

Attachment 5. SGCNs Utilizing Highly Vulnerable Habitats in Massachusetts and Selected for MRAP Scoring

SGCN Fish species (25)	<i>Acipenser brevirostrum</i>	Shortnose Sturgeon
	<i>Acipenser oxyrinchus</i>	Atlantic Sturgeon
	<i>Alosa aestivalis</i>	Blueback Herring
	<i>Alosa pseudoharengus</i>	Alewife
	<i>Alosa sapidissima</i>	American Shad
	<i>Anguilla rostrata</i>	American Eel
	<i>Fundulus luciae</i>	Spotfin Killifish
	<i>Petromyzon marinus</i>	Sea Lamprey
	<i>Salmo salar</i>	Atlantic Salmon
	<i>Catostomus catostomus</i>	Longnose Sucker
	<i>Chrosomus eos</i>	Northern Redbelly Dace
	<i>Cottus cognatus</i>	Slimy Sculpin
	<i>Couesius plumbeus</i>	Lake Chub
	<i>Lethenteron appendix</i>	American Brook Lamprey
	<i>Notropis bifrenatus</i>	Bridle Shiner
	<i>Rhinichthys atratulus</i>	Blacknose Dace
	<i>Rhinichthys cataractae</i>	Longnose Dace
	<i>Salvelinus fontinalis</i>	Brook Trout
	<i>Semotilus atromaculatus</i>	Creek Chub
	<i>Semotilus corporalis</i>	Fallfish
	<i>Catostomus commersoni</i>	White Sucker
	<i>Enneacanthus obesus</i>	Banded Sunfish
	<i>Etheostoma fusiforme</i>	Swamp Darter
	<i>Gasterosteus aculeatus</i>	Threespine Stickleback
	<i>Luxilus cornutus</i>	Common Shiner
SGCN Mammal species (15)	<i>Alces americanus</i>	Moose
	<i>Eptesicus fuscus</i>	Big Brown Bat
	<i>Glaucomys sabrinus</i>	Northern Flying Squirrel
	<i>Lasionycteris noctivagans</i>	Silver-haired Bat
	<i>Lasiurus borealis</i>	Eastern Red Bat
	<i>Lasiurus cinereus</i>	Hoary Bat
	<i>Lynx rufus</i>	Bobcat
	<i>Myotis leibii</i>	Small-footed Myotis
	<i>Myotis lucifugus</i>	Little Brown Myotis
	<i>Myotis septentrionalis</i>	Northern Myotis
	<i>Perimyotis subflavus</i>	Tricolored Bat
	<i>Ursus americanus</i>	Black Bear
	<i>Sylvilagus transitionalis</i>	New England Cottontail
	<i>Sorex palustris</i>	Water Shrew
<i>Synaptomys cooperi</i>	Southern Bog Lemming	
SGCN Bird species (52)	<i>Anas rubripes</i>	American Black Duck
	<i>Egretta thula</i>	Snowy Egret
	<i>Haliaeetus leucocephalus</i>	Bald Eagle
	<i>Sternula antillarum</i>	Least Tern
	<i>Sterna dougallii</i>	Roseate Tern
	<i>Sterna hirundo</i>	Common Tern
	<i>Accipiter gentilis</i>	Northern Goshawk
	<i>Buteo platypterus</i>	Broad-Winged Hawk
	<i>Haemorhous purpureus</i>	Purple Finch
	<i>Hylocichla mustelina</i>	Wood Thrush

	<i>Mniotilta varia</i>	Black-and-white Warbler
	<i>Piranga olivacea</i>	Scarlet Tanager
	<i>Setophaga striata</i>	Blackpoll Warbler
	<i>Parquesia motacilla</i>	Louisiana Waterthrush
	<i>Scolopax minor</i>	American Woodcock
	<i>Cardellina canadensis</i>	Canada Warbler
	<i>Euphagus carolinus</i>	Rusty Blackbird
	<i>Setophaga americana</i>	Northern Parula
	<i>Zonotrichia albicollis</i>	White-throated Sparrow
	<i>Anas discors</i>	Blue-winged Teal
	<i>Gavia immer</i>	Common Loon
	<i>Podilymbus podiceps</i>	Pied-Billed Grebe
	<i>Ammodramus caudacutus</i>	Saltmarsh Sharp-tailed Sparrow
	<i>Ammodramus maritimus</i>	Seaside Sparrow
	<i>Ardea alba</i>	Great Egret
	<i>Asio flammeus</i>	Short-eared Owl
	<i>Calidris pusilla</i>	Semi-palmated Sandpiper
	<i>Nycticorax nycticorax</i>	Black-crowned Night-Heron
	<i>Plegadis falcinellus</i>	Glossy Ibis
	<i>Sturnella magna</i>	Eastern Meadowlark
	<i>Tringa semipalmata</i>	Willet
	<i>Tyto alba</i>	Barn Owl
	<i>Arenaria interpres</i>	Ruddy Turnstone
	<i>Calidris alba</i>	Sanderling
	<i>Calidris canutus</i>	Red Knot
	<i>Charadrius melodus</i>	Piping Plover
	<i>Chordeiles minor</i>	Common Nighthawk
	<i>Eremophila alpestris</i>	Horned Lark
	<i>Haematopus palliatus</i>	American Oystercatcher
	<i>Limnodromus griseus</i>	Short-billed Dowitcher
	<i>Numenius phaeopus</i>	Whimbrel
	<i>Progne subis</i>	Purple Martin
	<i>Riparia riparia</i>	Bank Swallow
	<i>Botaurus lentiginosus</i>	American Bittern
	<i>Contopus cooperi</i>	Olive-sided Flycatcher
	<i>Porzana carolina</i>	Sora
	<i>Cistothorus palustris</i>	Marsh Wren
	<i>Gallinago delicata</i>	Wilson's Snipe
	<i>Ixobrychus exilis</i>	Least Bittern
	<i>Circus cyaneus</i>	Northern Harrier
	<i>Rallus elegans</i>	King Rail
	<i>Gallinula galeata</i>	Common Gallinule
	<i>Cistothorus platensis</i>	Sedge Wren
SGCN Reptiles (6)	<i>Malaclemys terrapin</i>	Northern Diamond-backed Terrapin
	<i>Crotalus horridus</i>	Timber Rattlesnake
	<i>Glyptemys insculpta</i>	Wood Turtle
	<i>Thamnophis sauritus</i>	Eastern Ribbonsnake
	<i>Clemmys guttata</i>	Spotted Turtle
	<i>Pseudemys rubriventris</i>	Northern Red-Bellied Cooter
SGCN Amphibians (3)	<i>Ambystoma jeffersonianum</i>	Jefferson Salamander
	<i>Ambystoma laterale</i>	Blue-Spotted Salamander
	<i>Lithobates pipiens</i>	Northern Leopard Frog

SGCN Lepidoptera (17)	<i>Erora laeta</i>	Early Hairstreak
	<i>Papaipema sulphurata</i>	Water-willow Borer
	<i>Catocala pretiosa pretiosa</i>	Precious Underwing
	<i>Cingilia catenaria</i>	Chain-dotted Geometer
	<i>Hemaris gracilis</i>	Slender Clearwing
	<i>Lithophane viridipallens</i>	Pale Green Pinion
	<i>Metarranthis pilosaria</i>	Heath Metarranthis
	<i>Papaipema stenocelis</i>	Chain-fern Borer
	<i>Callophrys hesseli</i>	Hessel's Hairstreak
	<i>Callophrys lanoraieensis</i>	Bog Elfin
	<i>Pieris oleracea</i>	Mustard White
	<i>Neoligia semicana</i>	Northern Brocade Moth
	<i>Sympistis riparia</i>	Dune Sympistis
	<i>Apamea inebriata</i>	Drunk Apamea Moth
	<i>Papaipema appassionata</i>	Pitcher-plant Borer
	<i>Euphyes dion</i>	Dion Skipper
	<i>Photodes inops</i>	Cord-grass Borer
SGCN Plants (197)	<i>Agastache scrophulariifolia</i>	Purple Giant Hyssop
	<i>Blephilia hirsuta</i>	Hairy Wood-mint
	<i>Boechera laevigata</i>	Smooth Rock-cress
	<i>Carex castanea</i>	Chestnut-colored Sedge
	<i>Carex formosa</i>	Handsome Sedge
	<i>Carex hitchcockiana</i>	Hitchcock's Sedge
	<i>Chamaelirium luteum</i>	Devil's-bit
	<i>Clematis occidentalis</i>	Purple Clematis
	<i>Corallorhiza odontorhiza</i>	Autumn Coral-root
	<i>Cynoglossum virginianum</i> var. <i>boreale</i>	Northern Wild Comfrey
	<i>Cyperus houghtonii</i>	Houghton's Flatsedge
	<i>Cypripedium parviflorum</i>	Yellow Lady's-slipper
	<i>Desmodium cuspidatum</i>	Large-bracted Tick-trefoil
	<i>Galearis spectabilis</i>	Showy Orchid
	<i>Geum fragarioides</i>	Barren Strawberry
	<i>Goodyera repens</i>	Dwarf Rattlesnake-plantain
	<i>Hydrophyllum canadense</i>	Broad Waterleaf
	<i>Ilex montana</i>	Big-leaved Winterberry
	<i>Linnaea borealis</i> ssp. <i>americana</i>	American Twinflower
	<i>Lonicera hirsuta</i>	Hairy Honeysuckle
	<i>Luzula parviflora</i> ssp. <i>melanocarpa</i>	Black-fruited Woodrush
	<i>Milium effusum</i>	Woodland-millet
	<i>Moehringia macrophylla</i>	Large-leaved Sandwort
	<i>Orthilia secunda</i>	One-sided Wintergreen
	<i>Panax quinquefolius</i>	American Ginseng
	<i>Platanthera hookeri</i>	Hooker's Orchid
	<i>Platanthera macrophylla</i>	Large Round-leaved Orchid
	<i>Platanthera orbiculata</i>	Round-leaved Orchid
	<i>Polystichum braunii</i>	Braun's Holly-fern
	<i>Ribes lacustre</i>	Bristly Black Currant
	<i>Sanicula canadensis</i>	Canadian Sanicle
	<i>Sanicula odorata</i>	Clustered Sanicle
	<i>Solidago macrophylla</i>	Large-leaved Goldenrod
	<i>Sorbus decora</i>	Northern Mountain-ash

<i>Symphytotrichum prenanthoides</i>	Crooked-stem Aster
<i>Triphora trianthophora</i>	Nodding Pogonia
<i>Viburnum rafinesquianum</i>	Downy Arrow-wood
<i>Lycopus rubellus</i>	Taper-leaf Water-horehound
<i>Amelanchier bartramiana</i>	Bartram's Shadbush
<i>Betula pumila</i>	Swamp Birch
<i>Carex baileyi</i>	Bailey's Sedge
<i>Cypripedium reginae</i>	Showy Lady's-slipper
<i>Galium labradoricum</i>	Labrador Bedstraw
<i>Lygodium palmatum</i>	Climbing Fern
<i>Moneses uniflora</i>	One-flowered Pyrola
<i>Pedicularis lanceolata</i>	Swamp Lousewort
<i>Rumex verticillatus</i>	Swamp Dock
<i>Botrychium tenebrosum</i>	Swamp Moonwort
<i>Cardamine douglassii</i>	Purple Cress
<i>Carex baileyi</i>	Bailey's Sedge
<i>Carex castanea</i>	Chestnut-colored Sedge
<i>Carex formosa</i>	Handsome Sedge
<i>Cypripedium parviflorum</i>	Yellow Lady's-slipper
<i>Cypripedium reginae</i>	Showy Lady's-slipper
<i>Linnaea borealis</i> ssp. <i>americana</i>	American Twinflower
<i>Lycopus rubellus</i>	Taper-leaf Water-horehound
<i>Lygodium palmatum</i>	Climbing Fern
<i>Magnolia virginiana</i>	Sweet Bay
<i>Malaxis monophyllos</i> var. <i>brachypoda</i>	White Adder's Mouth
<i>Malaxis unifolia</i>	Green Adder's Mouth
<i>Moneses uniflora</i>	One-flowered Pyrola
<i>Neottia bifolia</i>	Southern Twayblade
<i>Orthilia secunda</i>	One-sided Pyrola
<i>Petasites frigidus</i> var. <i>palmatus</i>	Sweet Coltsfoot
<i>Platanthera aquilonis</i>	North Wind Orchid
<i>Platanthera macrophylla</i>	Large Round-leaved Orchid
<i>Platanthera orbiculata</i>	Round-leaved Orchid
<i>Populus heterophylla</i>	Swamp Cottonwood
<i>Pyrola asarifolia</i> ssp. <i>asarifolia</i>	Pink Pyrola
<i>Quercus macrocarpa</i>	Bur Oak
<i>Rhododendron maximum</i>	Great Laurel
<i>Rumex verticillatus</i>	Swamp Dock
<i>Sanicula canadensis</i>	Canadian Sanicle
<i>Thuja occidentalis</i>	Arborvitae
<i>Carex lenticularis</i>	Shore Sedge
<i>Cyperus engelmannii</i>	Engelmann's Flatsedge
<i>Elatine americana</i>	American Waterwort
<i>Eleocharis ovata</i>	Ovate Spike-sedge
<i>Juncus filiformis</i>	Thread Rush
<i>Liparis loeselii</i>	Loesel's Twayblade
<i>Lipocarpa micrantha</i>	Dwarf Bulrush
<i>Ludwigia sphaerocarpa</i>	Round-fruited Seedbox
<i>Myriophyllum alterniflorum</i>	Slender Water-milfoil
<i>Myriophyllum farwellii</i>	Farwell's Water-milfoil

	<i>Myriophyllum pinnatum</i>	Pinnate Water-milfoil
	<i>Myriophyllum verticillatum</i>	Whorled Water-milfoil
	<i>Orontium aquaticum</i>	Golden Club
	<i>Potamogeton confervoides</i>	Tuckerman's Pondweed
	<i>Potamogeton friesii</i>	Fries' Pondweed
	<i>Potamogeton gemmiparus</i>	Budding Pondweed
	<i>Potamogeton hillii</i>	Hill's Pondweed
	<i>Potamogeton ogdenii</i>	Ogden's Pondweed
	<i>Potamogeton strictifolius</i>	Straight-leaved Pondweed
	<i>Potamogeton vaseyi</i>	Vasey's Pondweed
	<i>Rotala ramosior</i>	Toothcup
	<i>Sclerolepis uniflora</i>	One-flower Sclerolepis
	<i>Sparganium natans</i>	Small Bur-reed
	<i>Utricularia resupinata</i>	Resupinate Bladderwort
	<i>Carex mitchelliana</i>	Mitchell's Sedge
	<i>Hydrocotyle verticillata</i>	Saltpond Pennywort
	<i>Leptochloa fusca</i> ssp. <i>fascicularis</i>	Saltpond Grass
	<i>Setaria parviflora</i>	Bristly Foxtail
	<i>Spartina cynosuroides</i>	Salt Reedgrass
	<i>Suaeda maritima</i> ssp. <i>richii</i>	Rich's Sea-blite
	<i>Tripsacum dactyloides</i>	Northern Gama-grass
	<i>Amaranthus pumilus</i>	Seabeach Amaranth
	<i>Aristida tuberculosa</i>	Seabeach Needlegrass
	<i>Corema conradii</i>	Broom Crowberry
	<i>Crocanthemum dumosum</i>	Bushy Rockrose
	<i>Juncus debilis</i>	Weak Rush
	<i>Lathyrus palustris</i>	Marsh-pea
	<i>Leymus mollis</i> ssp. <i>mollis</i>	Sea Lyme-grass
	<i>Liatris novae-angliae</i>	New England Blazing Star
	<i>Mertensia maritima</i>	Oysterleaf
	<i>Opuntia humifusa</i>	Eastern Prickly Pear
	<i>Polygonum glaucum</i>	Sea-beach Knotweed
	<i>Rumex pallidus</i>	Seabeach Dock
	<i>Setaria parviflora</i>	Bristly Foxtail
	<i>Suaeda calceoliformis</i>	American Sea-blite
	<i>Suaeda maritima</i> ssp. <i>richii</i>	Rich's Sea-blite
	<i>Arceuthobium pusillum</i>	Eastern Dwarf Mistletoe
	<i>Arethusa bulbosa</i>	Arethusa
	<i>Betula pumila</i>	Swamp Birch
	<i>Carex exilis</i>	Bog Sedge
	<i>Carex livida</i>	Livid Sedge
	<i>Carex michauxiana</i>	Michaux's Sedge
	<i>Carex oligosperma</i>	Few-seeded Sedge
	<i>Carex pauciflora</i>	Few-flowered Sedge
	<i>Carex striata</i>	Walter's Sedge
	<i>Cypripedium reginae</i>	Showy Lady's-slipper
	<i>Eriophorum gracile</i>	Slender Cottongrass
	<i>Galium labradoricum</i>	Labrador Bedstraw
	<i>Gentiana linearis</i>	Narrow-leaved Gentian
	<i>Juncus debilis</i>	Weak Rush
	<i>Juncus filiformis</i>	Thread Rush
	<i>Linnaea borealis</i> var. <i>americana</i>	American Twinflower
	<i>Liparis loeselii</i>	Loesel's Twayblade

	<i>Lycopodiella alopecuroides</i>	Foxtail Clubmoss
	<i>Malaxis monophyllos</i> var. <i>brachypoda</i>	White Adder's Mouth
	<i>Neottia bifolia</i>	Southern Twayblade
	<i>Neottia cordata</i>	Heartleaf Twayblade
	<i>Ophioglossum pusillum</i>	Adder's Tongue Fern
	<i>Orontium aquaticum</i>	Golden Club
	<i>Platanthera aquilonis</i>	North Wind Orchid
	<i>Platanthera dilatata</i>	Leafy White Orchid
	<i>Platanthera huronensis</i>	Northern Green Orchid
	<i>Platanthera orbiculata</i>	Round-leaved Orchid
	<i>Potamogeton confervoides</i>	Tuckerman's Pondweed
	<i>Pyrola asarifolia</i> ssp. <i>asarifolia</i>	Pink Pyrola
	<i>Rhododendron maximum</i>	Great Laurel
	<i>Scheuchzeria palustris</i>	Pod-grass
	<i>Betula pumila</i>	Swamp Birch
	<i>Botrychium simplex</i>	Least Moonwort
	<i>Cardamine dentata</i>	Fen Cuckoo Flower
	<i>Carex alopecoidea</i>	Foxtail Sedge
	<i>Carex baileyi</i>	Bailey's Sedge
	<i>Carex castanea</i>	Chestnut-colored Sedge
	<i>Carex chordorrhiza</i>	Creeping Sedge
	<i>Carex formosa</i>	Handsome Sedge
	<i>Carex gracilescens</i>	Slender Woodland Sedge
	<i>Carex michauxiana</i>	Michaux's Sedge
	<i>Carex schweinitzii</i>	Schweinitz's Sedge
	<i>Carex sterilis</i>	Dioecious Sedge
	<i>Carex tetanica</i>	Fen Sedge
	<i>Carex trichocarpa</i>	Hairy-fruited Sedge
	<i>Conioselinum chinense</i>	Hemlock-parsley
	<i>Cypripedium reginae</i>	Showy Lady's-slipper
	<i>Deschampsia cespitosa</i> ssp. <i>glauca</i>	Tussock Hairgrass
	<i>Eleocharis quinqueflora</i>	Few-flowered Spike-sedge
	<i>Galium boreale</i>	Northern Bedstraw
	<i>Galium labradoricum</i>	Labrador Bedstraw
	<i>Gentiana andrewsii</i>	Andrews' Bottle Gentian
	<i>Gentiana linearis</i>	Narrow-leaved Gentian
	<i>Juncus filiformis</i>	Thread Rush
	<i>Lathyrus palustris</i>	Marsh-pea
	<i>Liparis loeselii</i>	Loesel's Twayblade
	<i>Lobelia siphilitica</i>	Great Blue Lobelia
	<i>Malaxis unifolia</i>	Green Adder's Mouth
	<i>Mimulus alatus</i>	Winged Monkey-flower
	<i>Mimulus moschatus</i>	Muskflower
	<i>Ophioglossum pusillum</i>	Adder's Tongue Fern
	<i>Pedicularis lanceolata</i>	Swamp Lousewort
	<i>Platanthera aquilonis</i>	North Wind Orchid
	<i>Platanthera cristata</i>	Crested Fringed Orchid
	<i>Platanthera dilatata</i>	Leafy White Orchid
	<i>Platanthera flava</i> var. <i>herbiola</i>	Pale Green Orchid
	<i>Platanthera huronensis</i>	Northern Green Orchid
	<i>Platanthera orbiculata</i>	Round-leaved Orchid

	<i>Rhynchospora capillacea</i>	Capillary Beak-sedge
	<i>Scirpus ancistrochaetus</i>	Northeastern Bulrush
	<i>Scirpus longii</i>	Long's Bulrush
	<i>Sisyrinchium mucronatum</i>	Slender Blue-eyed Grass
	<i>Sphenopholis pensylvanica</i>	Swamp WEdgescale
	<i>Spiranthes romanzoffiana</i>	Hooded Ladies'-tresses
	<i>Symphyotrichum praealtum</i>	Willow Aster
	<i>Veronica catenata</i>	Sessile Water-speedwell
	<i>Veronicastrum virginicum</i>	Culver's-root
	<i>Viola brittoniana</i>	Britton's Violet
SGCN Odonates (17)	<i>Boyeria grafiana</i>	Ocellated Darner
	<i>Somatochlora elongata</i>	Ski-Tailed Emerald
	<i>Somatochlora forcipata</i>	Forcipate Emerald
	<i>Somatochlora georgiana</i>	Coppery Emerald
	<i>Somatochlora kennedyi</i>	Kennedy's Emerald
	<i>Somatochlora linearis</i>	Mocha Emerald
	<i>Anax longipes</i>	Comet Darner
	<i>Enallagma carunculatum</i>	Tule Bluet
	<i>Enallagma daeckii</i>	Attenuated Bluet
	<i>Enallagma pictum</i>	Scarlet Bluet
	<i>Enallagma recurvatum</i>	Pine Barrens Bluet
	<i>Rhionaeschna mutata</i>	Spatterdock Darner
	<i>Neurocordulia obsoleta</i>	Umber Shadowdragon
	<i>Aeshna subarctica</i>	Subarctic Darner
	<i>Somatochlora incurvata</i>	Incurvate Emerald
	<i>Williamsonia fletcheri</i>	Ebony Boghaunter
	<i>Williamsonia lintneri</i>	Ringed Boghaunter
SGCN Other inverts (17)	<i>Cambarus bartonii</i>	Appalachian Brook Crayfish
	<i>Anodonta implicata</i>	Alewife Floater
	<i>Lampsilis radiata</i>	Eastern Lampmussel
	<i>Margaritifera margaritifera</i>	Eastern Pearlshell
	<i>Synurella chamberlaini</i>	Coastal Swamp Amphipod
	<i>Macrobdeella sestertia</i>	New England Medicinal Leech
	<i>Spongilla aspinosa</i>	Smooth Branched Sponge
	<i>Alasmidonta undulata</i>	Triangle Floater
	<i>Leptodea ochracea</i>	Tidewater Mucket
	<i>Ligumia nasuta</i>	Eastern Pondmussel
	<i>Floridobia winkleyi</i>	New England Siltsnail
	<i>Littoridinops tenuipes</i>	Coastal Marsh Snail
	<i>Cicindela dorsalis dorsalis</i>	Northeastern Beach Tiger Beetle
	<i>Cicindela limbalis</i>	Claybank Tiger Beetle
	<i>Marstonia lustrica</i>	Boreal Marstonia
	<i>Valvata sincera</i>	Boreal Turret Snail
	<i>Pomatiopsis lapidaria</i>	Slender Walker