



Living with Endangered Species

Safe Harbor Green Building Series

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This publication was created by Safe Harbor to provide basic, educational information about the *Massachusetts Endangered Species Act (MESA)* and the Natural Heritage & Endangered Species Program (NHESP). NHESP (part of the Massachusetts Division of Fish & Wildlife) administers MESA.

Updated in April, 2009 this material was originally developed at an Outer Cape Environmental Roundtable, hosted by Safe Harbor on November 8, 2006 at the Wellfleet Senior Citizens' Center. NHESP representatives, town officials, conservation agents, realtors, contractors, architects, environmental consultants and residents attended and participated.

The goal of this informational document is to improve communication between applicants and NHESP. Use the NHESP web site at www.NHESP.org for more specific permitting information.

WHAT YOU NEED TO KNOW

HABITAT = An area which, due to its physical or biological features, protects or provides important elements for the growth and survival of plants or animals such as food, shelter, or living space, and includes breeding, feeding, resting, migratory, or over wintering areas.

TAKE = A legal term that refers to the impacts on species, that includes the obvious (for animals: “harass, harm, hunt, kill, capture...” and for plants: “collect, pick, kill, transplant...”), but also refers to these effects as the result of “modification, degradation, or destruction of Habitat.” All projects submitted for review are evaluated in regard to “**TAKE**”.

PRIORITY HABITAT = the mapped geographical extent of known habitat for all state-listed rare species, both plant and animal. These maps are prepared species by species, based on the best scientific evidence that is less than 25 years old, and are updated every two years. Priority Habitat maps are used for determining whether or not a proposed project must be reviewed by NHESP for MESA compliance.

ESTIMATED HABITAT = A portion of Priority Habitat, which applies only to animals whose habitat includes wetlands, as defined under the Wetlands Protection Act, administered by local Conservation Commissions, but reviewed by NHESP.

LISTED SPECIES = A species' status, based on a number of factors, including, but not limited to, its rarity, reproductive trends, distribution, specialization, habitat requirements, and vulnerability. *There are three important but different, listed categories, which are described below:*

1. **ENDANGERED SPECIES** = A native species in danger of extinction from all or part of its range in Massachusetts.

2. **THREATENED SPECIES** = A native species likely to become endangered in the foreseeable future, or which is declining or rare.

3. **SPECIES OF SPECIAL CONCERN** = A native species documented to have suffered a decline that could threaten it if allowed to continue unchecked, or which occurs in such small numbers or with such restricted distribution or specialized habitat requirements that it could easily become threatened within Massachusetts.

WHAT YOU NEED TO DO

1. **DETERMINE JURISDICTION** is your site in Priority Habitat? -

The Natural Heritage Atlas and maps, available at town hall/library -

On CD, available from NHESP

(www.mass.gov/dfwele/dfw/nhosp/nhpubs.htm) for a cost of \$15.00

- The actual atlas for the entire state can be purchased for \$110.00

- Online, an interactive mapping program uses MassGIS.

(http://maps.massgis.state.ma.us/massgis_viewer/index.ht)

2. **UNDERSTAND EXEMPTIONS** Determine whether the project would be exempted from MESA regulations. The full list of exemptions can be found at www.mass.gov/dfwele/dfw/nhosp/nhenvexemptions.htm There are 12 exemptions listed on this website, including, but not limited to:

- Existing agriculture and aquaculture.
- Maintenance, repair of existing buildings.
- Vertical expansion or additions that do not exceed 50% of the footprint (not living space) of existing single-family or two-family homes within existing paved areas and lawfully developed and maintained lawns or landscaped areas.
- Vertical expansion or additions that do not exceed 20% of the footprint of existing commercial, industrial, multifamily, or mixed-use structures within existing paved areas and lawfully developed and maintained lawns or landscaped areas.
- Construction of sheds and other outbuildings within existing paved areas and lawfully developed and maintained lawns or landscaped areas.

- Construction and repair of septic systems, utility lines, sewer lines, and water supply wells within existing paved areas and lawfully developed and maintained lawns or landscaped areas.
- Repairs & replacement, not expansion of existing paved roads.
- Maintenance and replacement of existing lawns/landscaping.

3. GET MORE INFORMATION

If the property is within Priority Habitat and the exemptions do not apply, the property owner or representative can submit an Informational Request Form to NHESP. Forms are available on line at www.NHESP.org. The applicant will receive information within 30 days, about any rare species for which that particular site has been mapped. The cost is \$50.00. This is not a requirement but might be of assistance on larger projects, to aid in developing site-specific plans that would avoid impacting rare species.

4. FULL REVIEW FOR PRIORITY HABITAT

The results from the Information Request can be used in the official MESA review. This form can be found at www.NHESP.org. A determination by NHESP will follow within 90 days of filing. NHESP has been working very hard to make a final determination within 30 days, if they have received all the necessary information. **Complete and accurate information is necessary for timely response.** NHESP will continue to strive to make determinations in a timely fashion. The application cost for an area of potential disturbance less than five acres is \$300.00. Higher fee scale applies for greater areas.

Filings must include the following basic and site-specific information:

- Owner's name
- Applicant's name
- Property Address
- Proof of property's actual ownership
- Accurate site plan,

- Assessor’s map with scale
- USGS topographical map, 1:25000
- Ground-level photographs of existing site conditions, with orientation of photos noted
- Written description of existing site
- Written description, plans, location of project
- Narrative (what, when, where, and how) of proposed work

If your project involves Estimated Habitat as well, a copy of the Notice of Intent (NOI) you already need to file with your Conservation Commission, can be submitted along with your MESA filing to streamline the process. NHESP has worked with DEP to develop NOI forms, encouraging applicants to submit all necessary materials at once to streamline the filing process. If all necessary materials are received in one filing, NHESP will send a response under both the Wetlands Protection Act and the MESA within 30 days. See the DEP website www.mass.gov/dep for more information on this policy.

MOST FREQUENTLY ASKED QUESTIONS

1. What are the possible responses to a filing?

There are three possible NHESP responses in a MESA determination:

1. **No Take**, 79% of responses
2. **Take w/conditions to Avoid**, 18%
3. **Take**: redesign necessary, 3%

2. How might the NHESP conditions affect construction activities?

Conditions will depend on the species' biology and needs. Auditory and visual impacts might be considered, in addition to direct impacts to habitat. **Take w/Conditions to Avoid** might specify a seasonal window

for construction, use of animal bypasses in erosion control systems, or site enclosures.

3. **Would property sales require a MESA review?**

No. There must be a proposed project altering the habitat. A sale is not an activity requiring review. Buyers should review local habitat maps.

4. **Can a lot be pre-approved, that is certified as “buildable”?**

No. Each proposed project must be evaluated, based on the details of the proposal, the footprint, and the species involved at that time. Each MESA determination is project-specific. Sometimes “building envelopes” can be pre-permitted ahead of time, so they can then be sold as such.

5. **Who is legally responsible for work done without permits?**

It is the responsibility of the property owner or representative to determine if a project falls within Priority or Estimated Habitat. Unpermitted work is performed at the property owner's risk.

6. **How many different species need to be considered?**

There are currently 176 species of animals (invertebrates as well as vertebrates) and 259 species of plants listed as endangered, threatened, or of special concern in the state. Cape Cod has an abundance of rare fauna and flora and a lot of development, all on a restricted land mass.

7. **How do teardowns fit in to the regulations, are they exempt?**

For single and two family homes, if the rebuild is no more than 50% of the original footprint, with the old and new footprints having considerable overlap, it MAY be exempt, but NHESP should be contacted due to concerns about demolition impacts. Commercial regulations are different.

8. **How are building projects really hurting endangered species?**

Cumulatively, through fragmentation and loss of habitat. Specifically by disruption of habitat (cover, food sources, shelter or migratory corridors) which may impact survival and predator prey relationships.

9. **Do we need to hire consultants to survey endangered species?**

The majority of projects do not require that level of additional scrutiny. If NHESP can't make a determination, they might request a habitat assessment or species survey, requiring a species-specific consultant.

10. **Is there a time frame for approved projects?**

Projects must start within three years of being permitted.

11. **When should we use the Information Request if it isn't required?**

To obtain pre-planning information or to confirm an unclear exemption.

WE SUGGEST getting your basic information prior to contacting NHESP.

WE SUGGEST getting site specific information before contacting NHESP.

WE SUGGEST designing a de-construction (controlled demolition) plan and site-specific erosion control system, prior to contacting NHESP.

WE SUGGEST contacting the NHESP in the early design stages of project planning. Early stage information can be more effective in facilitating a successful permit. Late contact can escalate project costs and cause delays.

WE SUGGEST using the basic and site specific information you have developed to take advantage of communication opportunities with NHESP. Their program has a commitment to communication by phone and e-mail.

Go to **www.NHESP.org** for direct permitting information and forms.

Sample mitigations to consider for construction submission

1. The greatest threat to endangered species is loss of habitat. The best protection is retaining native habitat as open space.
2. Open Space, as referred to in this document, excludes lawns.
3. Preserving native habitat means limiting disturbance to native vegetation and minimizing habitat fragmentation.

4. Minimize fragmentation of native vegetation areas by carefully planning driveways and walkways to maintain wildlife corridors. Minimize re-grading and alteration of habitat.
5. Consideration should be given to the cluster development concept, versus widespread impact on native vegetation.
6. Proposals should include a development envelope (Limit of work) and a storm water management plan.
7. Proposals should include designated, minimally impacting, access corridors for equipment and material access to site.
8. Proposals should include low impact erosion control systems where necessary, to address runoff from de-vegetated areas.
9. These systems should be maintained pending area stabilization with vegetation and then removed.
10. In some cases, if requested by NHESP, silt fencing erosion cloth may also serve as exclusionary fencing.
11. A planting plan should be submitted, identifying sustainable native vegetation to be planted in de-vegetated areas.
12. Proposed impervious roofs, drive ways and walk ways should include storm water management systems, directing runoff to the ground water table for recharge.
13. Follow Low Impact Development (LID) guidelines when designing, at source storm water management systems such as swales, dry wells, filter strips, rain gardens, retention basins and bioretention basins. These are preferable to large scale infra structure systems requiring extensive excavation.
14. Performance standards for residential projects should include zero off site discharge, reducing off site erosion impacts.
15. Permeable and porous pavement systems should be considered for walkways and road surfaces. Gravel and shells installed on top of clay or stone dust and are not permeable.
16. Proposals should include provisions for controlled outside lighting: such as timers or motion detectors to reduce light pollution in nocturnal habitats.

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