

**NATURAL RESOURCES AND ENVIRONMENTAL CONTROL**  
**40-00-00**

**Project Summary Chart**

<b>Project Name</b>	<b>STATE CAPITAL FUNDS</b>					
	<b>FY 2008</b>	<b>FY 2009</b>	<b>FY 2010 Request</b>	<b>FY 2010 Recommended</b>	<b>FY 2011 Request</b>	<b>FY 2012 Request</b>
1. Conservation Cost Share Program	\$ 3,205,000	\$ 3,205,000	\$ 3,205,000	\$ <b>740,000</b>	\$ 7,955,000	\$ 7,955,000
2. Tax/Public Ditches	1,400,000	1,400,000	1,400,000	<b>1,148,700</b>	1,800,000	1,800,000
3. Beach Preservation	5,037,500	2,150,000	2,150,000	<b>2,150,000</b>	8,170,000	3,500,000
4. Dam Emergency Planning	1,000,000		1,000,000		1,000,000	1,000,000
5. Buried Debris Pit Remediation	1,000,000	1,000,000	1,000,000		4,543,000	4,810,000
6. Drainage Project/Surface Water Infrastructure*	2,000,000	1,000,000	1,000,000		6,250,000	6,250,000
7. Clean Water State Grant Match*	1,000,000	1,000,000	1,000,000		1,000,000	1,000,000
8. Rehabilitation of Dams			1,500,000		1,500,000	2,000,000
9. Park Development/Rehabilitation	2,500,000	900,000	2,500,000		10,000,000	10,000,000
10. Minor Capital Improvement and Equipment	600,000	600,000	1,105,600	<b>600,000</b>	1,000,000	1,000,000
11. Planning and Design to Replace the R&R Building L.E.E.D. (Leadership in Energy and Environmental Design)			250,000			
12. Fenwick Island State Park Parking Expansion			136,500		913,500	
13. Milford Mosquito Control Facility Architectural Design/Engineering			250,000		2,500,000	
14. Cape Henlopen Fishing Pier Demolition/Redesign			500,000		13,000,000	
15. Alternative Energy Projects for State Parks			500,000		1,500,000	2,000,000
<b>TOTALS</b>	<b>\$ 17,742,500</b>	<b>\$ 11,255,000</b>	<b>\$ 17,497,100</b>	<b>\$ 4,638,700</b>	<b>\$ 61,131,500</b>	<b>\$ 41,315,000</b>

\*Funds authorized to the Twenty-First Century Fund.

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### 1. Conservation Cost Share Program

#### PROJECT DESCRIPTION

Funding is requested to sustain the Conservation Cost Share program. This program is the State's principal financial support mechanism for the design and installation costs of an assortment of best management practices that will protect human health, natural resources and water supplies by preventing urban and agricultural non-point source pollutants (NPS) from reaching surface and subsurface waters; protect Delaware's farmland soils from excessive erosion; and provide wildlife habitat. The program provides funds as incentives to landowners or users for the benefit of the public. Both urban and agricultural landowners that receive benefits must pay their share of the cost of the practice. Appropriated monies will be used to pay or assist in paying all costs required to locate, design, install and maintain conservation practices and systems. The success of the State's pollution control strategies is dependent on the continued funding of conservation cost-share programs.

Of the total request, \$1,500,000 will be divided equally among the three counties to expand their programs and \$1,705,000 will be directed towards nutrient management efforts statewide.

#### Fiscal Year 2010 Cost Share program targets:

Projects	
Water Quality	\$1,970,500
Erosion and Sediment Control	250,000
Water Management	250,000
Applied Research	145,000
Technical and Administrative Expenses	234,500
Repair of Failed Systems	150,000
Special Projects	205,000
<b>Total</b>	<b>\$3,205,000</b>

#### CAPITAL REQUEST

##### FUNDING

	STATE	FEDERAL	OTHER*
FY 2008	\$3,205,000	\$2,000,000	\$1,100,000
FY 2009	3,205,000	2,000,000	1,100,000
FY 2010	3,205,000	2,000,000	1,100,000
FY 2011	7,955,000	2,000,000	1,100,000
FY 2012	7,955,000	2,000,000	1,100,000
<b>TOTALS</b>	<b>\$25,525,000</b>	<b>\$10,000,000</b>	<b>\$5,500,000</b>

\*Source of Other funds are State Rehabilitation Fund loans and private.

### 2. Tax/Public Ditches

#### PROJECT DESCRIPTION

Funding is requested for the reconstruction of deteriorated drainage channels and related water management projects. Constructing environmentally sensitive projects requires minimizing temporary and permanent disturbances to all natural resources in the project area. Existing and proposed projects are evaluated for water control structures to improve runoff water quality. A portion of these funds are used for the investigation of watershed and drainage information for the completion of water management improvement projects and related construction. The Drainage program will continue to utilize these funds to provide the technical assistance necessary in planning, surveying, engineering, permitting and managing drainage and water management projects throughout the State. This funding also allows the Drainage program to provide technical assistance to over 215 tax ditch organizations, private landowners and public agencies statewide. The cost of technical resources for providing planning, surveying, engineering, permitting and construction inspection have increased significantly. Recent Tax Ditch legislation increases the role the Department has in providing technical assistance to the real estate and land development industries, and supporting the tax ditch organizations.

#### CAPITAL REQUEST

##### FUNDING

	STATE	FEDERAL	OTHER*
FY 2008	\$1,400,000	\$100,000	\$320,000
FY 2009	1,400,000	100,000	320,000
FY 2010	1,400,000	100,000	320,000
FY 2011	1,800,000	100,000	320,000
FY 2012	1,800,000	100,000	320,000
<b>TOTALS</b>	<b>\$7,800,000</b>	<b>\$500,000</b>	<b>\$1,600,000</b>

\*Source of Other funds is local.

### 3. Beach Preservation

#### PROJECT DESCRIPTION

Funding is requested to carry out the State's Beach Preservation program along the Atlantic Ocean coast and Delaware Bay shoreline. Typical work includes beach nourishment, structural erosion control measures, public dune maintenance, and emergency storm repair and

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cleanup. Work is only done on publicly accessible beaches and may involve cost sharing with federal and/or local governments. Under normal conditions it is estimated that the Department will have to replace one-half of the fill initially placed on ocean beaches approximately every three to five years to satisfactorily maintain them until federally cost shared projects are developed, authorized and implemented. The Department is the local sponsor of cost shared studies with the federal government (Corps of Engineers) to develop such projects. Funds requested in Fiscal Years 2010 and 2011 will be used for the non-federal share of the cost for renourishment maintenance projects for Fenwick in Fiscal Year 2010 (\$4.1 million), Rehoboth/Dewey (\$3.4 million), Bethany/South Bethany (\$5.6 million), and Roosevelt/Lewes (\$1.3 million); general dune maintenance; and miscellaneous expenses required to carryout the program. The Corps also includes initial construction of Broadkill as a possible Fiscal Year 2010 project; the non-federal cost is \$4.9 million.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER*
FY 2008	\$5,037,500	\$24,827,000	\$2,286,731
FY 2009	2,150,000	2,150,000	2,423,935
FY 2010	2,150,000	35,580,000	2,569,371
FY 2011	8,170,000	7,200,000	2,723,533
FY 2012	3,500,000	7,200,000	2,886,945
<b>TOTALS</b>	<b>\$21,007,500</b>	<b>\$76,957,000</b>	<b>\$12,890,515</b>

\*Source of Other funds is Public Accommodations Tax.

## 4. Dam Emergency Planning

### PROJECT DESCRIPTION

Funding is requested for the continued development of Dam Emergency Action Plans (EAP). The Delaware Dam Safety Regulations are due to be promulgated in Fiscal Year 2009. The initial funding provided for EAPs in Fiscal Year 2008 is underway for the first 20 dams selected. This consists of an engineering inspection, dam break analysis, inundation map, emergency action plan, and operations and maintenance plan. The EAPs will be performed on publically-owned dams meeting a prioritized need based on the dam inventory and risk analysis.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2008	\$1,000,000	\$0	\$0
FY 2010	1,000,000	0	0
FY 2011	1,000,000	0	0
FY 2012	1,000,000	0	0
<b>TOTALS</b>	<b>\$4,000,000</b>	<b>\$0</b>	<b>\$0</b>

## 5. Buried Debris Pit Remediation

### PROJECT DESCRIPTION

Funding is requested to reduce the current waiting list to one year by 2019, from the current wait time of 9 years.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER*
FY 2008	\$1,000,000	\$0	\$250,000
FY 2009	1,000,000	0	250,000
FY 2010	1,000,000	0	250,000
FY 2011	4,543,000	0	250,000
FY 2012	4,810,000	0	250,000
<b>TOTALS</b>	<b>\$12,353,000</b>	<b>\$0</b>	<b>\$1,250,000</b>

\*Source of Other funds is matching from New Castle County.

## 6. Drainage Project/Surface Water Infrastructure

### PROJECT DESCRIPTION

Funding is requested for small capital improvement projects relating to drainage, water management and surface water infrastructure improvements. Twenty-five percent of this funding will be directed by the Delaware Clean Water Advisory Council for watershed planning and infrastructure projects consistent with the goals and objectives of the Surface Water Task Force recommendations. Funding has been previously authorized under Resource, Conservation and Development.

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### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER*
FY 2008	\$2,000,000	\$0	\$666,666
FY 2009	1,000,000	0	333,334
FY 2010	1,000,000	0	333,334
FY 2011	6,250,000	0	2,083,333
FY 2012	6,250,000	0	2,083,333
<b>TOTALS</b>	<b>\$16,500,000</b>	<b>\$0</b>	<b>\$5,500,000</b>

\*Source of Other funds is match from non-Twenty-First Century funds.

## 7. Clean Water State Grant Match

### PROJECT DESCRIPTION

Funding is requested to provide match to the Clean Water State Revolving Fund capitalization grant. Congress continues to provide federal capitalization funding for the State revolving loan portion of the Clean Water Act. This means additional capitalization grants for the Delaware Water Pollution Control Revolving Fund in the amount of \$5.0 million each year. Each federal grant is required to be matched with 20 percent State funds, for a combined total of \$6.0 million to be used to make low interest loans to wastewater utilities for wastewater facility improvements and expansions.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2008	\$1,000,000	\$5,000,000	\$0
FY 2009	1,000,000	5,000,000	0
FY 2010	1,000,000	5,000,000	0
FY 2011	1,000,000	5,000,000	0
FY 2012	1,000,000	5,000,000	0
<b>TOTALS</b>	<b>\$5,000,000</b>	<b>\$25,000,000</b>	<b>\$0</b>

## 8. Rehabilitation of Dams

### PROJECT DESCRIPTION

Funding is requested for engineering and construction work related to the repair and rehabilitation of dam infrastructure for state-owned dams. The prioritization for determining infrastructure improvements will be based on the dam inventory and risk analysis recently

completed, and the EAP results. As dams are inspected beginning in Fiscal Year 2009, deficiencies will be determined with minor and major maintenance as well as rehabilitation needs for state-owned dams. Some of this funding may be utilized for emergency repairs as a result of any damage to state-owned dams that threaten the health, safety and welfare of Delaware residents.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2010	\$1,500,000	\$0	\$0
FY 2011	1,500,000	0	0
FY 2012	2,000,000	0	0
<b>TOTALS</b>	<b>\$5,000,000</b>	<b>\$0</b>	<b>\$0</b>

## 9. Park Development/Rehabilitation

### PROJECT DESCRIPTION

Funding is requested to rehabilitate the State's park system which currently contains over 450 building in 16 parks. These include a wide range of structures, facilities and exhibits intended for public use, maintenance and administration. Each park also contains utilities and other infrastructure that, in many cases, are in need of major repair and replacement. Funding will be targeted to the following: deferred maintenance and upgrades of buildings; parking and roadway improvements; and utility and infrastructure improvements.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2008	\$2,500,000	\$0	\$0
FY 2009	900,000	0	0
FY 2010	2,500,000	0	0
FY 2011	10,000,000	0	0
FY 2012	10,000,000	0	0
<b>TOTALS</b>	<b>\$25,900,000</b>	<b>\$0</b>	<b>\$0</b>

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### 10. Minor Capital Improvement and Equipment

#### PROJECT DESCRIPTION

Funding is requested for the following equipment:

Office of the Secretary	\$25,000
Furniture and space configuration	
Fish and Wildlife	\$535,500
(2) 4-wheel drive farm tractors	
Upgrade to Ommelanden rifle range	
Little Creek Enforcement pole shed	
(2) marine patrol boats	
Headsets for Special Response Team (SRT)	
Replace (10) service pistols/hardware	
(10) patrol rifles	
ASV Positrac	
MIG/TIG welder	
Parks and Recreation	\$172,000
Sewage pit repairs	
Replace mule with transmission	
Backhoe attachment for Kubota tractor	
Enforcement equipment for Tahoe	
Kubota front-end loader	
Auger attachment for skid loader	
Rubber track for skid loader	
Replace (6) 12-year old defibulators	
EZ GO golf cart	
New display cabinet Indian River Life-Saving Station	
Remote camera in cupola	
Toro 42" zero turn mower	
Engine analyzer for outboard motors	
4 ton diesel dump to pull lift	
New hay wagon	
1997 Gator 4 x 4	
Soil and Water	\$170,000
Harbor Barge/Scow	
Bateau	
Pole Barn	
Georgetown Yard preliminary assessment	
Water Resources	\$72,000
Nutrient analyzer	
Isotemp refrigerator	
6-10 hp boat motor	
Global positioning unit	
Depth finder/color sounder	

Air and Waste Management	\$131,100
Replacement body armor	
(6) 800 MHz portable radios	
Portable emission analyzer systems	
AC units for Grantham lab instruments and computer systems	
Liquid crystal display (LCD) projectors for Lukens and Grantham buildings	
Energy efficiency upgrades to Grantham Lane Building	
Thermal imaging cameras	
Night vision devices	
Vehicle security screens	
Keyless entry system for Penny Lane	

#### CAPITAL REQUEST

##### FUNDING

	STATE	FEDERAL	OTHER
FY 2008	\$600,000	\$0	\$0
FY 2009	600,000	0	0
FY 2010	1,105,600	0	0
FY 2011	1,000,000	0	0
FY 2012	1,000,000	0	0
<b>TOTALS</b>	<b>\$4,305,600</b>	<b>\$0</b>	<b>\$0</b>

### 11. Planning and Design to Replace the R&R Building L.E.E.D. (Leadership in Energy and Environmental Design)

#### PROJECT DESCRIPTION

Funding is requested to commission a study to determine the optimum size and location for a new Department of Natural Resources and Environmental Control (DNREC) facility. This new facility would consolidate operations currently located in the Richardson and Robbins (R&R) building and seven other leased facilities. Due to growth in the Department over the last 20 years, the R&R building is not functionally adequate for the Department's needs. The R&R building is overcrowded with corridors and public spaces being used for offices, work areas and filing.

The Capital Space Study, completed in 2004, recommended a new DNREC building be built as part of a long-term plan to adequately meet space needs of State agencies in the Dover area. The preliminary estimates for the new facility is 160,000 square feet for approximately 600 employees.

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The new building would be designed and built to demonstrate environmental sustainability in construction and cost savings. The building would be certified LEED, a leading edge system for designing, constructing, operating and certifying the world's greenest buildings, at the gold or platinum level. This would require design and construction practices that significantly reduce or eliminate the negative impact of buildings on the environment and occupants in five broad areas: sustainable site planning; safeguarding water and water efficiency; energy efficiency and renewable energy; conservation of materials and resources; and indoor environmental quality.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2010	\$250,000	\$0	\$0
<b>TOTAL</b>	<b>\$250,000</b>	<b>\$0</b>	<b>\$0</b>

## 12. Fenwick Island State Park Parking Expansion

### PROJECT DESCRIPTION

Funding is requested for the redesign of the Fenwick Island State Park parking lot to accommodate more parking, allow for more queuing of cars off the roadways, and allow for express shuttle bus access to the lot for drop-offs and pick-ups without waiting in the queue. It is not uncommon for traffic waiting to enter the park to backup along the shoulder of Route 1 creating a significant public safety hazard. The design would be completed in Fiscal Year 2010 and the Division would seek implementation funding in Fiscal Year 2011.

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2010	\$136,500	\$0	\$0
FY 2011	913,500	0	0
<b>TOTALS</b>	<b>\$1,050,000</b>	<b>\$0</b>	<b>\$0</b>

## 13. Milford Mosquito Control Facility Architectural Design/Engineering

### PROJECT DESCRIPTION

Funding is requested to begin the design and engineering phase for construction of a new facility to serve as the headquarters for Mosquito Control operations in Kent and Sussex counties. The current headquarters are located along the rapidly developing Airport Road in Milford. The estimated cost is based on current conventional construction to include site preparation, office/lab, shop/garage, pesticide storage building, equipment pole sheds with a wash down pad and wastewater containments. It is proposed that the facility would be on property already owned by the State in southern Kent County or northern Sussex County.

### FACILITY DATA

#### PRESENT

Location	Airport Road, Milford
Gross # square feet:	4 acres
Age of Building	48 years
Age of Additions:	Various
Year of Last Renovations:	2003

#### PROPOSED

Location	Milford area
Gross # square feet:	5-100 acres
Estimated time needed to complete project:	2 years
Estimated date of occupancy:	2011

### CAPITAL REQUEST

#### FUNDING

	STATE	FEDERAL	OTHER
FY 2010	\$250,000	\$0	\$0
FY 2011	2,500,000	0	0
<b>TOTALS</b>	<b>\$2,750,000</b>	<b>\$0</b>	<b>\$0</b>

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**14. Cape Henlopen Fishing Pier  
Demolition/Redesign**

**PROJECT DESCRIPTION**

Funding is requested to begin the design and permitting necessary to replace the deteriorated fishing pier at Cape Henlopen State Park. The Division is currently undertaking stop-gap measures to repair some of the deteriorated piling with the assistance of federal Fish and Wildlife funds. This temporary repair is envisioned to provide safe access for fisherman for the next four to eight years at which point adequate funding would be necessary to completely replace this facility and demolish the existing structure.

**CAPITAL REQUEST**

**FUNDING**

	<u>STATE</u>	<u>FEDERAL</u>	<u>OTHER</u>
FY 2010	\$500,000	\$0	\$0
FY 2011	13,000,000	0	0
<b>TOTALS</b>	<b>\$13,500,000</b>	<b>\$0</b>	<b>\$0</b>

**15. Alternative Energy Projects for State  
Parks**

**PROJECT DESCRIPTION**

Funding is requested to plan, design and implement alternative energy projects throughout the State Park system. The initial project would be located at Fort Delaware on Pea Patch Island. Parks is currently engaged in a partnership with the Division of Air and Waste Management to replace existing diesel generators on the island with an ultra-modern photovoltaic to hydrogen gas conversion project and establish a zero emission educational center at Fort Delaware State Park. This project qualifies for up to \$2.5 million in Federal Department of Energy grants as well as \$0.5 million in Delaware Green Energy grants. Both grants need to be matched on a 1:1 basis, and the combined project and State Green Energy grant funds could be used to match the federal grants. The rest of the project would be funded through private donations from technology-based manufacturers. This project would be a national model for integrating cutting edge technology with historical properties located in areas where traditional power supplies are not available.

**CAPITAL REQUEST**

**FUNDING**

	<u>STATE</u>	<u>FEDERAL</u>	<u>OTHER</u>
FY 2010	\$500,000	\$0	\$0
FY 2011	1,500,000	0	0
FY 2012	2,000,000	0	0
<b>TOTALS</b>	<b>\$4,000,000</b>	<b>\$0</b>	<b>\$0</b>

**FISCAL YEAR 2011**

**1. Conservation Cost Share Program**

**\$7,955,000**

*See Project Description for FY 2010.*

**2. Tax/Public Ditches**

**\$1,800,000**

*See Project Description for FY 2010.*

**3. Beach Preservation**

**\$8,170,000**

*See Project Description for FY 2010.*

**4. Dam Emergency Planning**

**\$1,000,000**

*See Project Description for FY 2010.*

**5. Buried Debris Pit Remediation**

**\$4,543,000**

*See Project Description for FY 2010.*

**6. Drainage Project/Surface Water  
Infrastructure**

**\$6,250,000**

*See Project Description for FY 2010.*

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**7. Clean Water State Grant Match**  
**\$1,000,000**

*See Project Description for FY 2010.*

**8. Rehabilitation of Dams**  
**\$1,500,000**

*See Project Description for FY 2010.*

**9. Park Development/Rehabilitation**  
**\$10,000,000**

*See Project Description for FY 2010.*

**10. Minor Capital Improvement and  
Equipment**  
**\$1,000,000**

*See Project Description for FY 2010.*

**11. Fenwick Island State Park Parking  
Expansion**  
**\$913,500**

*See Project Description for FY 2010*

**12. Milford Mosquito Control Facility  
Architectural Design/Engineering**  
**\$2,500,000**

*See Project Description for FY 2010*

**13. Cape Henlopen Fishing Pier  
Demolition/Redesign**  
**\$13,000,000**

*See Project Description for FY 2010.*

**14. Alternative Energy Projects for State  
Parks**  
**\$1,500,000**

*See Project Description for FY 2010.*

**FISCAL YEAR 2012**

**1. Conservation Cost Share Program**  
**\$7,955,000**

*See Project Description for FY 2010.*

**2. Tax/Public Ditches**  
**\$1,800,000**

*See Project Description for FY 2010.*

**3. Beach Preservation**  
**\$3,500,000**

*See Project Description for FY 2010.*

**4. Dam Emergency Planning**  
**\$1,000,000**

*See Project Description for FY 2010*

**5. Buried Debris Pit Remediation**  
**\$4,810,000**

*See Project Description for FY 2010.*

**6. Drainage Project/Surface Water  
Infrastructure**  
**\$6,250,000**

*See Project Description for FY 2010.*

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**7. Clean Water State Grant Match**  
**\$1,000,000**

*See Project Description for FY 2010.*

**8. Rehabilitation of Dams**  
**\$2,000,000**

*See Project Description for FY 2010.*

**9. Park Development/Rehabilitation**  
**\$10,000,000**

*See Project Description for FY 2010.*

**10. Minor Capital Improvement and  
Equipment**  
**\$1,000,000**

*See Project Description for FY 2010.*

**11. Alternative Energy Projects for State  
Parks**  
**\$2,000,000**

*See Project Description for FY 2010.*