Boundary Review of the Lynn Harbor Designated Port Area, Lynn MA

Executive Office of Energy and Environmental Affairs Office of Coastal Zone Management January 7, 2022

TABLE OF CONTENTS

II. THE DPA PROGRAM4III. LYNN DPA AND BOUNDARY REVIEW PROCESS4IV. PLANNING UNITS FOR BOUNDARY REVIEW5V. ELIGIBILITY REVIEW7VI. DESIGNATION REVIEW CRITERIA AND ANALYSIS8VII. CONCLUSIONS AND RECOMMENDATIONS13VIII. FIGURES15	I. INTRODUCTION	. 3
IV. PLANNING UNITS FOR BOUNDARY REVIEW	II. THE DPA PROGRAM	. 4
V. ELIGIBILITY REVIEW	III. LYNN DPA AND BOUNDARY REVIEW PROCESS	. 4
VI. DESIGNATION REVIEW CRITERIA AND ANALYSIS	IV. PLANNING UNITS FOR BOUNDARY REVIEW	5
VII. CONCLUSIONS AND RECOMMENDATIONS 13	V. ELIGIBILITY REVIEW	7
	VI. DESIGNATION REVIEW CRITERIA AND ANALYSIS	. 8
VIII. FIGURES 15	VII. CONCLUSIONS AND RECOMMENDATIONS	13
	VIII. FIGURES	. 15

I. INTRODUCTION

In 1972, Congress passed the Coastal Zone Management Act (CZMA), which establishes a national policy to "preserve, protect, develop, and where possible, to restore or enhance, the resources of the nation's coastal zone for this and succeeding generations" and to "encourage and assist the states to exercise effectively their responsibilities in the coastal zone through the development and implementation of management programs to achieve wise use of the land and water resources of the coastal zone..." [16 U.S.C. 1452, Sec. 303(1) and (2)]. In the CZMA, Congress made declarations of national policy elements and encouraged states to develop management programs enforceable under state law to address these interests.

The Commonwealth established the Massachusetts Office of Coastal Zone Management (CZM) and developed its coastal zone management program, which was approved by the National Oceanic and Atmospheric Administration in 1978. The program plan, as amended, contains the coastal policies and underlying state statutory and regulatory authorities, which articulate Massachusetts' priorities for protection and management of its coastal resources. CZM's policies address coastal hazards, energy, growth management, habitat, ocean resources, ports and harbors, protected areas, public access, and water quality.

One of the interests established by Congress in the CZMA is the promotion of economic uses of coastal resources, including the "priority consideration being given to coastal-dependent uses" and processes for the siting and preservation of port, transportation, and other commercial and industrial development "in or adjacent to areas where such development already exists." The Designated Port Area (DPA) policy was established in 1978 within the Massachusetts Coastal Zone Management Plan after extensive consultation with state agencies, elected officials, municipal planners, non-government organizations, and representatives from the business community, local citizens, and others. The two central principles of the DPA policy are to: (1) promote water-dependent industries as an important sector of the state's economy; and (2) prevent the loss of areas that have certain key characteristics that make them particularly well suited to water-dependent industrial (WDI) uses. The premise for this strategy is that it is sound public policy to maximize use of areas currently suited for waterdependent industrial uses and avoid the conversion of these areas to incompatible residential, commercial, and recreational uses, so that future marine industrial uses will not have to develop new areas for such use. The impact and expense of developing new marine industrial locations-including dredging, bulk-heading, building docks, development of transportation, power, and water infrastructure—are very high in terms of both economic and environmental costs, and such proposals are frequently met with extensive public and political opposition.

Under the Designation of Port Areas regulations at 301 CMR 25.00, CZM is responsible for mapping, interpreting, and periodic review of DPA boundaries. The purpose of the DPA boundary review process is to determine whether a DPA boundary should remain as it is currently established or whether it should be modified to protect and promote the goals of DPA policy more appropriately. DPA boundaries are reviewed in accordance with the procedures set forth in the Designation of Port Area regulations at 301 CMR 25.00.

II. THE DPA PROGRAM

DPAs are geographic areas of particular state, regional, and national significance with respect to the promotion of commercial fishing, shipping, and other vessel-related activities associated with waterborne commerce, and of manufacturing, processing, and production activities reliant upon marine transportation or the withdrawal or discharge of large volumes of water. These water-dependent industrial uses vary in scale and intensity but share similar needs for infrastructure with three essential components: (1) a waterway and associated waterfront that has been developed for some form of commercial navigation or other direct utilization of the water; (2) backland space that is conducive in both physical configuration and use character to the siting of industrial facilities and operations; and (3) land-based transportation and public utility services appropriate for general industrial purposes.

This combination of industrial attributes is found in a very limited and diminishing portion of the coastal zone, and particularly few areas are of sufficient contiguous extent to invite concentrations of related businesses and/or large-scale facilities. Because economic, environmental, and social factors now virtually preclude further development of such an intensive nature, these marine industrial coastal areas are protected to assure that the long-term needs of these water-dependent industries are accommodated. Therefore, state policy seeks to prevent these areas from becoming irretrievably committed to, or otherwise significantly impaired by, non-industrial or non-water-dependent types of development which could be sited elsewhere. Accordingly, state policy encourages water-dependent industrial use within DPAs, and state regulations prohibit other uses on tidelands subject to the jurisdiction of G.L. c. 91 within DPAs except for compatible public access and certain industrial, commercial, and transportation activities that support WDI uses or can occur on an interim basis without significant to the capacity of DPAs to accommodate WDI use in the future.

III. LYNN DPA AND BOUNDARY REVIEW PROCESS

The physical boundaries of DPAs in Massachusetts were first established by CZM in 1978. The legal framework governing DPAs was further developed through a succession of regulatory measures. In 1979, the Department of Environmental Protection (DEP) incorporated DPA rules into its Waterways regulations under M.G.L. Chapter 91, with provisions to protect water-dependent industrial uses only on the water-side areas of DPAs. In 1984, the legislature expanded the Chapter 91 licensing authority to include filled tidelands, expanding jurisdiction to these areas within DPAs as well. In 1994, CZM issued its Designation of Port Area regulations at 301 CMR 25.00 to set forth the procedure and standards for establishing and modifying DPA boundaries. These regulations remain in force today.

CZM established the initial boundary of the Lynn DPA coincident with the initial development of the Commonwealth's DPA policy in 1978. In 1994, the legislature amended the boundary to the current configuration with special legislation (Acts 1994 c. 75). As a result of this legislation, CZM does not have the authority to modify the boundaries of the Lynn DPA. Further, as the legislature set the

boundaries of the Lynn DPA before CZM issued its 1994 regulations, CZM has never conducted a comprehensive boundary review using the designation standards found at 301 CMR 25.04.

In March of 2021, the City of Lynn Planning Department requested that CZM initiate a review of the entire boundary of the Lynn DPA, as well as the adjacent municipal and federal channels. CZM accepted the request in April 2021. While the CZM boundary review process cannot change the DPA boundary, the process is nonetheless valuable to assess the extent to which the current DPA is suitable for water-dependent industrial use and consistent with regulatory criteria and to inform potential future action to address inconsistencies, if desired. CZM therefore conducted its boundary review in accordance with its normal practice as described in regulation. This report describes the results of this process.

To inform the boundary review process, CZM conducted the consultation process required by 301 CMR 25.03(4). A notice of review was published in the Environmental Monitor on May 10, 2021, in the Lynn Item on May 7, and in La Vozon May 13, 2021. A public meeting was held virtually via Zoom on May 19, 2021, and the formal public comment period closed on June 9, 2021. CZM considered comments submitted, consulted with property owners, city officials, DEP, and interested citizens. CZM also conducted site visits and intensive analysis of available plans, permits, and licenses applicable to the DPA review. Throughout the course of the review, CZM received formal and informal comment from DPA property owners, the public, and City and state agencies. CZM considered all comments and information provided in the context of the policy and regulatory framework that guides this review. Substantive information regarding history, uses, constraints, impacts, and other features of the existing DPA was particularly useful in the assessment. CZM would like to extend our appreciation for all those who hosted site visits, provided written and informal comments, documentation, or otherwise participated in the boundary review process.

Notice of the availability of this draft boundary review report, a public hearing, and a 30-day public comment period will be included in the January 26, 2022, *Environmental Monitor*, and public comments will be accepted for a period of 30 days ending on February 26, 2022. A final decision will be issued, pursuant to 301 CMR 25.03(4) and (5), within 60 days of the close of the public comment period.

IV. PLANNING UNITS FOR BOUNDARY REVIEW

CZM establishes DPA boundaries in accordance with regulatory criteria governing the suitability of contiguous lands and waters to accommodate water-dependent industrial use, as appropriate to the harbor in question. The Designation of Port Area regulations at 301 CMR 25.00 define water-dependent industrial use to mean any use found to be such in accordance with the Chapter 91 Waterways regulations at 310 CMR 9.12(2)(b). As a general rule, CZM applies DPA boundary review criteria within the context of groups of parcels that form coherent planning units, rather than to individual project sites or other properties under common ownership or control. DPA-related attributes vary across different parcels, such that the combined characteristics of associated parcels in the same general vicinity are not reflected accurately in the characteristics of any single property. For this reason, it is important that geographic areas proposed to be included in (or removed from) a DPA be sized and configured in a manner that allows consideration of all relevant factors affecting *overall suitability* to accommodate water-dependent industrial use. In this review, CZM defined three planning units within the existing Lynn DPA, forming coherent areas with groups of parcels that are delineated by shared physical, geographical, and land use characteristics, as described and detailed below and shown in Figure 2.

Physical and functional characteristics are such that water-dependent industrial and non-waterdependent industrial uses are frequently inter-mixed or co-occur. In determining whether to classify an area as water-dependent industrial, CZM considered the primary use of a planning unit to be that use to which a majority of that area is dedicated. The Chapter 91 Waterways regulations affirm this principle, recognizing that water-dependent industrial uses are permitted to include licensable accessory and supporting commercial and industrial uses that co-occur and are compatible with waterdependent industrial uses. Accessory uses include parking facilities, access and interior roadways, administrative offices, and marine-oriented retail facilities. Supporting uses are industrial or commercial uses that provide direct economic or operational support for the water-dependent industrial use in the DPA and must be compatible with activities characteristic of a working waterfront and its backlands.

North Mixed Industrial Planning Unit

The North Mixed Industrial planning unit comprises 20.45 acres and includes the DPA land area northeast of Marine Boulevard, including the 4 Lynn Economic Development and Industrial Corporation (EDIC) properties on Blossom Street, the 11.5-acre Boston Gas Liquified Natural Gas (LNG) property (d/b/a National Grid), and the 4-acre Massachusetts Electric Company (d/b/a National Grid) electric substation. The DPA boundary currently bisects three of these parcels, including one of the EDIC parcels, the MA Electric substation parcel, and the Boston Gas LNG parcel. However, the use of each bisected parcel is identical both within and outside of the DPA boundary. Three of the EDIC land parcels currently serve a primary WDI use as the Blossom Street Ferry passenger vessel facility, including docking and parking for this use. One EDIC parcel in the northeast portion of this planning unit is currently entirely vacant and weed-covered, but the EDIC staff indicate that the city plans to develop it as a harbormaster facility, likely also to include operation facilities for the ferry and other water-dependent passenger vessel uses needing water access, contributing additional WDI uses to this area. The National Grid parcels provide important utility services to the region. The substation parcel currently includes two buildings that are undergoing demolition. While the reuse of this portion of the site has not yet been determined, National Grid indicates that it will continue to function as a utility use. A bulkheaded inlet, approximately 100x300 feet in dimension, exists on the southwest portion of the Boston Gas parcel but is currently not in use. In general, the North Mixed Industrial area has been filled and developed over time to accommodate water-dependent uses and provides direct water access via the improved Blossom Street Ferry facility and a public and commercial boat ramp on the EDIC parcels. The planning unit area exhibits an entirely industrial character, with approximately one-third of its area either currently in or planned to be in direct WDI use.

Central Mixed Industrial Planning Unit

The Central Mixed Industrial Waterfront planning unit, northeast of Riley Way, is primarily a mix of industrial manufacturing and WDI use, with one commercial use. The waterfront here is entirely improved with a stone seawall, a steel sheet pile bulkhead, and an EDIC-owned commercial docking facility. Three EDIC properties adjacent to the docking facility provide access, vessel storage, parking, and other related storage and support functions for the commercial passenger vessel WDI use. Apart from one 2.4-acre parcel that is used for manufacturing elevator cars in the center of this planning unit, the remaining 8 parcels are owned and managed by National Grid. National Grid uses one parcel for an operations facility. It leases two parcels to Boston Wholesale Lobster for a processing facility and parking, both of which are WDI/WDI accessory uses. Another two National Grid parcels are

leased to Old Neighborhood Foods for its industrial manufacturing processes. One parcel is currently vacant, though National Grid has stated that it is expected to be used for a utility function when it is developed. Finally, one parcel is currently used to park buses owned by Healey Bus, a school-bus charter company. The DPA boundary currently bisects two of these parcels, including the parcel used for industrial manufacturing of elevator cars, and the Healey Bus parking area. In both cases, the area outside of the DPA boundary is currently used for parking only. In addition, the current boundary does not include portions of Marine Boulevard and Hanson Street that serve this DPA planning area. The primary use character of this planning unit is industrial, with approximately 64% of the area in non-water-dependent industrial use, 30% in WDI use, and 6% in commercial use (Healey Bus).

South Industrial Planning Unit

The South Industrial Planning unit, south of Riley Way, consists of four parcels currently in active use as a landfill and associated infrastructure, Riley Way extension, and two intertidal parcels south of Riley Way extension. The landfill activity and associated uses such as the stormwater management infrastructure to treat it are industrial uses. Therefore, the primary use character in this planning unit is industrial. The landfill activities are expected to continue for another 2 years, with final capping to be completed by approximately late 2023.

V. ELIGIBILITY REVIEW

Pursuant to 301 CMR 25.00, CZM employs a two-step review process when evaluating planning units for inclusion within a DPA boundary. The first step assesses whether planning units meet the eligibility for review criteria according to 301 CMR 25.03(2). These criteria include whether any area within a DPA: 1) has been subject to a designation decision within the previous five years; 2) contained active water-dependent industrial use throughout the previous five years; 3) was requested for exclusion from review by the City or other municipal body; and 4) is entirely bounded by existing DPA lands and/or waters. If a planning unit meets any of these criteria, that area is not eligible for further review and the second step of the review process is not applied. For those ineligible planning units, the DPA boundary does not change. If a planning unit is not disqualified from review by any of these criteria, it is eligible for review and proceeds to the second step of the review and proceeds to the second step of the review process.

In accordance with this process, CZM must ascertain whether any of the planning units within the DPA are ineligible for review pursuant to the criteria at 301 CMR 25.03(2)(a) through (d).

For the first criterion, based on our review, CZM determined that no portion of the Lynn DPA has been the subject of a designation decision under 301 CMR 25.03(5) in the last five years. Therefore, all areas of the DPA are eligible for review based on the criteria at 301 CMR 25.03(2)(a).

The criterion at 301 CMR 25.03(2)(b) states that any area that consisted primarily of water-dependent industrial use throughout the last five years is not eligible for review. As indicated in the regulations, in applying 301 CMR 25.03(2)(b), CZM considered the primary use within a given area to be the use to which a majority of the planning unit is dedicated. Lynn's DPA comprises a mixture of water-dependent industrial, non-water-dependent industrial, and commercial uses, but none of the areas reviewed consisted of primarily WDI uses in the previous five years before the review. The North Mixed Industrial area is comprised of approximately 27% WDI uses, while the Central Mixed Industrial Area supports 30% WDI uses. The South Industrial area has not supported any WDI uses in the past five years. As a result, all three planning units are eligible for review based on this criterion.

Pursuant to 301 CMR 25.03(2)(c), areas recommended for exclusion by the City or municipal body shall not be eligible for review. No portion of the Lynn DPA was recommended for exclusion from this review by the City Council or any other municipal body with authority to enact zoning. Therefore, all areas of the DPA are eligible for review based on the criteria at 301 CMR 25.03(2)(c).

Any area within a DPA that is entirely bounded by existing DPA lands or waters is not eligible for review pursuant to 301 CMR 25.03(2)(d). This criterion is intended to avoid conflict that could result from incompatible uses being developed in the middle of an otherwise substantially water-dependent industrial use area. This scenario could arise if a portion of the DPA that is otherwise completely surrounded by DPA lands is de-designated. However, as the current review is of the entire DPA boundary, no such isolated area is under review, and this scenario is avoided. Therefore, this criterion is not applicable to this DPA boundary review.

The North Mixed Industrial, Central Mixed Industrial, and South Industrial planning units all meet each of the criteria for eligibility for review pursuant to 301 CMR 25.03(2). CZM therefore further analyzed each area for substantial conformance with the criteria governing suitability to accommodate water-dependent industrial use.

VI. DESIGNATION REVIEW CRITERIA AND ANALYSIS

The DPA regulations at 301 CMR 25.04 direct that an area of land or water reviewed by CZM "shall be included or remain in a DPA if and only if CZM finds that the area is in substantial conformance" with criteria governing suitability to accommodate water-dependent industrial use. The four criteria governing the suitability of land to accommodate water-dependent industrial use are at 301 CMR 25.04(2)(a) through (d), and the four criteria governing the suitability of waters to accommodate water-dependent industrial use are at 301 CMR 25.04(2)(a) through (d), and the four criteria governing the suitability of waters to accommodate water-dependent industrial use are at 301 CMR 25.04(1)(a) and (b).

In this instance, CZM is not authorized to amend the existing boundaries of the DPA, so the provisions of 301 CMR 25.04 do not apply. However, while it will not affect the boundaries of the Lynn DPA, CZM has assessed the suitability of each area to be included or remain in the DPA according to the regulatory criteria. The results of this assessment are provided in this section.

North Mixed Industrial

Pursuant to 301 CMR 25.04(2)(a), to remain in a DPA, a land area must include, or be contiguous with other DPA lands that include, a shoreline that has been substantially developed with piers, wharves, bulkheads, or other structures that establish a functional connection with a DPA water area. The shoreline in the North Mixed Industrial planning unit consists entirely of filled tidelands, with seawalls, steel bulkheads and riprap providing stability for these areas. The EDIC shoreline has been developed further with a ferry dock and related facilities adjacent to the public parking area for this use that establish a connection between the land area and the water. While the Boston Gas LNG facility does not currently use the waterfront for operations, the waterfront has been substantially developed and improved to provide such a connection, including the constructed inlet on the southwestern portion of the site. Based on the substantial development of the shoreline, CZM concludes that the Central Waterfront planning unit meets this criterion.

Pursuant to 301 CMR 25.04(2)(b), land in a DPA must lie in reasonable proximity to: (i) an established road or rail link that leads to a major trunk or arterial route; and (ii) water and sewer facilities that are capable of supporting general industrial use. The North Mixed Industrial planning unit is primarily

served by a connection through Blossom Street directly to the Lynnway, a six-lane divided state highway under the jurisdiction of the MA Department of Conservation and Recreation (DCR) that connects the Lynn waterfront to Revere, Boston, Chelsea, and Everett to the south, meeting the criteria of an established road link leading to a major route. Based on discussions with representatives from the city, EDIC, and National Grid, the area is also served by adequate access to city water and sewer services, and no utility upgrades are currently needed for the existing or proposed uses. Therefore, CZM concludes that the North Industrial planning unit meets the criteria for road access and infrastructure necessary to support water-dependent industrial uses.

To accommodate water-dependent industrial use, 301 CMR 25.04(2)(c) requires that the land area must exhibit a topography that is generally conducive to industrial use or be reasonably capable of becoming so. The entire shoreline and an extensive portion of the overall land area of the North Mixed Industrial planning unit consists of filled tidelands that are primarily very low-lying and flat, with relatively flat and consistent elevation across the unit. CZM therefore concludes that the topography of the North Mixed Industrial planning unit is generally conducive to industrial use and meets the criteria of 301 CMR 25.04(2)(c).

Finally, 301 CMR 25.04(2)(d) provides that, to remain within the DPA boundary, the land area must exhibit a use character that is predominately industrial, or reasonably capable of becoming so because it does not contain: (i) a dense concentration of non-industrial buildings that cannot be removed or converted, with relative ease, to industrial use; or (ii) residential, commercial, recreational, or other uses that would unavoidably be destabilized if commingled with industrial activity. CZM's review demonstrated that all the uses within the North Mixed Industrial planning unit are characterized as industrial, including utility and passenger vessel uses, and that the waterfront is specifically developed to accommodate WDI uses, even where the waterfront is not currently being used actively. Therefore, CZM finds that this area does meet the criteria for inclusion in a DPA boundary as required by 301 CMR 25.04(2)(d).

Although the scope of the boundary review as requested by the city was limited to the areas currently within the DPA and the adjacent municipal and federal channels, it is CZM's policy to include the entirety of a parcel that meets the applicable criteria for inclusion within the DPA boundary. As the characteristics of the full parcels reviewed for the North Mixed Industrial area are consistent with the criteria for inclusion, this report finds that the DPA boundary should include the entirety of these parcels. CZM consulted with the owners of these properties and the proposed change was met with general support for this approach.

Central Mixed Industrial

Pursuant to 301 CMR 25.04(2)(a), to remain in a DPA, a land area must include, or be contiguous with other DPA lands that include, a shoreline that has been substantially developed with piers, wharves, bulkheads, or other structures that establish a functional connection with a DPA water area. The Central Mixed Industrial planning unit waterfront consists of filled tidelands that have been stabilized with a stone seawall on the eastern portions and a steel sheet pile bulkhead along the western reaches of the area. The area owned by EDIC has also been improved with a large concrete pier serving commercial passenger and fishing vessel needs. Accordingly, CZM concludes that the Central Mixed Use planning unit includes a shoreline that is developed adequately to establish a functional connection with DPA waters such that water-dependent industrial use can be, and currently is, supported in this area.

Pursuant to 301 CMR 25.04(2)(b), land in a DPA must lie in reasonable proximity to: (i) an established road or rail link that leads to a major trunk or arterial route; and (ii) water and sewer facilities that are capable of supporting general industrial use. The Central Mixed Industrial planning unit is primarily linked to the Lynnway via an industrial road, in this case Marine Boulevard. This planning unit therefore meets the criteria of having an established road link leading to a major trunk or arterial route. Based on discussions with users and property owners, this planning unit is also served by adequate access to city water and sewer services, and no utility upgrades are currently needed for the existing or proposed uses. Therefore, CZM concludes that the Central Mixed Industrial planning unit meets the criteria for road access and infrastructure necessary to support water-dependent industrial uses.

To accommodate water-dependent industrial use, 301 CMR 25.04(2)(c) requires that the land area must exhibit a topography that is generally conducive to industrial use or be reasonably capable of becoming so. The Central Mixed Industrial planning unit exhibits very little slope and is typically relatively flat and consistent in elevation throughout. As a result, CZM concludes that the topography of the Central Mixed Industrial planning unit is generally conducive to industrial use and meets the criteria of 301 CMR 25.04(2)(c).

Finally, 301 CMR 25.04(2)(d) provides that, to remain within the DPA boundary, the Central Mixed Industrial area must exhibit a use character that is predominately industrial, or reasonably capable of becoming so because it does not contain: (i) a dense concentration of non-industrial buildings that cannot be removed or converted, with relative ease, to industrial use; or (ii) residential, commercial, recreational, or other uses that would unavoidably be destabilized if commingled with industrial activity. This area is a mix of WDI, including the EDIC commercial pier uses and the lobster processing facility; non-water-dependent industry related to utilities, food product processing and shipping, and product manufacturing; and one commercial use (Healey Bus). All of the buildings and infrastructure within the Central Mixed Industrial planning unit are currently serving industrial uses, as Healey Bus is not associated with building use.

CZM therefore finds that that this area meets the criteria for inclusion in a DPA boundary as required by 301 CMR 25.04(2)(d) relating to use character of the area.

Although the scope of the boundary review as requested by the city was limited to the areas currently within the DPA and the adjacent municipal and federal channels, it is CZM's policy to include the entirety of a parcel that meets the applicable criteria for inclusion within the DPA boundary. As the characteristics of the full parcels reviewed for the Central Mixed Industrial area are consistent with the criteria for inclusion, this report finds that the DPA boundary should include the entirety of these parcels. CZM consulted with the owners of these properties and the proposed change was met with general support for this approach.

South Industrial Area

Pursuant to 301 CMR 25.04(2)(a), to remain in a DPA, a land area must include, or be contiguous with other DPA lands that include, a shoreline that has been substantially developed with piers, wharves, bulkheads, or other structures that establish a functional connection with a DPA water area. The shoreline in the South Industrial planning unit currently consists of a severely eroded road (Riley Way extension), coastal bank, and beachfront, fronted by the remains of a severely dilapidated wooden bulkhead lying approximately 25 to 50 feet seaward of the current shoreline. The erosion control

function of what remains of the bulkhead is severely diminished due to its dilapidated condition, which has resulted in the significant erosion evident on this portion of shoreline. On a portion of the shoreline where no bulkhead existed, the erosion and overwash are even more extensive, and extend back, through, and over Riley Way extension up to 80 feet landward of the remnant bulkhead, rendering the roadway impassible. In addition to landward erosion, significant elevation loss appears to have occurred seaward of the damaged road, further impacting the functional connection between the land and water in this planning unit. A small existing bulkhead protects a small, approximately 35foot portion of the shoreline, but this bulkhead is not adequate to create a functional connection for the planning unit. A new stormwater outlet is currently undergoing permit review to be placed on the beach/bank seaward of Riley Way at the very northeast corner of the planning unit, but the protection to be built for this structure will not create a connection to the water adequate to accommodate WDI use here. Based on the condition of the planning unit as a whole, CZM concludes that the South Industrial planning unit does not include, and is not functionally connected to other DPA lands that include, a shoreline that is developed adequately to establish a functional connection with the DPA waters such that WDI use could be supported in this area. Therefore, the South Industrial planning unit does not meet the criterion for inclusion in a DPA boundary set forth at 301 CMR 25.04(2)(a).

Pursuant to 301 CMR 25.04(2)(b), land in a DPA must lie in reasonable proximity to: (i) an established road or rail link that leads to a major trunk or arterial route; and (ii) water and sewer facilities that are capable of supporting general industrial use. As with the other two planning units in the DPA, Marine Boulevard links the South Industrial planning unit to the Lynnway, a six-lane divided state highway under the jurisdiction of the DCR that connects the Lynn waterfront to Revere, Boston, Chelsea, and Everett to the south. This link meets the criteria of an established road link leading to a major arterial or trunk route. Based on discussions with the land management representatives for this area, this planning unit is also served by adequate access to city water and sewer services, and no utility upgrades are currently needed for the existing industrial uses. Therefore, CZM concludes that the South Industrial planning unit meets the criteria for road access and infrastructure necessary to support water-dependent industrial uses.

To accommodate water-dependent industrial use, 301 CMR 25.04(2)(c) requires that the land area must exhibit a topography that is generally conducive to industrial use or be reasonably capable of becoming so. The majority of the land area within the South Industrial planning unit is currently an active landfill, with an expectation that these activities will continue approximately until the end of 2022, at which time the landfill will be capped and closed. Approved plans and permits for the project indicate that the finished elevation of the landfill will be approximately 76-82 feet (NAVD88), with side slopes ranging from 3:1 to 2:1 across the site. These extreme elevations and side slopes are not conducive to WDI uses, and because the landfill is permanent, it is unreasonable to conclude that the topography could be changed to accommodate water-dependent industrial use. An additional parcel south of the landfill is permitted to be used for a stormwater management basin to handle all the stormwater runoff from the finished and capped landfill. Finally, as discussed above, the shoreline for this planning unit is steep and eroded. Based on this, CZM concludes that the topography of the South Industrial planning unit is not conducive to industrial use, and therefore does not meet the criteria of 301 CMR 25.04(2)(c).

Finally, 301 CMR 25.04(2)(d) provides that, to remain within the DPA boundary, the South Industrial planning unit must also exhibit a use character that is predominately industrial, or reasonably capable of becoming so because it does not contain: (i) a dense concentration of non-industrial buildings that

cannot be removed or converted, with relative ease, to industrial use; or (ii) residential, commercial, recreational, or other uses that would unavoidably be destabilized if commingled with industrial activity. The majority of the South Industrial planning unit is an active landfill, which is an industrial use, and the planning unit therefore does currently exhibit a predominantly industrial use. However, the Administrative Consent Order issued by DEP on July 2, 2019 for the landfill closure requires that the landfill parcels be placed into a conservation restriction within 90 days of completion to restrict the uses on the capped landfill to only open space uses to avoid impact from development that could impact the integrity of the cap. While the current use is predominantly industrial, the allowed uses of the site will be permanently affected by the required conservation restriction, such that this planning unit will not be able to meet the industrial character criterion once the landfill is capped and closed. Nevertheless, because the current use character is predominantly industrial, CZM finds that this area does currently the criteria for inclusion in a DPA boundary as required by 301 CMR 25.04(2)(d).

DPA Water Areas

For this DPA boundary review, CZM completed the above analysis of land areas before applying the criteria 301 CMR 25.04(1) to water areas in order to better understand how the water area in Lynn Harbor is currently used with regard to WDI uses and compatibility within the DPA. At the request of the Lynn Planning Department, CZM analyzed the water areas adjacent to the North Mixed Industrial, Central Mixed Industrial, and South Industrial planning units for substantial conformance with the criteria pursuant to 301 CMR 25.04(1). The areas considered by CZM include the water sheet within the existing DPA boundary, as well as the Federal Navigation Channel to the east/northeast of the DPA, the Federal Turning Basin to the northeast of the DPA, and the municipal channel that lies directly seaward of the existing DPA. These channels and turning basin are not currently included in the DPA (see Figure 1). Should any water area not meet the criteria, CZM would return to the review of eligible planning units of land to determine if the criterion for a functional connection to water within a DPA were met.

Pursuant to 301 CMR 25.04(1)(a), an area of water shall be included or remain in the DPA if and only if that area includes, or is contiguous with, other DPA waters that include: 1) a navigable entrance or main channel with a design depth of at least 20 feet; and 2) a shoreline that has been substantially developed and has a functional connection to land within the DPA. Waters to be included in a DPA must also be of a configuration, size, and location appropriate for the maneuvering or berthing of vessels, the placement of intake/outfall structures, or other activities involving direct utilization of the water pursuant to 301 CMR 25.04(1)(b).

Lynn waters serving the DPA land area include a navigable entrance channel with a design depth of 22 feet, a width of 300 feet, and a length of 2.7 miles. The entrance channel extends from an area west of Bass Point in Nahant to the head of the Lynn Harbor. In addition, the federal turning basin has a design depth of 22 feet and is 550 feet wide at the head of the harbor. A municipal channel with an approved design depth of 22 feet extends 0.5 miles along the Lynn waterfront from the western side of the federal turning basin and provides access to the public landing, ferry terminal, EDIC commercial dock, and the LNG storage facility (if needed). However, this municipal channel ends just southwest of the Central Mixed Industrial planning unit and extends only minimally seaward of the South Industrial planning units in the Lynn DPA therefore satisfy the requirement in 301 CMR 25.04(1)(a)(1) of having a navigable entrance or main channel with a design depth of at least 20 feet, but the majority of the water area seaward of the South Industrial planning unit, the area

southwest of the municipal channel, is not an established navigation channel with at least a 20-foot design depth, and therefore does not satisfy the requirement in 301 CMR 25.04(1)(a)(1).

Waters adjacent to two of the three Lynn DPA planning units have substantially developed shorelines and have a functional connection to land within the DPA. The North Mixed Industrial and Central Mixed Industrial areas have a shoreline that is substantially developed with piers, bulkheads, and seawalls, as well as a functional connection between these waters and the land area, as detailed above. For waters adjacent to these planning units, the criterion set forth in 301 CMR 25.04(1)(a)(2) has been established. The shoreline of the South Industrial planning unit is not substantially developed and lacks a functional connection with land, as detailed above. Therefore, the water areas adjacent to the South Industrial planning unit are not in substantial conformance with 301 CMR 25.04(1)(a)(2).

Under 301 CMR 35.04(1)(b), water areas in a DPA must be of a configuration, size, and location appropriate for WDI use, such as maneuvering or berthing of vessels and placement of intake/outfall structures. Where this criterion is met, the DPA must include: (i) all channels and mooring and turnaround areas serving as access channels to land or water areas meeting the designation standards; and (ii) any water area lying between an entrance or main channel and any water or land area meeting the designation standards. As the federal channel, federal turning basin, and municipal channel provide the access channels and turnaround areas that serve the North Mixed Industrial and Central Mixed Industrial DPA planning units, and are designed to be wide and deep enough to accommodate the maneuvering or berthing of vessels, as well as the placement of intake/outfall structures necessary to accommodate WDI uses, these channels and turning basin meet the criterion and should be included in the DPA to comply with CZM regulations. Similarly, all water between the municipal channel and these two planning units must be included in the DPA. Although, the South Industrial planning unit does currently support a stormwater outfall, this outfall is in an intertidal area that is not configured to enable maneuvering or berthing of vessels serving WDI uses and the water area adjacent to the South Industrial Planning Unit is not served by the municipal channel. As a result, these water areas do not meet this criterion for inclusion in the DPA.

VII. CONCLUSIONS AND RECOMMENDATIONS

In 1994, the legislature amended the boundary of the Lynn DPA to the current configuration via special legislation (Acts 1994 c. 75), before CZM established its regulatory framework for reviewing and modifying DPA boundaries. As a result, CZM does not have the authority to modify the boundaries of the Lynn DPA through the designation standards at 301 CMR 25.04. This CZM boundary review process is nonetheless valuable to assess the extent to which the current DPA boundaries are suitable for water-dependent industrial use and consistent with the criteria for establishment of those boundaries, and to inform potential future action to address inconsistencies, if desired. CZM therefore conducted its boundary review consistent with its normal practice and policies for conducting DPA boundary reviews. However, this process will not result in changes to the Lynn DPA boundaries without legislative action.

The DPA regulations direct that an area of land or water reviewed under 301 CMR 25.00 shall be suitable to be included or remain in a DPA if and only if CZM finds that the area is in substantial conformance with all of the criteria governing suitability to accommodate water-dependent industrial use, as appropriate to the harbor in question. CZM's analysis of the land and water areas in the Lynn DPA indicates that the North Mixed Industrial and Central Mixed Industrial planning units meet all

of the criteria governing suitability, while the South Industrial planning unit does not meet the criteria of relatively flat topography or a substantially developed shoreline that creates a connection to DPA waters. Because the South Industrial planning unit does not meet these suitability criteria, it is not in substantial conformance with the criteria for designation of land areas within a DPA at 301CMR 25.04.

CZM's review indicated that changes to the waters included in the DPA would be needed in order to conform to its regulations governing boundary review. Boundary review regulations require that all channels and turnaround and mooring areas serving as access channels to the DPA, and any water area lying between these access channels and any water or land area in the DPA, must be included in the DPA. The federal channel, federal turning basin, and municipal channel that extends along the waterfront are all access channels leading to the North Mixed Industrial and Central Mixed Industrial planning units and would be suitable for including in the DPA under the regulations. In addition, all waters between those areas and the land within the DPA would be suitable for including in the DPA under CZM regulations.

Figure 1: Current Lynn DPA boundary map



Figure 2: Planning units within the Lynn Harbor DPA boundary review



Figure 3: Proposed Lynn DPA boundary map



Figure 4: Inset: Proposed DPA Land Area Boundary