

DESIGNATION OF PORTIONS OF THE CITIES OF
BOSTON, LYNN, AND REVERE, AND THE TOWNS OF
SAUGUS AND WINTHROP

AS THE

RUMNEY MARSHES
AREA OF CRITICAL ENVIRONMENTAL CONCERN

WITH SUPPORTING FINDINGS

Following an extensive formal review required by the regulations of the Executive Office of Environmental Affairs (301 CMR 12.00) including nomination review, research, meetings, and evaluation of all public comments, I, the Secretary of Environmental Affairs, hereby designate portions of the Cities of Boston, Lynn, and Revere, and the Towns of Saugus and Winthrop, as described below, as an Area of Critical Environmental Concern (ACEC). I take this action pursuant to the authority granted me under Massachusetts General Law c. 21A, s. 2(7).

I also hereby find that the coastal wetland resource areas included in the Rumney Marshes ACEC, the title taken from the name used during the colonial era to identify the marshes and lowlands of this region, are significant to flood control, the prevention of storm damage, the protection of land containing shellfish, and fisheries; the prevention of pollution, the protection of wildlife habitat, the protection of public and private water supplies; public interests defined in the Wetlands Protection Act (MGL c. 131, s. 40; 310 CMR 10.00).

I. Boundary of the Rumney Marshes ACEC

Upon review of the boundaries as recommended in the nomination letter and subsequent recommendations made in testimony received, the designated boundary encloses two principal wetland systems, the Saugus and Pines River Estuary, and Belle Isle Marsh. The landward boundary, in large part, is the 100 year flood elevation as delineated by the Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps and Floodway Maps. However, in certain specific locations described herein, the landward boundary may change to the edge of wetland, as defined in the Wetlands Protection Act (MGL c. 131 s.40), or artificial boundaries.

Specifically, the boundary of the Saugus and Pines Estuary is defined as follows: The area includes the Saugus and Pines Rivers and wetland resource areas falling within and adjacent to this estuarine system. Beginning at the northerly shore of the Saugus River, at a point where the westerly edge of the railroad right-of-way intersects the 100 year flood elevation, the boundary follows the thread of the shoreline at the 100 year flood elevation. The boundary continues at this elevation through the Lynn and East Saugus waterfronts, southwesterly to Franklin Park in Revere, then southeasterly to a point in Revere where North Shore Road intersects this elevation. The boundary then follows the westerly (marshward) side of North Shore Road until it reaches Mills Avenue, which the boundary follows until it reaches the

railroad right-of-way. The boundary follows the westerly side of this right-of-way, across the Saugus River, to the point from whence it started.

The boundary of the Belle Isle Marsh portion of the ACEC is defined as follows: The area includes the Belle Isle Creek, the marshes of this system, and the tributary streams. Beginning at the northerly end of Bennington Street in Revere at a point of intersection between the easterly (marshward) edge of the street and the 100 year flood elevation, the boundary follows Bennington Street in a southerly direction to where it crosses Belle Isle Creek. The boundary then becomes coincident with the jurisdictional boundary of the Wetlands Protection Act (i.e. typically 100 feet beyond the edge of the wetland resource area). The ACEC boundary follows along the creek in a northwesterly direction to Sales Creek, which is also subject to this designation. In general, all lands and waters falling under the jurisdiction of MGL C. 131, s. 40 in the Belle Isle Creek and Sales Creek areas falls within this designation. On the southerly side of Belle Isle Creek at Bennington Street, the boundary continues along the easterly edge of the street until a point at the intersection with Leverett Street. From this point, the boundary becomes the "edge of wetland", as defined in the Wetlands Protection Act and regulations promulgated thereunder, and follows the thread of the wetland edge to East Boston and around the MBTA Rail Yard to a point, at the southerly side of the yard, where the edge of wetland roughly intersects with the 100 year flood elevation. From this area, the boundary follows this elevation to a point of intersection with Winthrop Parkway. The boundary follows the westerly edge of the Winthrop Parkway to Crystal Street in Revere, which it follows until a point of intersection with 100 year flood elevation. From this point, the boundary continues at this elevation to the point from whence it started.

II. Boundary Exclusions and Exemptions from Designation:

There are three separate areas that fall within the described boundaries which are to be excluded. The first is the "footprint" of the proposed Belle Isle Creek dredging project. Given that this project is currently only in the preliminary planning stages and there is no indication, at this time, precisely which areas will be dredged, the ultimate exclusion will be based on the plans for the project as approved by the Office of Coastal Zone Management through their Federal Consistency review. This exclusion is granted with the provision that the Department of Environmental Management, through its Division of Waterways, will direct the planning of this project in a manner consistent with the ACEC designation.

The second and third exclusions are for the dredging of the Saugus

and Pines Rivers. Like the Belle Isle dredging exclusion, the final configuration of the exclusion will be based on the project plans as approved by the Office of Coastal Zone Management through their Federal Consistency review.

The rationale for the exclusion of the Saugus River dredging project is based on the intent of the Executive Office of Environmental Affairs to continue in its active support of commercial fishing and related activities in the Saugus River. The dredging of this channel, and associated limited anchorage areas, will enhance navigational access to the river. With this enhanced access comes the potential for greater competition between the commercial and recreational boating interests. The principal resource being competed for is space; space for dockage, for moorings, and for appropriate shoreside services. Nearly all of this space is created or enhanced through new dredging, which is prohibited under the ACEC designation. In recognition of this improvement dredging prohibition and the potential adverse effect it may have on the commercial fishing industry in the Saugus River, a secretarial waiver, pursuant to 301 CMR 12.15, of this prohibition will be considered in instances where the proposed project: 1) provides the broadest possible public benefit; 2) is consistent with the goals of the EOE in supporting the commercial fishing industry in the Saugus River; 3) is otherwise consistent with the rigorous standards of the ACEC designation; and 4) is fully consistent with the MCZM Program Policies. It should be understood that this waiver will not be granted lightly, and that projects receiving a waiver will very closely scrutinized as they pass through the regulatory process.

The reason for the Pines River dredging being excluded from the designation is directly tied to the exclusion of the dredging of the Saugus. The Pines River is predominantly a recreational boating area, and taken within the context of the Saugus/Pines system, it is the more appropriate location to allow the development of new or expanded recreational boating facilities. To this end, a secretarial waiver will be considered for projects related to recreational boating and related shoreside services. The same conditions listed above, particularly Nos. 1, 3, and 4, will be the framework used to determine whether the granting of a waiver is appropriate. However, significantly more emphasis will be placed on the "public benefits" aspects of the project requesting a waiver.

The intent of these exclusions and discretionary waivers is provide some additional level of protection to the resource areas within the ACEC. If, at some time in the future, the local municipalities were to develop an appropriate regional harbor management plan for the Saugus and Pines Rivers, this management plan would then provide the basis for waiver

decisions. The communities responsible for these two harbor areas should contact the MCZM Harbor Planning Coordinator to find out more about ongoing technical support and funding programs for this type of planning.

Two specific projects, and a few small activities accessory to other large public works projects falling outside the boundary, are to be exempted from the designation. These projects are being "exempted" from the designation rather than "excluded" from the boundary because they have a scope of activities which cannot be properly defined by a standard geographic exclusion, are projects with potentially broad public benefits, and are or have already been closely scrutinized by the environmental regulatory agencies.

The Saugus River Flood Damage Reduction Project is the first project to be exempted from the designation. Like the excluded projects discussed above, this project will be exempted as it is approved by the Office of Coastal Zone Management through its Federal Consistency review. I feel that the ongoing interagency review process, directed by the Corps of Engineers, will allow the project to be closely scrutinized as to its environmental impacts and provide for appropriate mitigation. This process will meet or exceed the intent of the designation with regard to the proposed project.

The second project to be exempted from the designation is the Sales and Green Creeks Flood Control Projects. This project is being directed by the DEM, Division of Waterways and has recently received a Secretarial Certificate for the Final Environmental Impact Report (FEIR). Given the close scrutiny the project has already received through the MEPA process, and the broad public benefit resulting from the project, I feel that the project has met the intent of the designation and should be allowed to proceed under the preexisting environmental standards. Like the Corps of Engineers, the DEM should realize that these exemptions carry with them the responsibility of assuring that the projects are planned and carried out in the most environmentally sensitive manner possible. We will be closely watching the progress of both of these projects to assure these responsibilities are met.

Two smaller exemptions are activities related to projects which fall outside the boundary of the ACEC. There is a tide gate to be improved and maintained in Sales Creek as a part of the Roughan's Point Flood Reduction Project. To facilitate the overall project, this activity is exempt from the designation. The second exemption is the removal of sand from the so-called "I-95 Embankment". While the removal of this material may not present a problem even under the designation, in the interest of clarity and facilitation of an important beach nourishment project, this activity

is also exempt. It is presumed that this excavation will be consistent with the existing Secretarial Certificate for the project. In general, I am, and have been, very concerned with the ultimate fate of this fill. To restate my position, our ultimate goal is to remove the fill and restore the marsh. Any activity which does not further this goal will be deemed inconsistent with the designation.

The area included in the designation has been significantly reduced from that which was proposed by the nominating committee. This reduction in geographic scope was not made lightly, nor without due consideration for the potential importance of these areas with regard to resource protection. While we have concluded that these areas are inappropriate for designation, it should be recognized that all activities in the vicinity of an urban marshland such as this have the potential for adverse environmental impacts, especially the degradation of water quality or wildlife habitat values. It is incumbent on those who propose to build in these adjacent areas to consider carefully the potential adverse impacts that may be associated with their projects. It is equally important that the surrounding communities closely scrutinize their zoning and land use controls adjacent to these valuable resources to assure that these local controls enhance the protections afforded by the designation. Finally, all EOEa agencies should be reminded, as a result of this designation, of their responsibility to reflect the environmental sensitivity of this area in their decisions.

Designation of the Resources of the Rumney Marshes ACEC

In my letter of acceptance of the nomination of the Saugus and Pines Rivers and Belle Isle Marsh as an ACEC, I indicated that our evaluation indicated that it easily met the minimum threshold for consideration. The nomination letter clearly lists the quantity and quality of the resources present.

The presence of these resources, and their relatively undisturbed nature within such a developed area, clearly indicate their value to the region and the state.

Procedures Leading to ACEC Designation

On 15 March, 1988, a letter of nomination, signed by ten citizens of the Commonwealth and pursuant to 301 CMR 12.00, was received by my office. The nomination was formally accepted by letter on 1 April, 1988, and the review process was begun.

Notice of the acceptance of the nomination and of an informational meeting and a public hearing was published in the Boston Globe and in the Massachusetts Environmental Monitor on 12 May, 1988. Numerous informational articles appeared in the local and regional newspapers.

A meeting for town officials was held on 24 May, 1988, and an informational meeting for the general public followed on 26 May, 1988. The public hearing was held on 23 June, 1988, and the public comment period was held open until 8 August, 1988. Written and oral testimony was received from 39 individuals and organizations at the public hearing and 64 comment letters were received before the close of the comment period. The comment letters and public hearing testimony is on file at the MCZM office.

V. Discussion of Criteria for Designation Specified 301 CMR 12.06

In the review process leading to the decision on a nominated area, the Secretary must consider the factors specified in Section 12.06 of the EOE regulations. As stated in these regulations, the factors need not be weighed equally, nor must all of these factors be present for an area to be designated. While the more factors an area contains, the more likely its designation, the strong presence of even a single factor may be sufficient for designation.

Based on the information in the nomination letter, presented at the public hearing, and through written comments, and on the research of my staff, I find the following factors relevant to the designated ACEC:

Threats to Public Health through Inappropriate Use

Saltmarshes play an important role in the prevention of flood damage by providing vital flood storage capacity. This capacity is lost when marshlands are filled. It has been documented, through research of the Corps of Engineers, that the saltmarshes of the Saugus and Pines River Estuary have experienced filling of saltmarshes at a rate of approximately 6 acres per year. Just considering the loss of flood storage capacity of the system, ignoring for the moment the other vital roles saltmarshes play in coastal ecosystems, this magnitude of presumably illegal fill has significant implications with regard public health, safety, and welfare.

Productivity

The Saugus and Pines Estuary, situated landward of the barrier beach of Revere, contains one of the most extensive salt marsh systems in the greater Boston metropolitan area. Including Belle Isle Marsh, the areas contain approximately 1000 acres of saltmarsh, tidal flats, and shallow

subtidal channels. The U.S. Fish and Wildlife Service characterizes the designated area as "one of the most biologically significant estuaries in Massachusetts north of Boston". Further quoting from the USFWS comment letter:

"Nearly 70 percent of all commercial fish and shellfish resources are dependent on estuaries for spawning and nursery grounds. Winter flounder, alewife, smelt, blueback herring, and American eel are a few of the more common finfish that occur within the nominated estuarine ecosystems...Intertidal habitats...support a wide variety of invertebrate resources. These include soft shelled and razor clams, mussels, snails, marine worms, and other invertebrates that are integral components of the marine food chain. Although many of the shellfish beds are too contaminated for human consumption, they represent an important food source for wildlife, attracting large numbers of wintering waterfowl to the area annually".

The list of bird species, migratory or indigenous, is extraordinary. The Massachusetts Natural Heritage and Endangered Species Program has commented that the area contains at least 5 species listed by the Division of Fisheries and Wildlife as Endangered, Threatened, or a Species of Special Concern. Despite its proximity to the intense development of the area, there is little doubt of the productivity of the designated area.

Uniqueness of the Area

Given its close proximity to a major metropolitan center with a population in excess of one million, this relatively undisturbed estuary and marsh complex is indeed unique. Much like the Back River ACEC and the Weir River ACEC to the south, this relatively large tract of marshland habitat, situated in an area subject to intense development pressure, provides the resource base necessary to maintain the diversity and productivity of an ecosystem which must, despite stringent regulation, accommodate the cumulative impacts arising from this development. While there may be smaller parcels of marshland which dot the urban landscape, the inventory of larger marshes capable of supporting these vital resources is dwindling and must be preserved.

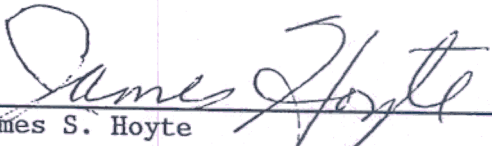
Imminence of Threat to Resources

Despite laws and regulations to the contrary, construction on the fringes of marshes and waterways can result in incremental filling over time. As mentioned above, this is especially true in the Saugus and Pines River Estuary. The intensity of development, especially adjacent to the

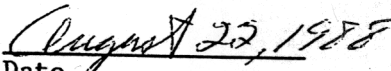
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designated areas, is ever increasing. Given the existing intensity of development in the area, the chronic and cumulative impacts associated with this proposed development activity may exceed the system's capacity to accommodate its effects.

It is hoped that this designation will serve to focus attention on the value and sensitivity of the area and will provide a guide for future development proposals.



James S. Hoyte
Secretary of Environmental Affairs



Date