

NOTE: THIS IS A COURTESY COPY OF THIS RULE PROPOSAL. THE OFFICIAL VERSION WILL BE PUBLISHED IN THE OCTOBER 18, 2010 NEW JERSEY REGISTER. SHOULD THERE BE ANY DISCREPANCIES BETWEEN THIS TEXT AND THE OFFICIAL VERSION OF THE PROPOSAL, THE OFFICIAL VERSION WILL GOVERN.

## **ENVIRONMENTAL PROTECTION DAM SAFETY**

### **Dam Safety Standards**

#### **Proposed Readoption without Amendment: N.J.A.C. 7:20**

Authorized By: Bob Martin, Commissioner,  
Department of Environmental Protection

Authority: N.J.S.A. 58:4-1 et seq. and  
N.J.S.A. 13:1 D-1 et seq.

Calendar Reference: See Summary below for explanation of exception to  
calendar requirement.

DEP Docket Number: 07-10-09

Proposal Number: PRN

Submit written comments by (60 days after publication) to :

Gary J. Brower, Esq.  
DEP Docket Number: 07-10-09  
Office of Legal Affairs  
New Jersey Department of Environmental Protection  
401 East State Street, Floor 4  
PO Box 402  
Trenton, NJ 08625-0402

The Department of Environmental Protection (Department) requests that commenters submit comments on disk or CD as well as on paper. Submittals on disk or CD must not be access-restricted (locked or read-only) in order to facilitate use by the Department of the electronically submitted comments. Submission of a disk or CD is not a requirement. The Department prefers Microsoft Word 6.0 or above. Macintosh™ formats should not be used. Each comment should be identified by the applicable N.J.A.C. citation, with the commenter's name and affiliation following the comment.

The proposed readoption without amendments can be viewed or downloaded from the Department's website at <http://www.state.nj.us.dep>.

The agency proposal follows:

### **Summary**

As the Department has provided a 60-day comment period on this notice of proposal, this notice is excepted from the rulemaking calendar requirement pursuant to N.J.A.C. 1:30-3.3(a)5.

Pursuant to N.J.S.A. 52:14B-5.1, the Dam Safety Standards, N.J.A.C. 7:20, were scheduled to expire on September 8, 2010. The Department proposes to readopt the rules without amendment. In accordance with N.J.S.A. 52:14B-5.1c, the expiration date has been extended to March 7, 2011 as a result of the filing this notice of proposal to readopt the rules with amendments with the Office of Administrative Law.

The Dam Safety Standards implement the Safe Dam Act, N.J.S.A. 58:4-1 et seq., and govern the design, construction, inspection, operation, maintenance, modification and repair of dams in New Jersey which raise the water height of a stream by more than five feet. Certain dams in the Pinelands Area are exempt from these rules so long as they do not pose a security or safety concern (see N.J.S.A. 58:4-1). The primary objective of these rules is to ensure the protection of areas below dams from the consequences of their failure. The rules require dams and their appurtenant structures to be inspected and maintained by owners or operators on a regular basis in order to determine if repairs or modifications are necessary to protect life and property.

The Department regulates dams based upon their hazard classification, as identified in N.J.A.C. 7:20-1.8, and their size. Hazard potential is divided into three

classes: Class I, high hazard; Class II, significant hazard; and Class III, low hazard. The hazard classifications are assigned based upon the potential harm to human beings or property in areas downstream of any dam. The hazard classifications dictate the design requirements which applicants must meet: the higher the hazard the more stringent the design criteria. These rules also establish Class IV dams, which are defined as small dams. A permit is not needed for the construction of Class IV dams, but Class IV dams must be designed in accordance with the Dam Safety Standards. Additionally, the rules contain procedures and civil administrative penalties utilized by the Department to take enforcement action under the Safe Dam Act.

### **Social Impact**

The rules proposed for readoption without amendment will have a positive social impact on the people of the State by continuing to protect the public from the consequences of dam failures. The dam safety standards will continue to prevent property damage by requiring dam owners and/or operators to meet specific design criteria and perform periodic dam inspections. The rules proposed for readoption will ensure that proposed and existing dams continue to provide water for drinking and irrigation, flood protection benefits, as well as opportunities for swimming, fishing and boating.

### **Economic Impact**

Dam failures, which result in the loss of water supply, wildlife habitat and recreational facilities, and which can cause considerable flood damage, have a major

negative economic impact on the economy of New Jersey. The resultant costs associated with failure of a single large dam, based on documented past occurrences, could be anticipated to exceed one billion dollars. This figure does not include public costs related to rescue, relief and emergency preparedness nor does it include the value of the loss of human life or the costs associated with lost wages, sales, and production.

Major flood events, such as Tropical Storm Floyd in 1998, the 2000 floods in Sparta Township, the 2004 floods in Burlington County and the April 2007 floods statewide, have resulted in numerous dam failures and millions of dollars of damage to infrastructure, homes and businesses, as well as significant damage to the environment due to sediment release and loss of the impoundment and related habitat.

In order to comply with the rules, dam owners and operators will have to comply with the requirements for a dam permit and operation; submit a design report, construction drawings and specifications; comply with construction quality control requirements; and conduct periodic dam safety inspections, operation and maintenance, and emergency action planning. In order to comply with the rules, dam owners and operators will need to engage the services of professional engineers. It is expected that the costs for performing an inspection for dam owners and operators could range from \$500.00 to \$5,000.00. In addition, depending on the condition of the dam and the dam's level of compliance with the Dam Safety Standards, additional expenses could be incurred. Operation and maintenance costs are ongoing, necessary expenses that the owner and operator must incur if they desire to preserve the impoundment created by the dam. Failure to properly maintain a dam will lead to more costly improvements at a later date. Dams that are not in compliance with the technical design requirements of the Dam

Safety Standards will face the cost of rehabilitation. The cost of rehabilitation varies depending on the size of the dam and the issues of non-compliance that must be addressed. The Department administers a low interest loan program to assist in the cost of rehabilitation of dams. Rehabilitation of a dam to comply with the Dam Safety Standards assist the owner in limiting the liability associated with owning a dam and safeguards the lives and properties located downstream of a dam. The readoption of these rules without amendment does not add any new requirements for dam owners and operators.

The existing rules, as amended in 2008 to implement changes to the Safe Dam Act that provide the Department with the authority to assess civil administrative penalties and issue administrative orders to assure compliance with the operational and maintenance requirements contained in the rules (see 39 N.J.R. 4893(b) and 40 N.J.R. 3715(a)), have had a positive economic impact on the economy of the State by providing a safer environment downstream of dam structures essential for the needs and economic well-being of the State's residents. The rules proposed for readoption will continue this positive economic impact.

### **Environmental Impact**

The rules proposed for readoption will continue to prohibit a dam owner or operator from allowing dam deterioration which could lead to dam failure. The existing rules have had a positive impact by compelling the maintenance of dams which create lakes and reservoirs, therefore preserving existing wetlands, recreation, and fish and wildlife habitat.

Since construction of a new dam may potentially be disruptive to a riverine environment, the Department may require the applicant to submit an Environmental Impact Statement and will consider the environmental impacts in the permit application. The statement or application is carefully reviewed by the staff and additional mitigation is recommended where feasible. In developing the rules proposed for readoption, the Department has balanced the need to protect the public from dam failures while protecting the environment from the negative effects of construction and operation of dam projects.

### **Federal Standards Statement**

Executive Order No. 27 (1994) and N.J.S.A. 52:14B-1 et seq. require State agencies which adopt, readopt or amend State regulations that exceed any Federal standards or requirements to include in the rulemaking document a Federal standards analysis. N.J.A.C. 7:20 is not promulgated under the authority of, or in order to implement, comply with or participate in any program established under Federal law or under a State statute that incorporates or refers to Federal law, Federal standards or Federal requirements. Accordingly, Executive Order No. 27 (1994) and N.J.S.A. 52:14B-1 et seq. do not require a Federal standards analysis.

### **Jobs Impact**

The rules proposed for readoption will have a positive impact on jobs. The rules govern the construction, operation and maintenance of dams. In accordance with the rules, dam owners are required to inspect, maintain and occasionally make repairs to

dams. This activity will result in a number of jobs in the engineering and construction industries.

### **Agriculture Industry Impact**

Pursuant to N.J.S.A. 52:14B-4(a)2, the Department has reviewed the rules proposed for readoption without amendment and has determined that these rules have the potential for positive impact upon the agriculture industry. Certain farm ponds with dams that exist for water supply to agricultural lands are regulated by the Dam Safety Standards. The rules proposed for readoption do not impose any new requirements on dam owners. The readoption of these rules will assure the continued maintenance and proper operation of these dams to protect the lives and property downstream from the dams and to assure the continued existence of the dams and water supply sources.

### **Regulatory Flexibility Analysis**

In accordance with the New Jersey Regulatory Flexibility Act, N.J.S.A. 52:14B-16 et seq., the Department has evaluated the reporting, recordkeeping and other compliance requirements that the rules proposed for readoption would impose on small businesses. The Regulatory Flexibility Act defines the term “small business” as “any business which is resident in this State, independently owned and operated and not dominant in its field, and which employs fewer than 100 full-time employees.”

These rules apply to owners and operators of dams. It is estimated that of the total number of approximately 1,600 dam owners and operators affected by these rules, approximately 50 are "small business" as defined in the New Jersey Regulatory

Flexibility Act. In order to comply with the rules, the small businesses will have to comply with the requirements for a dam permit and operation; submit a design report, construction drawings and specifications; comply with construction quality control requirements; and conduct periodic dam safety inspections, operation and maintenance, and emergency action planning. In order to comply with the rules, the small businesses will likely need to engage the services of professional engineers. It is expected that the costs for performing inspections for small business owners or operators could range from \$500.00 to \$5,000.00.

In developing these rules, the Department has balanced the need to protect the environment, property and life against the economic impact of the rules on owners and operators and has determined that to minimize the impact of the rules on "small business" owners and operators would endanger the public health and safety. Therefore, no exemption from coverage is provided.

### **Smart Growth Impact**

Executive Order No. 4 (2002) requires State agencies that adopt, amend or repeal State regulations to include in the rulemaking document a Smart Growth Impact statement that describes the impact of the proposed rule on the achievement of smart growth and implementation of the State Development and Redevelopment Plan (State Plan). The Department has evaluated this rulemaking to determine the nature and extent of the impact of the rules proposed for re adoption on smart growth and the implementation of the State plan.



Infrastructure development with respect to construction of stormwater management facilities and water supply reservoirs is regulated under land use programs (specifically, freshwater wetlands and flood hazard control). The Dam Safety Standards come into play only after the facilities are approved for construction. Therefore, the rules proposed for re-adoption will not have an impact on implementation of the State Plan or the achievement of smart growth.

### **Housing Affordability Impact**

Pursuant to N.J.S.A. 52:14B-4(a), the Department has evaluated the rules proposed for re-adoption without amendment to determine what, if any, impact they will have on the affordability of housing. The Department has determined that the rules will have no impact on the affordability of housing. The Dam Safety Standards do not implicate land use policies or development and, therefore, do not have any impact on the average cost of housing.

### **Smart Growth Development Impact**

Pursuant to N.J.S.A. 52:14B-4(a), the Department has evaluated the rules proposed for re-adoption without amendment to determine what, if any, impact these rules will have on smart growth development. The Dam Safety Standards only govern voluntary construction of new dam structures and maintenance of existing dams. Rehabilitation of existing dams impacts only the current footprint of that dam. The rules do not limit land owners from building housing downstream from dams, but do require the dam owner to safeguard those properties from the consequences of dam failure.

NOTE: THIS IS A COURTESY COPY OF THIS RULE PROPOSAL. THE OFFICIAL VERSION WILL BE PUBLISHED IN THE OCTOBER 18, 2010 NEW JERSEY REGISTER. SHOULD THERE BE ANY DISCREPANCIES BETWEEN THIS TEXT AND THE OFFICIAL VERSION OF THE PROPOSAL, THE OFFICIAL VERSION WILL GOVERN.

Therefore, the rules do not impact the type or number of housing units, increase or decrease the availability of affordable housing in any manner, or affect new construction within Planning areas 1, 2, or within designated centers, under the State Development and Redevelopment Plan.

**Full text** of the proposed readoption may be found in the New Jersey Administrative Code at N.J.A.C. 7:20.

Based on consultation with staff, I hereby certify that the above statements, including the Federal Standards Statement addressing the requirements of Executive Order 27 (1994) permit the public to understand accurately and plainly the purposes and expected consequences of this proposed readoption. I hereby authorize this proposal.

\_\_\_\_\_  
Date

\_\_\_\_\_  
Bob Martin  
Commissioner

NOTE: THIS IS A COURTESY COPY OF THIS RULE PROPOSAL. THE OFFICIAL VERSION WILL BE PUBLISHED IN THE OCTOBER 18, 2010 NEW JERSEY REGISTER. SHOULD THERE BE ANY DISCREPANCIES BETWEEN THIS TEXT AND THE OFFICIAL VERSION OF THE PROPOSAL, THE OFFICIAL VERSION WILL GOVERN.