winter drawdown
-	-	D	-

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fowl	bird	bird	rat	Substrate stabili- zation	tial	
-	-		-	-	-	-	-	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Utricularia vulgaris SPECIES CODE: UTRVU COMMON NAME: great bladderwort **BASIC INFORMATION*** Life form: S Life cycle: -Status: C Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Turbidity Summer drawdown Winter drawdown ------------------Y S D Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Food	fow1	bird	bird	rat	Substrate stabili– zation	tial	Fish

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	-	-	-	-	_	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Vallisneria americana SPECIES CODE: VALAM COMMON NAME: eel grass **BASIC INFORMATION*** Life form: S Life cycle: P Status: A Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown _____ ------------Н Y Ι Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* Ostern Ostern Music Cub ---

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	Ε	-	-	-	-	-	X	F,C

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

Transplants	Whole plants	Roots	Cuttings	Tubers	Winter buds	Seeds
X	-	-	-	X	-	х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
?	?	-	-	Ν	?

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Wolffia sp. or spp.

SPECIES CODE: WOLSP

COMMON NAME: --

BASIC INFORMATION*

Life form: FF

Status: -

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

Substrate Turbidity Summer drawdown Winter drawdown

Life cycle: -

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	-	-	-	_	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole			Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	X	-	-	-	-	-

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
N	С	N	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Wolffia columbiana SPECIES CODE: WOLCO COMMON NAME: common water-meal **BASIC INFORMATION*** Life form: FF Life cycle: -Status: I Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native HABITAT PREFERENCE* Substrate Turbidity Summer drawdown Winter drawdown Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, 0-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response WILDLIFE AND ENVIRONMENTAL VALUES* .

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
-	F	-	-	-	-	-	-	-

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter		
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds	
-	-	-	-	-	-	-	

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
-	-	-	-	?	-

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Zannichellia palustris

SPECIES CODE: ZANPA

COMMON NAME: horned pondweed

BASIC INFORMATION*

Life form: S Life cycle: A

Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdownHY--

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

Water-		Water-	Other	Other	Musk-	Substrate	Poten-	
fowl	Food	fowl	bird	bird	rat	stabili-	tial	Fish
food	value	cover	food	cover	food	zation	nuisance	value
S,F	G	-	S	-	-	Х	-	F

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole		Winter			
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
• • • • • • • • • • • • • • • • • • •						
-	-	-	-	-	-	Х

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine
С	?	N	-	?	?

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled

SPECIES: Zizania aquatica

COMMON NAME: wild-rice

BASIC INFORMATION*

Life form: E

Life cycle: A Status: I

Life form: E-emergent, S-submergent, FL-floating leaved, FF-free floating Life cycle: A-annual, P-perennial, B-both Status: A-abundant, C-common, I-infrequent, R-rare, EN-endangered, N-non native

HABITAT PREFERENCE*

SubstrateTurbiditySummer drawdownWinter drawdownS0--

Substrate preference: S-soft, H-hard, O-no preference Turbidity: Y-positive association with turbid water, negative association, O-no significant association Drawdown: I-increases with drawdown, D-decreases, V-variable response

WILDLIFE AND ENVIRONMENTAL VALUES*

fowl	Food	fow1	bird	bird	rat	Substrate stabili- zation	tial	
		х Х						

Part consumed: A-seeds, B-tubers, C-foliage and stems Food value: E-excellent, G-good, F-fair, P-poor Fish value: F-food or supports fish food fauna, C-cover, S-spawning habitat

PROPAGATION METHODS*

	Whole				Winter	
Transplants	plants	Roots	Cuttings	Tubers	buds	Seeds
-	-	-	-	-	-	X

HERBICIDE SUSCEPTIBILITY*

Endothall	Diquat	2-4,D	Glyphosate	Fluridone	Simazine	
-	-	-	-	-	-	

C-controlled, ?-questionable control results dependent on chemical formulation or environmental conditions, N-not controlled