

Routine Program Change - Summary of rule changes and significance of change
Coastal Zone Management rules - Subchapter 3A
Standards for Beach and Dune Activities
February 6, 2006

The rule changes described in detail below do not change the program approvability areas of special management areas and boundaries. While the rule changes may affect the program approvability areas of uses subject to management, authorities and organization or consideration of the national interest, these changes are not substantial for the reasons set forth below.

Rule Citation	Rule Change	Significance of Change
Subchapter 3A		
7:7E-3A.1 Purpose and scope (NEW)	➤Added purpose and scope to this subchapter for consistency with the Chapter	The addition of a Purpose and Scope rule does not substantially change uses subject to management. This change merely sets forth a "roadmap" to the contents of Subchapter 3A.
7:7E-3A.2 Standards applicable to routine beach maintenance (Recodified from N.J.A.C. 7:7E-3A.1)	➤Provides that no mechanical manipulation of the beach or sand transfers can occur between April 1 and August 15 in areas of documented habitat for T&E nesting birds ➤Limits mechanical sifting and beach raking activities to recreational beaches	<p>The change extending the period of protection for threatened and endangered nesting shorebirds by two weeks and limiting of mechanical sifting and raking to recreational beaches only, does not substantially change uses subject to management or consideration of the national interest. The Department's Division of Fish and Wildlife, the US Wildlife Service, the National Marine Fisheries Service and the Army Corps of Engineers have determined that beach raking and other mechanical manipulation of the beaches has the potential to adversely affect threatened and endangered shorebirds and their habitat. These adverse impacts can occur in several ways. First, mechanical vehicles (such as rakes and tractors) crush the eggs, as well as chicks and adult birds. Second, these vehicles create ruts in the beach/berm, which restrict the ability of juvenile birds to move between the upper berm nest areas to the feeding habitats along the wrack line. Third, the mechanical sifting of beach and sand removes the birds' natural wrack line feeding habitat, which is the primary food source for these beach nesters. These impacts and recommended beach management techniques have been identified in a report titled, "Piping Plover (<i>Charadrius melodus</i>) Atlantic Coast Recovery Plan," prepared by the Atlantic Coastal Piping Plover Recovery Team, for the US Fish and Wildlife Service, dated May 2, 1996. These beach management techniques are consistent with the beach management goals of the State and Federal agencies listed above.</p> <p>Recent investigations by the Department and Federal agencies have found that the number of nesting pairs of Piping Plovers has decreased in recent years. In addition, New Jersey's beaches are of critical importance to the overall survival of these species, not just in New Jersey but throughout the world. The changes to this rule are intended to provide protection to threatened and endangered species of nesting shorebirds, which are potentially at risk resulting from certain beach management activities, in a limited number of specific coastal locations. The restrictions apply to those beach areas that have been documented as threatened or endangered beach nesting shorebird habitat during the previous season. In addition, a provision allowing a permittee to request a waiver from the beach raking sand transfer restrictions has been included as part of the rule change. This waiver would apply to situations where the Department has been presented with clear and convincing documentation that the areas in question do not represent suitable habitat for threatened or endangered beach nesting shorebird habitat.</p> <p>The changes to this rule also limit the area where beach raking and sand transfers can occur to active recreational beach areas. This will allow permittees to mechanically clean heavily used recreational beach areas while preserving shorebird habitat, especially their feeding areas. This provision is intended to strike a balance between the recreational use of the beach by allowing certain areas to be mechanically cleaned and maintained, while preserving the feeding habitat of a large number of shorebirds along the wrackline. The rule changes described above further the national interest in the protection of recreation, endangered flora and fauna, and public access to the waterfront.</p>

Rule Citation	Rule Change	Significance of Change
<p>7:7E-3A.3 Standards applicable to emergency post-storm beach restoration (Recodified from N.J.A.C. 7:7E-3A.2)</p>	<p>➤Added provision that emergency post-storm beach restoration projects not specifically listed in rule may be authorized by the Department under the emergency permit provisions of the Coastal Permit Program rules</p>	<p>This rule change does not substantially changes the uses subject to management or consideration of the national interest. This rule address emergency beach restoration for all beaches which are impacted by coastal storms with a recurrence interval equal to or exceeding a five-year storm event. Beach restoration activities, as part of an emergency post-storm recovery, include: the placement of clean fill material with grain size compatible with or larger than the existing beach material; the bulldozing of sand from the lower beach profile to the upper beach profile; the alongshore transfer of sand on a beach; the placement of concrete or rubble; and the placement of sand filled geotextile bags or tubes. For the purposes of clarity, a new provision that allows the Department to authorize other types of emergency post-storm projects under an Emergency permit provided the Department determines that there is an imminent threat to lives and property was added. The Department has always had the ability to issue an Emergency Permit under N.J.A.C. 7:7-1.7 for emergency post-storm activities that were not specifically listed at N.J.A.C. 7:7E-3A.3, the new provision merely clarifies this ability. This change preserves the national interest in protecting the public's health safety and welfare.</p>
	<p>➤Changed construction standards for geotextile bags or tubes to address: (1) Location of geotextile bags or tubes in areas where dunes are present; (2) Location of geotextile bags or tubes in areas where dunes are not present; (3) Profile of geotextile bags or tubes; (4) Length of shoreline along which geotextile bags or tubes may be installed; (5) Fill material of the geotextile bags or tubes; and (6) Orientation of the geotextile bags or tubes to the shoreline</p>	<p>The changes to the standards for geotextile bags and tubes do not substantially change the uses subject to management or consideration of the national interest. The changes to the construction standards for geotextile bags or tubes clarify the location of the bags or tubes in areas where dunes are present. The rule adds a profile standard which requires the crest and seaward side of the geotextile bag or tube be covered with clean sand to achieve a gradual uniform slope from the upper beach to the crest of the bag or tube. This provision was added because the uniform profile restores a more natural profile allowing beach nesting shorebirds to move more freely along the beach to potential nesting areas. The standard restricting the length of shoreline along which a geotextile bag or tube may be located to 500 feet was added because there is the potential for longer tubes or bags to adversely impact beaches and wildlife use of the beaches. Five hundred feet in length is sufficient to address most geotextile bag or tube applications such as those associated with the protection of single family homes and street-ends. The changes to this rule further the national interest in protecting beaches, threatened or endangered flora or fauna and the public's health, safety and welfare.</p>
<p>7:7E-3A.4 Standards applicable to dune creation and maintenance (Recodified from N.J.A.C. 7:7E-3A.3)</p>	<p>➤Deleted from the list of acceptable species of dune vegetation: Japanese Sedge, Japanese Black Pine, Rugosa Rose and Dusty Miller</p>	<p>The rule change deleting certain species of dune vegetation does not substantially change the uses subject to management. Because these species have been found to be invasive and can cause damage to other dune vegetation that are essential to stabilizing a newly created dune, the Department has deleted them from the list of acceptable dune plantings.</p>
	<p>➤Corrected address of the Land Use Regulation Program</p>	<p>Changes to update address of Department programs are considered to be minor changes o the program that do not affect the 5 program approvability areas but are included for notification purposes.</p>
<p>7:7E-3A.5 Standards applicable to construction of boardwalks (Recodified from N.J.A.C. 7:7E-3A.4)</p>	<p>➤Recodified rule with no changes in text</p>	<p>Changes to the codification of rules are considered to be minor changes o the program that do not affect the 5 program approvability areas but are included for notification purposes.</p>

Rule text - Subchapter 3A

February 6, 2006

Changes to existing rule text approved by OCRM are shown as follows:

Additions indicated in **boldface**; and

Deletions indicated in [~~bracketed-strikethrough~~].

7:7E-3A.1 Purpose and scope

This is a new rule subject to RPC

(a) This subchapter sets forth the standards applicable to routine beach maintenance, emergency post-storm restoration, dune creation and maintenance, and construction of boardwalks. These standards are reference at N.J.A.C. 7:7E-3.16, Dunes; N.J.A.C. 7:7E-3.17, Overwash areas; N.J.A.C. 7:7E-3.19, Erosion hazard areas; N.J.A.C. 7:7E-3.22, Beaches; and N.J.A.C. 7:7E-7.11, Coastal engineering. In addition, N.J.A.C. 7:7E-3A.2, 3A.3 and 3A.4 are the standards for the coastal general permit for beach and dune maintenance activities, N.J.A.C. 7:7-7.6.

1. The standards applicable to routine beach maintenance, including debris removal and clean-up; mechanical sifting and raking; maintenance of access ways; removal of sand from street ends; boardwalk promenades and residential properties; repairs or reconstruction of existing gazebos and dune walkover structures, and limited sand transfers from the lower beach to he upper beach or alongshore are found at N.J.A.C. 7:7E-3A.2;

2. The standards that apply to the restoration of all beaches that are impacted by coastal storms with a recurrence interval to or exceeding a five-year storm event are found at N.J.A.C. 7:7E-3A.3;

3. The standards for dune creation and maintenance including the placement and/or repair of sand fencing, the planting and fertilization of appropriate dune vegetation, the maintenance and clearing of beach access pathways less than 8 feet in width; and the construction or repair of approved dune walkover structures are found at N.J.A.C. 7:7E-3A.4; and

4. The standards for construction of boardwalks along tidal shorelines are found at N.J.A.C. 7:7E-3A.5.

7:7E-3A.2 Standards applicable to routine beach maintenance

Changes to existing text approved by OCRM

~~[7:7E-3A.4]~~ **7:7E-3A.2** Standards applicable to routine beach maintenance

(a) Routine beach maintenance includes debris removal and clean-up; mechanical sifting **and raking**; maintenance of accessways; removal of sand from street ends, boardwalks/promenades and residential properties; the repair or reconstruction of existing boardwalks, gazebos and dune walkover structures; and limited sand transfers from the lower beach to the upper beach or alongshore (shore parallel). Sand transfers from the lower beach profile to the upper beach profile are specifically designed to restore berm width and elevation, to establish/enhance dunes and to repair dune scarps. Activities which preclude the development of a stable dune along the back beach are not considered to be routine beach maintenance activities, pursuant to this section. Specifically, the bulldozing of sand from the upper beach (berm) to the lower beach (beach face), for the purpose of increasing the berm width or flattening the beach profile, is not considered to be routine maintenance.

1. – 2. (No change.)

3. In areas documented by the Department as habitat for threatened or endangered beach nesting shorebirds such as Piping Plovers (*Charadrius melodus*) and Least Terns (*Sterna albifrons*), no beach raking or other mechanical manipulation of the beach shall take place between April 1 and August 15.

i. The Department's Division of Fish and Wildlife shall develop a list of specific areas where this restriction shall apply, based on documented habitat during the most recent nesting season. The list of restricted areas shall be updated annually by the Division of Fish and Wildlife, at the end of each nesting season and be available upon request from the Department's Land Use Regulation Program at PO Box 439, Trenton, New Jersey 08625-0439 (609) 292-0060. The updated list shall be provided by the Department to each permittee prior to April 1 of each year.

ii. If a particular beach area is identified on the updated list as described in (a)3i above as habitat for threatened or endangered beach nesting shorebirds, regardless of the habitat classification of the previous nesting season, no beach raking or other mechanical manipulation of the beach shall take place between April 1 and August 15 in those areas.

iii. If a particular beach area is not identified on the updated list as described in (a)3i above, but is subsequently found to contain a nest of a threatened or endangered beach nesting shorebird, the Department shall notify the permittee and no beach raking or mechanical manipulation of the beach shall take place between April 1 and August 15 in those areas.

iv. The restrictions contained in (a)3 above may be waived if the Department's Division of Fish and Wildlife determines that the identified areas do not represent suitable threatened or endangered beach nesting shorebird habitat, due to beach erosion or other causes. Requests for such a waiver shall be made in writing to the Land Use Regulation Program, PO Box 439, Trenton, New Jersey, 08625-0439; and
4. Mechanical sifting and beach raking shall be limited to recreational beach areas only. For the purposes of this subsection, "recreational beach area" means all areas within 100 yards of a staffed lifeguard stand.

(b) Projects involving the mechanical redistribution of sand from the lower beach profile to the upper beach profile, or alongshore, are acceptable, in accordance with the following standards:

1. – 4. (No change.)

5. In areas of documented habitat for **threatened** or endangered **beach** nesting shorebirds [~~(such as~~ Piping Plovers (*Charadrius melodus*) and Least Terns (*Sterna albifrons*)~~)]~~, no sand transfers shall take place between April 1 and August ~~15~~. ~~[The Land Use Regulation Program, in coordination with the Division of Fish, Game and Wildlife, will determine affected areas.]~~

i. The Department's Division of Fish and Wildlife shall develop a list of specific areas where this restriction shall apply, based on documented habitat during the most recent nesting season. The list of restricted areas shall be updated annually by the Division of Fish and Wildlife, at the end of each nesting season and be available upon request from the Department's Land Use Regulation Program at PO Box 439, Trenton, New Jersey 08625-0439 (609) 292-0060. The updated list shall be provided by the Department to each permittee prior to April 1 of each year.

ii. If a particular beach area is identified on the updated list as described in (b)5i above as habitat for threatened or endangered beach nesting shorebirds, regardless of the habitat classification of the previous nesting season, no sand transfers shall take place between April 1 and August 15 in those areas.

iii. If a particular beach area is not identified on the updated list as described in (b)5i above, but is subsequently found to contain a nest of a threatened or endangered beach nesting shorebird, the Department shall notify the permittee and no sand transfers shall take place between April 1 and August 15 in those areas.

iv. The restrictions contained in (b)5 above may be waived if the Department's Division of Fish and Wildlife determines that the identified areas do not represent suitable threatened or endangered beach nesting shorebird habitat, due to beach erosion or other causes. Requests for such a waiver shall be made in writing to the Land Use Regulation Program, PO Box 439, Trenton, New Jersey, 08625-0439; and

6. Sand transfers to or from wetland areas that may exist on a beach are not authorized by this permit.

~~[6-]7.~~ (No change in text)

New rule text subject to RPC

(a) Routine beach maintenance includes debris removal and clean-up; mechanical sifting and raking; maintenance of accessways; removal of sand from street ends, boardwalks/promenades and residential properties; the repair or reconstruction of existing boardwalks, gazebos and dune walkover structures; and limited sand transfers from the lower beach to the upper beach or alongshore (shore parallel). Sand transfers from the lower beach profile to the upper beach profile are specifically designed to restore berm width and elevation, to establish/enhance dunes and to repair dune scarps. Activities which preclude the development of a stable dune along the back beach are not considered to be routine beach maintenance activities, pursuant to this section. Specifically, the bulldozing of sand from the upper beach (berm) to the lower beach (beach face), for the purpose of increasing the berm width or flattening the beach profile, is not considered to be routine maintenance.

1. If the activities in (a) above are proposed to be conducted by a municipal or county agency on property owned by that governing body, then the municipal or county engineer must certify that the activities will be conducted in accordance with these standards. The appropriate municipal or county engineer is responsible for ensuring compliance with these requirements. If these activities are proposed to be conducted on privately owned property, then the property owner is responsible for ensuring that the activities will be conducted in accordance with these standards. If these activities are proposed to be conducted on State owned properties, then the DEP, Bureau of Construction and Engineering must certify that the activities will be conducted in accordance with these standards.

2. All guidelines and specifications of this section must be incorporated into any contract documents or work orders related to proposed beach and dune activities, as described in this section. The Land Use Regulation Program is available to assist in the development of specific maintenance plans for oceanfront locations, upon request.

3. In areas documented by the Department as habitat for threatened or endangered beach nesting shorebirds such as Piping Plovers (*Charadrius melodus*) and Least Terns (*Sterna albifrons*), no beach raking or other mechanical manipulation of the beach shall take place between April 1 and August 15.

- i. The Department's Division of Fish and Wildlife shall develop a list of specific areas where this restriction shall apply, based on documented habitat during the most recent nesting season. The list of restricted areas shall be updated annually by the Division of Fish and Wildlife, at the end of each nesting season and be available upon request from the Department's Land Use Regulation Program at PO Box 439, Trenton, New Jersey 08625-0439 (609) 292-0060. The updated list shall be provided by the Department to each permittee prior to April 1 of each year.
 - ii. If a particular beach area is identified on the updated list as described in (a)3i above as habitat for threatened or endangered beach nesting shorebirds, regardless of the habitat classification of the previous nesting season, no beach raking or other mechanical manipulation of the beach shall take place between April 1 and August 15 in those areas.
 - iii. If a particular beach area is not identified on the updated list as described in (a)3i above, but is subsequently found to contain a nest of a threatened or endangered beach nesting shorebird, the Department shall notify the permittee and no beach raking or mechanical manipulation of the beach shall take place between April 1 and August 15 in those areas.
 - iv. The restrictions contained in (a)3 above may be waived if the Department's Division of Fish and Wildlife determines that the identified areas do not represent suitable threatened or endangered beach nesting shorebird habitat, due to beach erosion or other causes. Requests for such a waiver shall be made in writing to the Land Use Regulation Program, PO Box 439, Trenton, New Jersey, 08625-0439; and
4. Mechanical sifting and beach raking shall be limited to recreational beach areas only. For the purposes of this subsection, "recreational beach area" means all areas within 100 yards of a staffed lifeguard stand.

(b) Projects involving the mechanical redistribution of sand from the lower beach profile to the upper beach profile, or alongshore, are acceptable, in accordance with the following standards:

1. The amount of sand transferred at any one time shall be limited to one foot scraping depth at the borrow zone. This borrow zone may not be rescraped until the sand volume from the previous scraping activities has been fully restored.
 2. The borrow zone shall be limited to the area between the low water line and the inland limit of the berm. It is strongly recommended that a program of beach profiling be utilized to monitor the condition of the beaches and to ensure compliance with the standards of this section.
 3. If the purpose of the sand transfers is to repair eroded dunes (dune scarps), all filled areas shall be stabilized with sand fencing and planted with beach grass in accordance with DEP and/or SCS standards. Fencing shall be in place within 30 days of the transfer operation, while the vegetative plantings may be installed during the appropriate seasonal planting period (October 15 through March 31, anytime the sand is not frozen).
 4. There shall be no disturbance to existing dune areas.
 5. In areas of documented habitat for threatened or endangered beach nesting shorebirds such as Piping Plovers (*Charadrius melodus*) and Least Terns (*Sterna albifrons*), no sand transfers shall take place between April 1 and August 15.
- i. The Department's Division of Fish and Wildlife shall develop a list of specific areas where this restriction shall apply, based on documented habitat during the most recent nesting season. The list of restricted areas shall be updated annually by the Division of Fish and Wildlife, at the end of each nesting season and be available upon request from the Department's Land Use Regulation Program at PO Box 439, Trenton, New Jersey 08625-0439 (609) 292-0060. The updated list shall be provided by the Department to each permittee prior to April 1 of each year.
 - ii. If a particular beach area is identified on the updated list as described in (b)5i above as habitat for threatened or endangered beach nesting shorebirds, regardless of the habitat classification of the previous nesting season, no sand transfers shall take place between April 1 and August 15 in those areas.
 - iii. If a particular beach area is not identified on the updated list as described in (b)5i above, but is subsequently found to contain a nest of a threatened or endangered beach nesting shorebird, the Department shall notify the permittee and no sand transfers shall take place between April 1 and August 15 in those areas.
 - iv. The restrictions contained in (b)5 above may be waived if the Department's Division of Fish and Wildlife determines that the identified areas do not represent suitable threatened or endangered beach nesting shorebird habitat, due to beach erosion or other causes. Requests for such a waiver shall be made in writing to the Land Use Regulation Program, PO Box 439, Trenton, New Jersey, 08625-0439; and
6. Sand transfers to or from wetland areas that may exist on a beach are not authorized by this permit.
7. Records of all sand transfer activities shall be maintained by the property owner, beach association, governmental agency or other authority conducting the activities, and shall be available for inspection by the Department, upon request. These records shall include, but not be limited to, dates of transfer, borrow area limits, fill area limits, estimates of the amount of sand transferred, the name of the person(s) supervising the transfer activities, and the engineering certification required (if appropriate) for all sand transfer activities.

7:7E-3A.3 Standards applicable to emergency post-storm beach restoration

Changes to existing text approved by OCRM

(a) This section on emergency post-storm beach restoration will apply to all beaches which are impacted by coastal storms with a recurrence interval equal to or exceeding a five-year storm event. **Emergency post-storm beach restoration projects not specifically identified in this section may be authorized by the Department through an Emergency Permit authorization pursuant to N.J.A.C. 7:7-1.7 if the Department determines that there is an imminent threat to lives or property.**

(b) – (e) (No change.)

(f) The placement of sand filled geotextile bags or ~~[tubes]~~ **geotubes**, as part of an emergency post-storm beach restoration plan, is acceptable, in accordance with the following standards:

1. ~~[The]~~ **In areas where dunes are present, the geotextile bags** or geotubes shall be placed along the toe of any scarped dune, or seaward of the dune toe, and not on the dune itself; ~~[and]~~

2. In areas where dunes are not present, the geotextile bags or geotubes shall be placed at the landward limit of the beach and in no case be placed below the mean high water line;

~~[2-]~~**3. The [tubes-or] geotextile bags or geotubes shall [should] be tapered at the end of the project area, to minimize the impact to adjacent areas which are not protected by the geotextile bags[/~~tubes~~] or geotubes[~~;~~].**

4. The crest and seaward side of the geotubes shall be buried to achieve a gradual, uniform slope from the upper beach to the crest of the geotextile bag or geotube;

5. The length of shoreline along which the geotextile bags or geotubes are installed shall not exceed a cumulative length of 500 feet;

6. Fill material for the geotextile bags or geotubes shall be from an upland source, excluding the beach and dune; and

7. The geotextile bag or geotube shall be installed parallel to the shoreline.

(g) The placement of sand, gravel, rubble, concrete, or other inert material, as part of an emergency post-storm beach restoration plan, is acceptable, in accordance with the following standards:

1. – 2. (No change.)

3. All concrete and rubble placed on the beach shall be removed within 90 days, unless the placement is part of a ~~[DEPE]~~ **Department** approved, engineered design for permanent shore protection; and

4. (No change.)

New rule text subject to RPC

(a) This section on emergency post-storm beach restoration will apply to all beaches which are impacted by coastal storms with a recurrence interval equal to or exceeding a five-year storm event. Emergency post-storm beach restoration projects not specifically identified in this section may be authorized by the Department through an Emergency Permit authorization pursuant to N.J.A.C. 7:7-1.7 if the Department determines that there is an imminent threat to lives or property.

(b) Beach restoration activities, as part of an emergency post-storm recovery, include: the placement of clean fill material with grain size compatible with (or larger than) the existing beach material; the bulldozing of sand from the lower beach profile to the upper beach profile; the alongshore transfer of sand on a beach; the placement of concrete or rubble; and the placement of sand filled geotextile bags or tubes. The placement of sand filled geotextile bags or tubes is preferred to the placement of concrete, rubble or other material.

(c) The emergency post-storm beach restoration activities in (b) above should be designed and implemented as a means to restore the beaches to the pre-storm condition, or to restore the beaches to a level sufficient to provide protection from a storm event with a minimum recurrence interval of five years (five-year storm protection). For the purpose of this section, five-year storm protection equates to a minimum 30-foot wide berm at elevation +8 Mean Sea Level (NAD, 1983). Restoration beyond the pre-storm beach condition is encouraged by the Department, but will not be considered "emergency post-storm beach restoration," pursuant to this section.

(d) The bulldozing of sand from the lower beach profile to the upper beach profile, as part of an emergency post-storm beach restoration plan, is acceptable, in accordance with the following standards:

1. Bulldozing is limited to the beach area landward of the low water line. Removal of material from below the low water line is considered dredging, and is not authorized pursuant to this section; and

2. The beach face cannot be graded to a slope steeper than 1:3.

(e) The longshore transfer of sand from one beach area to another, as part of an emergency post-storm beach restoration plan, is acceptable, in accordance with the following standards:

1. No disturbance to existing dune areas is permitted;
2. Sand borrow areas shall not be bulldozed to a depth which exceeds one foot;
3. The borrow areas may not be rescarped until full sand volume recovery has occurred; and
4. An adequate supply of sand is available at the borrow area site, so that the relocation of this material will not decrease the level of protection adjacent to the borrow area.

(f) The placement of sand filled geotextile bags or geotubes, as part of an emergency post-storm beach restoration plan, is acceptable, in accordance with the following standards:

1. In areas where dunes are present, the geotextile bags or geotubes shall be placed along the toe of any scarped dune, or seaward of the dune toe, and not on the dune itself;
2. In areas where dunes are not present, the geotextile bags or geotubes shall be placed at the landward limit of the beach and in no case be placed below the mean high water line;
3. The geotextile bags or geotubes shall be tapered at the end of the project area, to minimize the impact to adjacent areas which are not protected by the geotextile bags or geotubes;
4. The crest and seaward side of the geotubes shall be buried to achieve a gradual, uniform slope from the upper beach to the crest of the geotextile bag or geotube;
5. The length of shoreline along which the geotextile bags or geotubes are installed shall not exceed a cumulative length of 500 feet;
6. Fill material for the geotextile bags or geotubes shall be from an upland source, excluding the beach and dune; and
7. The geotextile bag or geotube shall be installed parallel to the shoreline.

(g) The placement of sand, gravel, rubble, concrete, or other inert material, as part of an emergency post-storm beach restoration plan, is acceptable, in accordance with the following standards:

1. All material shall be non-toxic sand, gravel, concrete, rubble, or other inert material;
2. The placement of concrete or rubble shall be temporary in nature, and is not to be used as permanent protection, unless it is part of a DEP approved, engineered design for permanent shore protection;
3. All concrete and rubble placed on the beach shall be removed within 90 days, unless the placement is part of a Department approved, engineered design for permanent shore protection; and
4. The use of automobiles, tires, wood debris, asphalt, appliances or other solid waste is prohibited.

7:7E-3A.4 Standards applicable to dune creation and maintenance

Changes to existing text approved by OCRM

[7:7E-3A.3] 7:7E-3A.4 Standards applicable to dune creation and maintenance

(a) – (b) (No change.)

(c) All proposed dune vegetation should be limited to the following coastal species: American Beachgrass (*Ammophila breviligulata*), Coastal Panicgrass (*Panicum amarulum*), ~~Japanese Sedge (*Carex kobomugi*)~~, Bayberry (*Myrica pennsylvanica*), ~~Rugosa Rose (*Rosa rugosa*)~~, Beach Plum (*Prunus maritima*), **and** Shore Juniper (*Juniperus conferta*) ~~and Japanese Black Pine (*Pinus thunbergii*)~~. Although they may not be currently available from commercial nurseries at this time, the following plant species are also well suited to the dune environment: Seaside Goldenrod (*Solidago sempervirens*), ~~Dusty Miller (*Artemisia stelleriana*)~~, Beach Pea (*Lathyrus japonicus*), Sea Oats (*Uniola paniculata*), Bitter Panicgrass (*Panicum amarum*), and even Saltmeadow Cordgrass (*Spartina patens*).

1. – 2. (No change.)

(d) –(f) (No change.)

New text subject to RPC

(a) Dune creation and maintenance includes the placement and/or repair of sand fencing (including wooden support posts), the planting and fertilization of appropriate dune vegetation, the maintenance and clearing of beach access pathways less than eight feet in width, and the construction or repair of approved dune walkover structures. Bulldozing, excavation, grading, vegetation removal or clearing, and relocation of existing dunes are not authorized pursuant to this section.

(b) All dune creation and maintenance activities should be conducted in accordance with the specifications found in Guidelines and Recommendations for Coastal Dune Restoration and Creation Projects (DEP, 1985), and/or Restoration of Sand Dunes Along the Mid-Atlantic Coast (Soil Conservation Service, 1992). The Department will provide site specific technical assistance for dune creation and maintenance projects, upon request.

(c) All proposed dune vegetation should be limited to the following coastal species: American Beachgrass (*Ammophila breviligulata*), Coastal Panicgrass (*Panicum amarulum*), Bayberry (*Myrica pennsylvanica*), Beach Plum (*Prunus maritima*), and Shore Juniper (*Juniperus conferta*). Although they may not be currently available from commercial nurseries at this time, the following plant

species are also well suited to the dune environment: Seaside Goldenrod (*Solidago sempervirens*), Beach Pea (*Lathyrus japonicus*), Sea Oats (*Uniola paniculata*), Bitter Panicgrass (*Panicum amarum*), and even Saltmeadow Cordgrass (*Spartina patens*).

1. American beachgrass is the preferred species for the stabilization of newly established dunes, and for stabilization of the primary frontal dune. Woody plant species are suitable for back dune and secondary dune environments. Herbaceous plant species are preferred as supplemental plantings for all dune areas.

2. Dune vegetation should be diversified as much as possible, in an effort to provide continuous stabilization in the event that pathogens reduce or eliminate the effectiveness of one species. A complex of associated grasses, herbaceous species and woody species is preferred to the planting of one species.

(d) The construction of elevated timber dune walkover structures shall be in accordance with the standards and specifications (or similar specifications) described in Beach Dune Walkover Structures (Florida Sea Grant, 1981). The construction of elevated dune walkover structures, particularly at municipal street-ends and other heavily used beach access points, is preferred to the construction of pathways or walkways through the dunes.

1. Copies of the DEP and Florida Sea Grant reports are available from the DEP, Land Use Regulation Program, PO Box 439, Trenton, NJ 08625-0439. Copies of the Soil Conservation Service report are available directly from the Soil Conservation Service, Plant Materials Center, 1536 Route 9 North, Cape May Court House, NJ 08210.

(e) The construction of at-grade dune walkovers is acceptable only at single family and duplex residential dwellings, subject to the following conditions:

1. Only one walkover per residential building is allowed;

2. The width of the walkover must not exceed four feet;

3. The walkover shall be fenced on both sides through the use of sand fencing;

4. The use of unrolled sand fencing as a base for the walkover is preferred to the use of planks and boards. Sand fence based walkovers allow for easier seasonal removal and placement, and allow for greater growth of beachgrass, while still providing an adequate base for pedestrian traffic; and

5. Solid boardwalk type walkovers shall be elevated at least one foot above the dune, to allow for movement of sand and vegetative growth under the boardwalk structure.

(f) The controlled use of discarded natural Christmas trees for the purpose of dune stabilization is generally discouraged, but may be acceptable, in accordance with the standards set forth below. Discarded Christmas trees serve the same function as sand fencing, by trapping wind blown sand and facilitating sand deposition and dune formation. However, uncontrolled or inappropriate placement of trees will hinder the development of dunes and may present a fire hazard.

1. Only natural, coniferous trees are suitable for use in dune stabilization. The use of tree limbs, clippings, artificial trees, and other dead vegetation is prohibited;

2. Trees should be placed at least 100 feet landward of the high water line, in areas which are generally not subject to spring tidal inundation and wave swash action;

3. The placement of trees should be oriented against the prevailing winds, in either a straight line or zig-zag formation;

4. The trees should be installed by overlapping the stump end of one tree with the pointed end of another, and then anchoring the connection point with a sufficient amount of sand to hold the trees in place;

5. Newly placed trees should be monitored to ensure that the trees remain anchored and do not become dislodged. Additional quantities of sand or wooden anchor stakes may be used to hold the trees in place until they become stabilized; and

6. All newly deposited sand should be stabilized through the planting of beachgrass, during the appropriate planting season.

7:7E-3A.5 Standards applicable to construction of boardwalks

Changes to existing text approved by OCRM

[7:7E-3A.4] **7:7E-3A.5** Standards applicable to construction of boardwalks

No change in rule text.

Routine Program Change - Summary of rule changes and significance of change
Coastal Zone Management rules -Subchapter 3B
Information Required in Tidal Wetland and Intertidal and Subtidal Shallows Mitigation Proposals
February 6, 2006

The rule changes described in detail below do not change the program approvability areas of special management areas and boundaries. While the rule changes may affect the program approvability areas of uses subject to management, authorities and organization or consideration of the national interest, these changes are not substantial for the reasons set forth below.

Rule Citation	Rule Change	Significance of Change
Subchapter 3B	➤ Changed title of the Subchapter	The change to the title of this subchapter does not substantially change the uses subject to management. This subchapter contains the requirements for mitigation proposals submitted to the Department. Prior to the 2003 amendments, this subchapter only addressed wetland mitigation proposals. In order to make the CZM rules easier to use, the Department consolidated information requirements for all mitigation projects both wetlands and intertidal and subtidal shallows into this subchapter. Specifically this subchapter lists the information necessary to allow the Department to determine that the proposed project is appropriate in scope and design, that the project will be constructed properly and that post construction/planting monitoring will occur to assure the mitigation project is successful.
7:7E-3B.1 Purpose and scope (NEW)	➤ Added purpose and scope to this subchapter for consistency with the Chapter	The addition of a Purpose and Scope subsection does not substantially change uses subject to management. This change merely sets forth a "roadmap" to the contents of Subchapter 3B.
7:7E-3B.2 Tidal wetland and intertidal and subtidal shallows mitigation proposal requirements (Recodified from N.J.A.C. 7:7E-3B.1)	➤ Updated listing of items to be submitted as part of tidal wetland mitigation proposals	The changes updating the listing of items to be submitted as part of tidal mitigation proposals do not substantially change uses subject to management. The updated listing merely reflects the Department's experience with tidal wetlands mitigation projects.
	➤ Added items to be submitted as part of intertidal and subtidal shallow mitigation proposals	The changes adding items to be submitted as part of intertidal and subtidal shallow mitigation proposals do not substantially change the uses subject to management. As discussed in the summary of the changes to the intertidal and subtidal shallows rule, N.J.A.C. 7:7E-3.15, mitigation has been required for the destruction of intertidal and subtidal shallows since August 1990. Although not previously codified, the information necessary for intertidal and subtidal shallow mitigation proposals has been required by the Department for a number of years. This change merely codifies the information requirements.
	➤ Changes in codification, grammar and terminology	Changes in codification, grammar, cross-reference and terminology for consistency throughout the chapter are considered to be minor changes to the program that do not change the 5 program approvability areas but are included for notification purposes.
7:7E-3B.3 Financial assurance requirements (NEW)	➤ Financial assurance not required for government agencies and pursuant to Federal Law ➤ Must be obtained from a firm licensed to do business in New Jersey	The changes to the financial assurance requirements formerly codified as N.J.A.C. 7:7E-3B.1(a)16 do not substantially change the uses subject to management or consideration of the national interest. A financial assurance has always been required prior to the approval of a mitigation proposal by the Department. An exception has been added for government agencies and entities that are exempt from this requirement under Federal law. For example, a portion of a mitigation area may be subject to cleanup under the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA). In such case, CERCLA requires its own financial assurance. Therefore, under this rule, the mitigator would not be required to provide additional financial assurance in this instance.

Rule Citation	Rule Change	Significance of Change
7:7E-3B.3 Financial assurance requirements (continued)	<ul style="list-style-type: none"> ➤ Requires construction and maintenance assurance ➤ Requires it to be updated annually ➤ Provides for release of assurance when milestone have been met 	<p>The rule requires that the financial assurance be obtained from a firm licensed to do business in New Jersey, thus ensuring that they are qualified to provide financial assurance in New Jersey.</p> <p>A construction assurance is required for both wetlands and intertidal and subtidal shallow mitigation proposals. The construction assurance is the same as that previously codified at N.J.A.C. 7:7E-3B.1(a)16. A maintenance assurance continues to be required for wetland creation, restoration or enhancement.</p> <p>However, the maintenance assurance has been increased from 30% to 115% of the estimated cost of maintaining and monitoring the project. This increase is in response to the Department's experience that the cost of maintenance can be as high or higher than the cost of constructing the project making the 30% inadequate in many cases to assure that maintenance will occur. A maintenance assurance is not required for intertidal and subtidal shallow mitigation projects because there is no vegetative community to maintain.</p> <p>The rule also requires that the financial assurance be updated annually to reflect changing economic conditions.</p> <p>The rule also provides for the release of the financial assurance once certain milestones are met. The construction assurance will be released when the Department finds that the construction and planting phase has been successfully completed. Similarly, the maintenance assurance will be released when the Department finds that the mitigation project is successful. This rule preserves the national interest in creating, restoring and enhancing wetlands.</p>
7:7E-3B.4 Department review of mitigation proposal (NEW)	<ul style="list-style-type: none"> ➤ Sets forth Department's procedure for reviewing mitigation proposals ➤ Provides that within 60 days of receipt of mitigation proposal, Department will either request additional information or declare the proposal complete ➤ Department will only approve mitigation proposals that meet all applicable provisions of Subchapter 3B ➤ Upon Department approval and prior to construction, mitigator must record required conservation restriction 	<p>The addition of a rule setting forth the Department's procedure for reviewing mitigation proposals does not substantially change the uses subject to management. The new rule merely codifies the procedural aspects of reviewing mitigation proposals.</p>
7:7E-3B.5 Post-Construction monitoring of the mitigation site (NEW)	<ul style="list-style-type: none"> ➤ Sets forth performance standards for post-construction monitoring of tidal wetlands and intertidal and subtidal shallow mitigation projects and contents of the post-construction monitoring report 	<p>The codification of post-construction monitoring standards does not substantially change the uses subject to management. These standards have been used by the Department for several years. By providing clear predictable performance standards through the codification of this rule, the Department anticipates an increase in the timely success of mitigation projects. This rule preserves the national interest in creating, restoring and enhancing wetlands.</p>

Rule text - Subchapter 3B

February 6, 2006

Changes to existing rule text approved by OCRM are shown as follows:

Additions indicated in **boldface**; and

Deletions indicated in [~~bracketed strikethrough~~].

7:7E-3B INFORMATION REQUIRED IN TIDAL WETLAND AND INTERTIDAL AND SUBTIDAL SHALLOWS MITIGATION PROPOSALS

CHANGES TO EXISTING TEXT APPROVED BY OCRM

7:7E-3B INFORMATION REQUIRED IN TIDAL WETLAND AND INTERTIDAL AND SUBTIDAL SHALLOWS MITIGATION PROPOSALS

7:7E-3B.1 Purpose and scope

New rule text subject to RPC

(a) This subchapter sets forth the standards for mitigation proposals pursuant to N.J.A.C. 7:7E-3.15 and 7:7E-3.27.

- 1. Mitigation for the loss of tidal wetlands and intertidal and subtidal shallows shall comply with the Coastal Permit Program rules, N.J.A.C. 7:7, and the Coastal Zone Management rules, N.J.A.C. 7:7E, and include an appropriate buffer area; and**
- 2. Mitigation for the loss of freshwater wetlands shall comply with the Freshwater Wetlands Protection Act rules, N.J.A.C. 7:7A, Coastal Permit Program rules, N.J.A.C. 7:7, and the Coastal Zone Management rules, N.J.A.C. 7:7E.**

~~[7:7E-3B.1]~~ **7:7E-3B.2 [Mitigation proposal requirements] Tidal wetland and intertidal and subtidal shallows mitigation proposal requirements**

~~(a). [Mitigation proposals based on the disturbance of freshwater wetlands must also conform to the standards found at N.J.A.C. 7:7A-14.4.]~~ All **tidal wetland and intertidal and subtidal shallows** mitigation proposals submitted to the Land Use Regulation Program shall include, but not be limited to:

1. An introduction describing the wetland **or intertidal and subtidal shallows** mitigation proposal. The introduction ~~[should]~~ **shall** include the ~~[specific goals of the mitigation proposal and a discussion of how the mitigation proposal will satisfy those goals]~~ **following[;]:**
 - i. The amount, in acres, of:**
 - (1) Wetlands to be created, enhanced, or restored, in accordance with N.J.A.C. 7:7E-3.27 and the associated wetlands buffer area required by N.J.A.C. 7:7E-3.28; or**
 - (2) The amount of intertidal and subtidal shallows to be created as required by N.J.A.C. 7:7E-3.15;**
 - ii. The goals of the mitigation project in terms of either (a)1ii(1) or (2) below:**
 - (1) For creation, restoration or enhancement of wetlands, the wetlands types, values, and functions, and a discussion of how the mitigation proposal will satisfy those goals. For example, the goal of the wetlands mitigation project is to establish a low marsh wetland complex dominated by *Spartina alterniflora* that is flowed twice daily by the tide; or**
 - (2) For intertidal and subtidal shallows creation, the area, depth, and duration of tidal inundation;**
 - iii. The reasons why the mitigation site is an appropriate site for meeting the goals in (a)1ii above, and the aspects of the site that will ensure the success of the mitigation project;**
 - iv. A copy of the USGS quad map(s) showing the location of the permitted activity and showing the mitigation site with the state plane coordinates of the mitigation site. The accuracy of these coordinates shall be within 50 feet of the actual center point of the site. For linear mitigation projects 2000 feet in length and longer, additional coordinates shall be provided at each 1000 foot interval; and**
 - v. The New Jersey Wetlands/Tidelands Map number(s) for the development and for the mitigation site, if the mitigation site is at a different location;**
2. A description (~~[that is,]~~ **such as** size, type, vegetation, hydrology, and **wildlife use**) of the wetlands **or intertidal and subtidal shallows** that are being destroyed or disturbed **by the permitted activity;**
3. Photographs of the proposed mitigation site **showing topography, vegetation, tidal streams and wetland features;**
4. The names and addresses of **all** current and proposed owner(s) of the mitigation [~~project~~] site;
- 5. The lot, block, municipality and county of the proposed mitigation site. This information shall also be visible on the front page of the proposal and on the site plan;**

Recodify 5 as 6. (No change in text.)

~~[6. A discussion relative to the proposed hydrology of the mitigation site. The discussion should focus on the sources of water for the mitigation project, provide seasonal high water table information as well as the projected elevation of final grade of the mitigation project in relation to~~

mean sea level (MSL), along with slope percent;

7. The tidal range of the mitigation site and the salinity range of adjacent inundating waters;]

7. A projected water budget for the proposed mitigation site. The water budget should detail the sources of water for the mitigation project as well as the water losses. The projected water budget should document that an ample supply of water is available to create, enhance, or restore wetland conditions, as applicable. The water budget must contain sufficient data to show that the mitigation project will indefinitely in the future have sustained wetland hydrology, or for intertidal and subtidal shallows, that the mitigation project will have sustained tidal inundation. The water budget shall include the following regional information for the proposed and existing site conditions:

i. The seasonal high water table;

ii. The tidal range (low, high and spring high tide) over the course of a month;

iii. For wetland creation, restoration or enhancement, the elevation of the existing reference wetland system in the vicinity of the project site, if applicable; and

iv. For wetland creation, restoration or enhancement, the salinity range of adjacent waters;

8. ~~[The existing soils types with soil borings to document seasonal high water tables, with a]~~ **For wetland creation, restoration and enhancement, a detailed** discussion relating to the created substrate of the proposed mitigation site, including a description of how the substrate of the site will be prepared, **as well as a demonstration that the soil texture and pH are appropriate for the proposed wetland community;** ~~[whether the pH is appropriate and any other pertinent factors];~~

9. ~~[A planting scheme of the proposed vegetative community depicted on the mitigation site plans, including spacing of all plantings, stock type (bare root, potted, seed), size, and the source of the plant material;]~~ **For wetland creation, restoration and enhancement, a landscape plan showing the proposed vegetative community on the proposed mitigation site, including the buffer area defined at N.J.A.C. 7:7E-3.28. The landscape plan shall include the following:**

i. The species;

ii. The quantity and location of each species;

iii. The stock type (for example, plugs, potted, seed);

iv. The source of the plant material;

v. The proper time to plant; and

vi. Any appropriate substitutions as approved by the Department;

10. For wetland creation, restoration and enhancement, a preventative maintenance plan detailing how invasive or noxious vegetation will be controlled, and how predation of the mitigation plantings will be prevented. The plan shall describe the measures to be taken if a problem with invasive or noxious plants or predation occurs during the construction or monitoring period. The installation of goose fences to control problems resulting from the presence of geese in the State is encouraged;

~~[10. A copy of a deed restriction which provides that no regulated activities will occur in the mitigation area or its associated transition area and that it will remain as a natural area in perpetuity.]~~ **11. A draft conservation restriction that meets the requirements of N.J.A.C. 7:7E-3.27(h)6. A model conservation restriction is available from the Land Use Regulation Program, PO Box 439, Trenton, New Jersey 08625-0439, (609) 777-0454** ~~[Proof that the deed restriction has been registered with the County Clerk (or the Registrar of Deeds and Mortgages if applicable) is required within 60 days following approval of the mitigation proposal];~~

~~[11.]~~ **12. A metes and bounds description of the proposed mitigation site [which forms the basis for the deed restriction]. For wetland creation, restoration or enhancement, the [The] metes and bounds description shall include the [transition] buffer area as defined at N.J.A.C. 7:7E-3.28;**

~~[12. The New Jersey Wetlands/Tidelands Map number(s) for the development site (and the mitigation site if it is at a different location) as well as block and lot numbers and ownership of the mitigation site;]~~

~~[13. The]~~ **13. An estimate of the actual cost [estimate] of carrying out the construction of the mitigation [proposal] project. The cost estimate [should] shall include the [cost] value of the land, site preparation costs, engineering costs, plantings costs, [and any other items incidental to the mitigation proposal] environmental consultant fees, attorney fees, construction costs, supervising construction fees and monitoring costs. The cost estimate of the project will be used when determining the amount of the financial assurance required;**

14. ~~[Five folded copies of a]~~ **A site plan for the mitigation project which includes:**

i. [The project location within the region;

ii. The lot and block number of the mitigation project location;] The lot, block, municipality and county of the proposed mitigation site; and

[iii.]ii. Existing and proposed elevations and grades of the mitigation site, [in one-foot intervals] and off-site elevations and grades when the proposed elevations on the mitigation project site will create potentially unstable conditions on the adjoining parcel or create slopes greater than 15 percent. All existing and proposed elevations and

grades must be shown in at least one foot intervals. For wetland creation, restoration or enhancement, only, the slope of the proposed mitigation site shall have a run to rise ratio no greater than 10 feet vertical to one foot horizontal (10:1) along a created buffer area as well as along any berms that are intended to function as water control structures or berms created along a stream; [and]

[iv.] iii. Pre- and post- construction [Plan] plan views and cross sectional views of the mitigation site;

iv. For wetland creation, restoration or enhancement only, the buffer area required under N.J.A.C. 7:7E-3.28;

v. For wetland creation, restoration or enhancement only, a detail that shows, or a statement indicating the soil amendments and the seed stabilization mix, if any, to be used on the mitigation site;

~~[15. A copy or photocopy of a portion of the U.S.G.S. 7.5 minute quadrangle map showing the location of the property and its general vicinity, indicating and labeling the location of the proposed mitigation and the property boundaries, and a determination of the State Plane Coordinates for the center of the mitigation site. The accuracy of these coordinates should be within 50 feet of the actual center point. For linear mitigation projects, the applicant shall provide State Plane Coordinates for the endpoints of those projects which are 1,999 feet or less, and for those projects which are 2,000 feet and longer, additional coordinates at each 1,000 foot interval; and]~~

15. A construction schedule including projected dates of excavation, planting, fertilizing, as appropriate; and

16. Certification demonstrating that the proposed mitigation will not adversely affect districts, buildings, structures, or archaeological sites that are listed in, or eligible for listing in, the National Register of Historic Places. If during construction of the mitigation site the mitigator encounters National Register of Historic Places listed or eligible historic districts, buildings, structures, or archaeological sites, the mitigator shall notify the Department immediately and proceed as directed by the Department;

~~[16. In accordance with N.J.A.C. 7:7A-14.1, obtain a secured bond or other financial surety acceptable to the Department including an irrevocable letter of credit or money in escrow, that shall be sufficient to hire an independent contractor to complete and maintain the proposed mitigation should the permittee default. The financial surety for the construction of the mitigation project shall be posted in an amount equal to 115 percent of the estimated cost of construction. In addition, the financial surety to assure success of the mitigation shall be posted in an amount equal to 30 percent of the estimated cost of construction. The financial surety will be reviewed annually and shall be adjusted to reflect current economic factors. Mitigation for the loss of freshwater wetlands within the coastal zone shall comply with the Coastal Permit Program Rules at N.J.A.C. 7:7, Rules on Coastal Zone Management at N.J.A.C. 7:7E, and Freshwater Wetlands Protection Act Rules at N.J.A.C. 7:7A. Mitigation for the loss of tidal wetlands must comply with the Coastal Permit Program Rules at N.J.A.C. 7:7 and the Rules on Coastal Zone Management at N.J.A.C. 7:7E.]~~

17. A financial assurance that meets the requirements at N.J.A.C. 7:7E-3B.3 below; and

18. Any additional information the Department determines necessary to review an individual mitigation project.

New rule text subject to RPC

(a). All tidal wetland and intertidal and subtidal shallows mitigation proposals submitted to the Land Use Regulation Program shall include, but not be limited to:

1. An introduction describing the wetland or intertidal and subtidal shallows mitigation proposal. The introduction shall include the following:

i. The amount, in acres, of:

(1) Wetlands to be created, enhanced, or restored, in accordance with N.J.A.C. 7:7E-3.27 and the associated wetlands buffer area required by N.J.A.C. 7:7E-3.28; or

(2) The amount of intertidal and subtidal shallows to be created as required by N.J.A.C. 7:7E-3.15;

ii. The goals of the mitigation project in terms of either (a)1ii(1) or (2) below:

(1) For creation, restoration or enhancement of wetlands, the wetlands types, values, and functions, and a discussion of how the mitigation proposal will satisfy those goals. For example, the goal of the wetlands mitigation project is to establish a low marsh wetland complex dominated by *Spartina alterniflora* that is flowed twice daily by the tide; or

(2) For intertidal and subtidal shallows creation, the area, depth, and duration of tidal inundation;

iii. The reasons why the mitigation site is an appropriate site for meeting the goals in (a)1ii above, and the aspects of the site that will ensure the success of the mitigation project;

iv. A copy of the USGS quad map(s) showing the location of the permitted activity and showing the mitigation site with the state plane coordinates of the mitigation site. The accuracy of these coordinates shall be within 50 feet of the actual center point of the site. For linear mitigation projects 2,000 feet in length and longer, additional coordinates shall be provided at each 1,000 foot interval; and

v. The New Jersey Wetlands/Tidelands Map number(s) for the development and for the

- mitigation site, if the mitigation site is at a different location;
2. A description (such as size, type, vegetation, hydrology, and wildlife use) of the wetlands or intertidal and subtidal shallows that are being destroyed or disturbed by the permitted activity;
 3. Photographs of the proposed mitigation site showing topography, vegetation, tidal streams and wetland features;
 4. The names and addresses of all current and proposed owner(s) of the mitigation site;
 5. The lot, block, municipality and county of the proposed mitigation site. This information shall also be visible on the front page of the proposal and on the site plan;
 6. A discussion relative to the proposed hydrology of the mitigation site. The discussion should focus on the sources of water for the mitigation project, provide seasonal high water table information as well as the projected elevation of final grade of the mitigation project in relation to mean sea level (MSL), along with slope percent;
 7. A projected water budget for the proposed mitigation site. The water budget should detail the sources of water for the mitigation project as well as the water losses. The projected water budget should document that an ample supply of water is available to create, enhance, or restore wetland conditions, as applicable. The water budget must contain sufficient data to show that the mitigation project will indefinitely in the future have sustained wetland hydrology, or for intertidal and subtidal shallows, that the mitigation project will have sustained tidal inundation. The water budget shall include the following regional information for the proposed and existing site conditions:
 - i. The seasonal high water table;
 - ii. The tidal range (low, high and spring high tide) over the course of a month;
 - iii. For wetland creation, restoration or enhancement, the elevation of the existing reference wetland system in the vicinity of the project site, if applicable; and
 - iv. For wetland creation, restoration or enhancement, the salinity range of adjacent waters;
 8. For wetland creation, restoration and enhancement, a detailed discussion relating to the created substrate of the proposed mitigation site, including a description of how the substrate of the site will be prepared, as well as a demonstration that the soil texture and pH are appropriate for the proposed wetland community;
 9. For wetland creation, restoration and enhancement, a landscape plan showing the proposed vegetative community on the proposed mitigation site, including the buffer area defined at N.J.A.C. 7:7E-3.28. The landscape plan shall include the following:
 - i. The species;
 - ii. The quantity and location of each species;
 - iii. The stock type (for example, plugs, potted, seed);
 - iv. The source of the plant material;
 - v. The proper time to plant; and
 - vi. Any appropriate substitutions as approved by the Department;
 10. For wetland creation, restoration and enhancement, a preventative maintenance plan detailing how invasive or noxious vegetation will be controlled, and how predation of the mitigation plantings will be prevented. The plan shall describe the measures to be taken if a problem with invasive or noxious plants or predation occurs during the construction or monitoring period. The installation of goose fences to control problems resulting from the presence of geese in the State is encouraged;
 11. A draft conservation restriction that meets the requirements of N.J.A.C. 7:7E-3.27(h)6. A model conservation restriction is available from the Land Use Regulation Program, PO Box 439, Trenton, New Jersey 08625-0439, (609) 777-0454;
 12. A metes and bounds description of the proposed mitigation site. For wetland creation, restoration or enhancement, the metes and bounds description shall include the buffer area as defined at N.J.A.C. 7:7E-3.28;
 13. An estimate of the actual cost of carrying out the construction of the mitigation project. The cost estimate shall include the value of the land, site preparation costs, engineering costs, plantings costs, environmental consultant fees, attorney fees, construction costs, supervising construction fees and monitoring costs. The cost estimate of the project will be used when determining the amount of the financial assurance required;
 14. A site plan for the mitigation project which includes:
 - i. The lot, block, municipality and county of the proposed mitigation site; and
 - ii. Existing and proposed elevations and grades of the mitigation site, and off-site elevations and grades when the proposed elevations on the mitigation project site will create potentially unstable conditions on the adjoining parcel or create slopes greater than 15 percent. All existing and proposed elevations and grades must be shown in at least one foot intervals. For wetland creation, restoration or enhancement, only, the slope of the proposed mitigation site shall have a run to rise ratio no greater than 10 feet vertical to one foot horizontal (10:1) along a created buffer area as well as along any berms that are intended to function as water control structures or berms created along a stream;
 - iii. Pre- and post- construction plan views and cross sectional views of the mitigation site;
 - iv. For wetland creation, restoration or enhancement only, the buffer area required under N.J.A.C. 7:7E-3.28;
 - v. For wetland creation, restoration or enhancement only, a detail that shows, or a statement indicating the soil amendments and the seed stabilization mix, if any, to be used on the mitigation site;

15. A construction schedule including projected dates of excavation, planting, fertilizing, as appropriate;
16. Certification demonstrating that the proposed mitigation will not adversely affect districts, buildings, structures, or archaeological sites that are listed in, or eligible for listing in, the National Register of Historic Places. If during construction of the mitigation site the mitigator encounters National Register of Historic Places listed or eligible historic districts, buildings, structures, or archaeological sites, the mitigator shall notify the Department immediately and proceed as directed by the Department;
17. A financial assurance that meets the requirements at N.J.A.C. 7:7E-3B.3; and
18. Any additional information the Department determines necessary to review an individual mitigation project.

7:7E-3B.3 Financial assurance requirements

subject to RPC

(a) A letter of credit or other financial assurance is required prior to approval of the mitigation proposal by the Department, except if the mitigator is a government agency or an entity that is exempt from this requirement under Federal Law. The letter of credit or other financial assurance shall be obtained from a firm licensed to do business in New Jersey.

(b) The letter of credit or other financial assurance shall be in the amount sufficient for the Department to hire an independent contractor to complete and maintain the mitigation project should the mitigator default. The financial assurance shall be in the following amounts:

- 1. For wetland creation, restoration or enhancement, and for intertidal and subtidal shallows creation, a construction assurance, equal to 115 percent of the estimated cost of completing the mitigation; and**
- 2. For wetland creation, restoration or enhancement, a maintenance assurance to ensure success of the mitigation through the completion of the monitoring period, equal to 115 percent of the estimated cost of maintaining and monitoring the mitigation project.**

(c) The financial assurance will be reviewed annually by the Department and shall be adjusted to reflect current economic factors.

(d) The portion of the financial assurance required under (b)1 above, shall be released upon the Department's determination that the construction phase and planting phase, if any, of the mitigation project have been successfully completed in accordance with the mitigation proposal; and

(e) The portion of the financial assurance required under (b)2 above, shall be released upon the Department's finding that the mitigation project is successful in accordance with N.J.A.C. 7:7E-3B.5.

7:7E-3B.4 Department review of mitigation proposal

subject to RPC

(a) The Department shall, within 60 days after receiving a mitigation proposal, review the proposal for completeness and:

- 1. Request any addition information; or**
- 2. Declare the mitigation proposal complete.**

(b) The Department shall approve a mitigation proposal only if it meets all of the applicable requirements of this subchapter.

(c) Prior to the commencement of mitigation, the mitigator shall submit proof that the conservation restriction required at N.J.A.C. 7:7E-3B.2(a)11 was recorded with the County Clerk (or the Registrar of Deeds and Mortgages, if applicable).

7:7E-3B.5 Post-construction monitoring of the mitigation site

text subject to RPC

(a) All mitigation projects subject to this subchapter shall perform post-construction monitoring in accordance with (a)1 or 2 below.

- 1. All tidal wetland mitigation sites shall demonstrate compliance with each post-construction monitoring season specified in (b) 1, 2 and 3 below. Post-construction monitoring shall begin the first full growing season after the construction/planting of the mitigation project is completed. A full growing post-construction monitoring season, in general, is the period from the beginning of April through the beginning of October, depending upon the location of the site in the State.**
- 2. All intertidal and subtidal shallows mitigation sites shall demonstrate compliance with the post-construction monitoring standards at (c)1 and 2 below for a lunar month after construction of the mitigation site is completed. A lunar month is the**

period between two successive full moons.

(b) For wetland mitigation projects, the post-construction monitoring required at (a)1 above shall meet the standards listed below for each full growing post-construction monitoring season. Failure to meet the standards for a given post-construction monitoring season described at (b)1, 2 or 3 below shall result in a remedial action by the mitigator. The Department, after consultation with the mitigator, shall determine the remedial actions necessary to correct the unsatisfactory condition. Remedial action may include, but not be limited to, regrading, replanting, or relocation of the mitigation site.

1. For the first post-construction monitoring season to be considered successful, the post-construction monitoring report described at (d) below shall provide documentation demonstrating that the standards listed at 1i through iv below are satisfied. If one or more of the standards listed below are not satisfied, then a remedial action as described in (b) above will be required, and this full growing post-construction monitoring season shall be repeated.

i. Documentation through soil borings, demonstrating that the appropriate soil was used on the site as indicated in the mitigation approval;

ii. As-built plans, demonstrating that the site was graded and planted in accordance with the approved mitigation plans;

iii. Based on the approved water budget prepared in accordance with N.J.A.C. 7:7E-3B.2(a)7, documentation demonstrating the mitigation site is a wetland;

iv. Documentation demonstrating that the percent coverage of the planted vegetation or targeted hydrophytes as detailed in the approved mitigation plan has been achieved.

2. For the second post-construction monitoring season to be considered successful, the post-construction monitoring report described at (d) below shall provide documentation demonstrating that the standards listed at (b)2i and ii below are satisfied. If the standards at (b)2i and ii listed below are not satisfied, then a remedial action as described at (b) above will be required, and this full growing post-construction monitoring season shall be repeated.

i. Based on the approved water budget prepared in accordance with N.J.A.C. 7:7E-3B.2(a)7, documentation demonstrating that the mitigation site continues to be a wetland;

ii. Documentation demonstrating that the percent coverage of the planted vegetation or targeted hydrophytes as detailed in the approved mitigation plan has been achieved.

3. For the final post-construction monitoring season to be considered successful, the post-construction monitoring report described at (d) below shall provide documentation demonstrating that the standards listed at (b)3i through iv below are satisfied. If one or more of the standards listed below are not satisfied, then a remedial action as described at (b) above will be required, and this full growing post-construction monitoring season shall be repeated.

i. Documentation demonstrating that the approved goals of the wetland mitigation project (including the required buffer area) prepared pursuant to N.J.A.C. 7:7E-3B.2(a) and the permit are satisfied. This documentation shall include information concerning invasive/noxious plant species and the percent coverage of these species on the site;

ii. Based on the approved water budget prepared in accordance with N.J.A.C. 7:7E-3B.2(a)7, documentation demonstrating that the mitigation site is a wetland. The documentation shall include, when appropriate, monitoring well data, stream gauge data, photographs and field observation notes collected throughout the monitoring period;

iii. Documentation demonstrating that the percent coverage of the planted vegetation or targeted hydrophytes as detailed in the approved mitigation plan has been achieved;

iv. A field delineation of the wetlands at the wetland mitigation project site, based on techniques specified in the Federal Manual for Identifying and Delineation Jurisdictional Wetlands (1989) herein incorporated by reference. This manual is available from the Department's Office of Maps and Publications at (609) 777-1038 for a fee; and

v. A plan showing the flagged wetland delineation required at (b)3iv above. The wetland line shall include global positioning system data points.

(c) For intertidal and subtidal shallows mitigation projects, the post-construction monitoring required at (a)2 above shall comply with (c)1 and 2 below. If one or more of the standards listed below are not satisfied, then the post-construction monitoring shall be repeated the following lunar month(s) until all of the standards listed below are satisfied. Failure to meet the standards for a given post-construction monitoring season described at (c)1 or 2 below shall result in a remedial action. The Department, after consultation with the mitigator, shall determine the remedial

actions necessary to correct the unsatisfactory condition. Remediation may include, but not be limited to, regrading of the mitigation site. The mitigator shall submit:

1. As-built plans with soundings demonstrating that the site was graded according to the approved mitigation plans; and
2. Documentation demonstrating that the mitigation site meets the definition of an intertidal subtidal shallow, that is it is permanently or twice daily submerged from the spring high tide to a depth of four feet below mean low water.

(d) The post-construction monitoring reports required at (b) and (c) above shall be submitted to the Department by November 15 of each year and shall include five copies of the following:

1. A USGS quad map showing the location of the mitigation site; a county road map showing the location (including the lot and block) of the mitigation site, of the mitigation site; and a copy of an aerial photograph of the mitigation site. The point(s) of access to the mitigation site must be clearly indicated on all maps;
2. A copy of the permit that required the mitigation;
3. A brief description of the mitigation project;
4. Photographs of the mitigation site with a location map indicating the location and direction of each photograph;
5. For mitigation projects requiring the establishment of a vegetative community, an assessment of the planted vegetation and the species that are naturally colonizing the site. This assessment shall include data sheets from the sampling points which describe the vegetation present, the percent coverage of the vegetation, the results of the analysis of the soil borings and the location of the water table;
6. Based on the approved water budget prepared in accordance with N.J.A.C. 7:7E-3B.2(a)7, documentation demonstrating that the mitigation site is a wetland or intertidal or subtidal shallows. The documentation shall include, as appropriate, monitoring well data, stream gauge data, photographs and/or field observation notes collected throughout the post-construction monitoring period;
7. Documentation, based on field data, that the approved goals of the mitigation project (including the buffer area, for wetland creation, restoration or enhancement only) prepared pursuant to N.J.A.C. 7:7E-3B.2(a), are satisfied;
8. A narrative evaluating the success/failure of the project in accordance with (b) and/or (c) above; and
9. In the event the mitigation monitoring period is a failure in accordance with (b) and/or (c) above, a narrative description of proposed actions that will permanently rectify the problems.