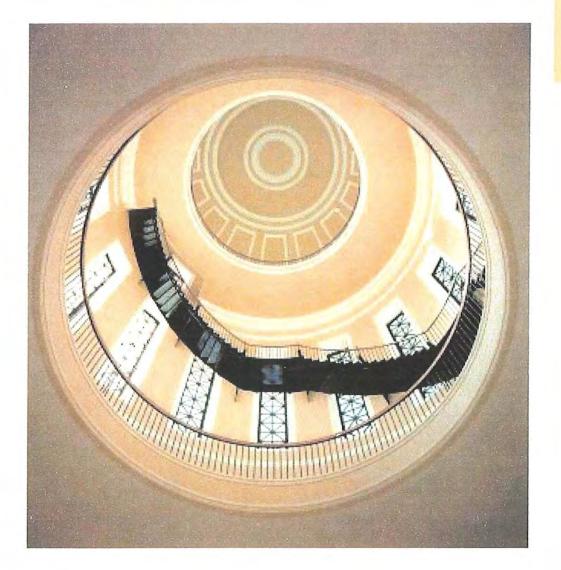


# MAINE STATE HOUSE & GROUNDS

Years 2003 through 2007



## Multi Year Plan For Maintenance & Improvements

Prepared by Richard Burt Architects Damariscotta, Maine

For the Office of the Executive Director of the Legislative Council

May 2003

## 2003 through 2007

## TABLE OF CONTENTS

Introduction	Introduction, Construction Schedule, Pre- Qualified Subcontractors	1
Annual Project A.1	Roofing – EPDM/Copper Inspection	3
Annual Project A.2	Building-Wide Interior Cleaning	4
Project 03.1	Analysis of Exterior Granite, Preparation of Restoration Construction Documents	5
Project 03.2	Copper Pilaster Repair at High Dome	6
Project 03.3	Corner Guards/Elevator Controls	7
Project 03.4	Screening at West Wing Press Corps Cable Connection Box	8
Project 03.5	Hand Truck Deflector at Service Entry	9
Project 03.6	Air Handler Modification at Information Services Mezzanine	10
Project 03.7	Photographic Documentation	11
Project 03.8	West Wing SBS Roofing Replacement with Standing Seam Metal	12
2003 Summary & Budget	Final List of Projects for 2003	13
Annual Project A.1	Roofing – EPDM/Copper Inspection	14
Annual Project A.2	Building-Wide Interior Cleaning	15
Biennial Project	Painting and Cosmetic Upgrade at Public Spaces	16
Phased Project – West Wing (Year #1)	Exterior Granite	17
Project 04.1	Dome Lighting	18
Project 04.2	Granite Retaining Wall – Capstone Mortar Joints & Sealant	19
Project 04.3	Pruning/Landscaping, Irrigation System	20
Project 04.4	East Porch SBS Roofing Replacement with Standing Seam Metal	21
Project 04.5	Granite Repairs at West Entry	22

2003 through 2007

2004 Summary & Budget	Final List of Projects for 2004	23
Annual Project A.1	Roofing – EPDM/Copper Inspection	24
Annual Project A.2	Building-Wide Interior Cleaning	25
Phased Project – North Wing and East Porch (Year 2)	Exterior Granite: Repointing, Granite Cleaning	26
Project 05.1	Repairs at West Wing Entry Stair Railings	27
Project 05.2	Remove South Roof Original Elevator Penthouse	28
Project 05.3	Provide Handicapped Access Ramp to Third Floor East Porch	29
Project 05.4	Replace Glass Blocks at Fourth Floor West Wing Ceiling	30
Project 05.5	Capitol Park Improvements	31
2005 Summary & Budget	Final List of Projects for 2005	32
Annual Project A.1	Roofing – EPDM/Copper Inspection	33
Annual Project A.2	Building-Wide Interior Cleaning	34
Biennial Project	Painting and Cosmetic Upgrade at Public Spaces	35
Phased Project: South Wing (Year 3)	South Wing Exterior Granite	36
Project 06.1	Provide Granite Veneer on West Wing North Rubble Foundation	37
Project 06.2	Improved Pedestrian Access to Northwest Parking Garage	38
2006 Summary & Budget	Final List of Projects for 2006	39
Annual Project A.1	Roofing – EPDM/Copper Inspection	40
Annual Project A.2	Building-Wide Interior Cleaning	41
Project 07.1	Sidewalk and Lighting Enhancement to Legislative South Parking Lots	42
2007 Summary & Budget	Final List of Projects for 2007	43

2003 through 2007

Architect Richard Burt Architects Damariscotta, Maine Construction Manager Granger Northern, Inc. Portland, Maine

### Introduction

With the completion of a four-year full interior facility renovation, the Maine State House stands today in the highest condition of maintenance and repair since its original construction. As the most public structure in Maine, the ceremonial and functional demands placed on the State House as both seat of government and state-of-the-art office building are significant and constant. The recent substantial public investment made in its preservation and restoration is testimony to the importance of the State House to the citizens of Maine. As magnificent as they are, the State House and grounds require ongoing attention to prevent deterioration. In addition, substantial exterior work, deferred until completion of the interior renovations, is essential. Both ongoing maintenance and necessary improvements require a planned approach, for scheduling and cost reasons. This Multi-Year Plan for Maintenance and Improvements is intended to preserve and extend the investment in the State House and provide an overall plan for facility improvement projects. Working with the Office of the Executive director of the Legislative Council, Richard Burt Architects has developed a planning document that describes a series of necessary projects which combine to provide:

- 1. A structured program of annual inspection and maintenance for those components of the building most susceptible to deterioration from intensive public use or from the forces of weathering or aging, and
- 2. A program of continued improvement to the State House, including both improvements to the physical structure with projects such as roofing replacement and exterior granite restoration, improved safety, access, and use by the Legislature, staff, and public with projects such as redesigned parking and pedestrian walks, selected landscaping, and access by the disabled to the east porch.

This planning document includes a chronological organization of projects over a five-year period. Projects have been scheduled in a manner which matches expected project duration with the 5.5 month and 7.5 month "construction window" available between Legislative Sessions.

In selected cases, projects of more significant cost or duration have been phased over a number of years. Phasing has been developed in order to maximize construction efficiency and manage costs by combining projects of a similar nature or which are planned for a similar location within the State House or grounds.

Included with this document are preliminary project budgets, including both construction costs and associated professional services fees. Due to the preliminary nature of planning at this time, budgets included herein are planning level projections. Accordingly, a contingency should be added to the estimates recorded herein. Prior to actual construction, projects will be bid or cost projects recalculated and verified by the Legislature's construction manager.

### **Construction Schedule**

Legislative Session	Year	Construction Period	Duration
121st Session: Jan. '03 thru June '03	1	July 1, '03 – Dec. 15, '03	5.5 mos.
Jan. '04 thru April '04	2	May 1, '04 – Dec. 15, '04	7.5 mos.
122 <sup>nd</sup> Session: Jan. '05 thru June '05	3	July 1, '05 – Dec. 15, '05	5.5 mos.
Jan. '06 thru April '06	4	May 1, '06 – Dec. 15, '06	7.5 mos.
123 <sup>nd</sup> Session: Jan. '07 thru June '07	5	July 1, '07 – Dec. 15, '07	5.5 mos.
Jan. '08 thru April '08	6	May 1, '08 – Dec. 15, '08	7.5 mos.

#### **Pregualified Subcontractors**

The following subcontractors have participated in all prior phases of State House renovations. Working with Granger Northern as construction manager, they will provide for the continuity of construction warranties and familiarity with technical building systems required to complete applicable five-year projects.

Electrical Systems: E.S. Boulos Company, Westbrook, Maine

Mechanical Systems: RaNor, Inc., Jay, Maine

Fire Suppression (Sprinkler) Systems: Sprinkler Systems, Inc., Lewiston, Maine

Roofing Inspections: Independent Roof Services, Inc., Pownal, Maine

Roofing Subcontractor: Hahnel Bros. Company, Lewiston, Maine

Painting Subcontractor: Theodore Logan & Son, Inc., Portland, Maine





#### **Project Schedule**

Construction Documents Complete: June 1, 2003

Construction Schedule Start of Project: July 1, 2003 Duration: one month Complete Project: July 31, 2003

### Annual Allowance

### ANNUAL PROJECT #1 Roofing — EPDM/Copper Inspection

### What Needs To Be Done?

Due to a variety of roof forms, the State House is protected by three types of roofing, i.e., copper at the high and two low domes, EPDM at the north/south low pitched roofs, and SBS (modified bitumen, see project 3.8 and 4.4) at the east/west sloped roofs.

This project involves the regular review and maintenance of all roofing systems. A yearly review of all roofing areas will be completed by a qualified independent roofing consultant. Areas requiring maintenance will be identified. Repairs will be completed by a roofing subcontractor.

#### Why?

A program of regular roofing maintenance is necessary to prevent deterioration and damage to interior areas of the State House. Under this yearly project, potential leak points will be identified and repaired before interior building finish or structural deterioration can occur.

\$ 5,000 (\$1,400 roofing inspection services + \$3,600 repair allowance)





### **Project Schedule**

Construction Documents Scope of Work Description

Construction Schedule Start of Project: October 1, 2003 Duration: two weeks Complete Project: October 15, 2003

## ANNUAL PROJECT #2 Building-Wide Interior Cleaning

## What Needs To Be Done?

This project involves a complete buildingwide cleaning, including all public and staff spaces throughout the State House. Budget options are provided relative to the extent of cleaning to be undertaken.

## Why?

It is the intent of this project that, at the completion of each Legislative Session, a more thorough building-wide cleaning effort be completed than is normally possible during the active Legislative Session.

### Annual Allowance

Public Spaces Only: \$20,000

Public and Office Spaces: \$30,000

Public and Office Spaces and Exterior Window Surfaces: \$45,000





**Project Schedule** 

Construction Documents Complete: not applicable

Project Schedule Start of Analysis Phase: July 1, 2003 Duration: two months Complete Analysis: Sept. 1, 2003

## **Project Budget**

### \$ 56,000

### PROJECT 03.1

Analysis of Exterior Granite, Preparation of Restoration Construction Documents

### What Needs To Be Done?

This project will be completed in preparation for the building-wide exterior granite repointing and cleaning project scheduled for a three-year phased construction sequence commencing in 2004. Starting with a building survey, conditions of the exterior granite will be documented. Levels and types of stone and mortar deterioration, conditions contributing to same (flashing, roof runoff), levels and types of soiling, areas of efflorescence, and status of mortar joints will be documented. Laboratory and field testing of mortar and cleaning methods will be conducted to determine the most appropriate materials and methods to be employed, based on the existing granite characteristics. Finally, the extent of repointing required will be quantified.

### Why?

This study phase is intended to familiarize the design and construction team with the existing conditions of the exterior granite and to determine the most costeffective and appropriate restoration methods and techniques.





### **Project Schedule**

Construction Documents Complete: July 1, 2003

**Construction Schedule** 

Part One

Start of Project: June 1, 2003 Duration: two weeks Complete Project: June 15, 2003

Part Two Start of I

Start of Project: July 1, 2003 Duration: two months Complete Project: Sept. 1, 2003

### **Project Budget**

\$10,000 (Inspection) \$15,000 (Known Conditions) \$35,000 (Possible Additional Repairs)

### PROJECT 03.2 Copper Pilaster Repair at High Dome

### What Needs to be Done?

At the southwest quadrant of the high dome, an existing ornamental (white-painted) copper-faced pilaster has pulled away from the dome proper. Onsite observations have confirmed that water infiltration through fatigued fasteners has rotted a portion of the pilaster's wood- framed structure, resulting in its separation from the main dome. Temporary bracing has been installed in order to stabilize this condition until permanent repairs can be made. This project will complete all necessary repairs to both the structure and copper facing of the pilaster.

### Why?

It is imperative that weather be prevented from entering the exterior State House envelope. If left unattended, continuous water infiltration in the form of liquid, water vapor, or ice will generate significant deterioration throughout the overall building structure. This project is intended to repair an existing known condition and to complete investigations in the general vicinity of same in an effort to uncover and interrupt any other similar deterioration.

### **Project Phasing**

This project will proceed in two phases.

Part One will include additional on-site observations of the pilaster and adjacent similar pilasters in an effort to further document the cause of this failure.

Part Two will include the repairs to the pilaster and any adjacent pilasters, as determined by the Part One observations.





### **Project Schedule**

Construction Documents Complete: Sept. 1, 2003

Construction Schedule Start of Project: Oct. 15, 2003 Duration: one month Complete Project: Nov. 15, 2003

### **Project Budget**

\$ 25,000

### PROJECT 03.3 Corner Guards/Elevator Controls at All Elevators, All Floors

### What Needs to be Done?

In addition to serving as a modern office building, the State House is subjected to the moving of significant heavy materials and pieces of maintenance equipment on a daily basis. Wall damage has occurred at many elevator entrances resulting from this significant transportation. This project is intended to provide metal corner guards in these damage-prone locations. Corner guards are to be brass in order to match the overall State House metal aesthetic.

This project also involves the replacement of existing stainless steel elevator call buttons at the public corridors of the State House. New call button controls will be provided in brass finish.

### Why?

This project will provide significant plaster protection at highly visible and damage-susceptible locations.

The overall aesthetic provided at these State House elevators will be consistent with the brass metal finish throughout the State House.





### **Project Schedule**

Construction Documents Complete: July 1, 2003

Construction Schedule Start of Project: Sept. 1, 2003 Duration: one month Complete Project: Sept. 30, 2003

### **Project Budget**

\$ 2,000

PROJECT 03.4 Screening at West Wing Press Corps Cable Connection Box

### What Needs to be Done?

An important component of the recently completed building-wide State House renovation was the improvement of Press Corps access throughout the facility.

For significant broadcast events, including the State of the State message, Press Corps broadcast trucks are now accommodated at the new West Wing southern approach drive. At the West Wing south exterior wall, a telecommunications patch panel has been provided, thereby allowing easy truck connections to the inner telecommunications facilities of the State House. The intent of this project is to provide a visually appropriate enclosure around the exterior wallmounted Press Corps cable connection box. The panel installation has resulted in an unfinished appearance.

### Why?

A visually appropriate, easily accessible enclosure will be provided at this very visible exterior wall location at the main entrance to the State House. While the patch panel is located for maximum Press Corps access, it coincidentally is also very visible to the general public when approaching the otherwise newly renovated State House. This project will screen this unsightly utilitarian element.



### **Project Schedule**

Construction Documents Complete: July 1, 2003

Construction Schedule Start of Project: Sept. 1, 2003 Duration: two weeks Complete Project: Sept. 15, 2003

### **Project Budget**

### \$ 2,000

### PROJECT 03.5 Hand Truck Deflector at Service Entry

#### What Needs to be Done?

This project will provide for improved door and wall finish protection at the new service door located immediately north of the new lobby information desk, by constructing a deflector in the service entrance area.

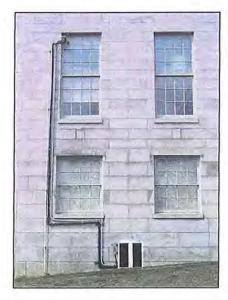
#### Why?

Hand truck deliveries from the newly provided service doors at the north wall of the West Wing pass immediately adjacent to and through the new door located north of the lobby information kiosk. Inadvertent contact with this door leaf creates damage to the door and an unsightly visual distraction at the new lobby entrance. This simple utilitarian deflector will protect the wall and service door from damage. A deflector was present in the service area prior to the renovation project.

2003

5





### **Project Schedule**

Construction Documents Complete: 2001

Construction Schedule Start of Project: July 15, 2003 Duration: two weeks Complete Project: July 30, 2003

**Project Budget** 

\$ 34,000

PROJECT 03.6 Air Handler Modification at Information Services Mezzanine

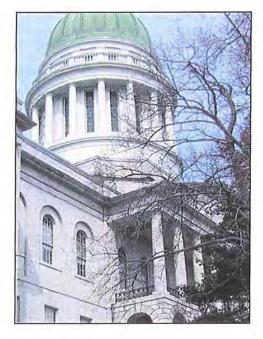
### What Needs to be Done?

In 1998, an exterior pad-mounted condenser was placed at the southeast corner of the State House as a component of a temporary air conditioner system provided for the 2.5 floor south (Information Services) mezzanine. This installation was designed to be temporary in nature until the then-planned renovations of the south wing provided a centralized air conditioning system. This project will augment the recently installed fan coil units at the Information Services mezzanine and provide for the removal of the exterior pad-mounted equipment.

### Why?

With the provision of the new central air conditioning system changeover, this existing exterior pad-mounted equipment and temporary piping can be removed. Improved energy efficiency will result from use of the central system and the overall State House aesthetic will be improved at this very visible exterior corner of the building.





#### **Project Schedule**

Construction Documents Complete: not applicable

Construction Schedule Start of Project: August, 2003 Duration: one week Complete Project: August, 2003

### **Project Budget**

\$ 5,700

### PROJECT 03.7 Photographic Documentation

### What Needs to be Done?

As the most significant State House renovation completed in four generations, this project will provide selected photographic documentation of the recently completed facility. With this project, an architectural photographer will provide documentation at selected areas of the State House. Working with the Executive Director and the Chair of the State House and Capitol Park Commission, appropriate documentation will be provided for both public information and historic documentation purposes.



### **Project Schedule**

Construction Documents Complete: 2001

Construction Schedule Start of Project: July 1, 2003 Duration: four months Complete Project: Nov. 1, 2003

### **Project Budget**

### \$ 380,000

### PROJECT 03.8

West Wing SBS Roofing Replacement with Standing-Seam Metal, Rain Leader Replacement

2003

### What Needs to be Done?

This project involves the removal of the in-place SBS roofing and replacement with standing-seam metal at the sloped West Wing roof. Also included will be the replacement of existing rain leaders (downspouts).

In 1994, the in-place SBS roofing was installed as a temporary repair measure only. This project will involve the removal of same, and the prior roof substrate, and replacement with standing-seam metal roofing. Roofing metal consistent with the character of the State House involving either copper, prepatinated copper, or lead-coated (gray) copper shall be employed.

### Why?

This project will restore the long-term waterproof integrity of the west sloped roofs. Marginally functional rain leader systems will be restored, thereby controlling rain runoff in a manner that will protect the granite building envelope well into the future. In addition, this very prominent roof will be restored, employing a material consistent with the overall architectural integrity and quality of the State House.

2003

## Final List of Projects for 2003

		Budget
Annual Project A.1	Roofing – EPDM/Copper Inspection	5,000
Annual Project A.2	Building-Wide Interior Cleaning	45,000 <sup>1</sup>
Project 03.1	Analysis of Exterior Granite, Preparation of Restoration Construction Documents	56,000
Project 03.2	Copper Pilaster Repair at High Dome Part One Part Two	10,000 15,000²
Project 03.3	Corner Guards/Elevator Controls	25,000
Project 03.4	Screening at West Wing Press Corps Cable Connection Box	2,000
Project 03.5	Hand Truck Deflector at Service Entry	2,000
Project 03.6	Air Handler Modification at Information Services Mezzanine	34,000
Project 03.7	Photographic Documentation	5,700
Project 03.8	West Wing SBS Roofing Replacement with Standing Seam Metal	<u>380,000</u>
	PROJECTS BUDGET	579,700 <sup>3</sup>
	Construction Manager Fee – 6% of Construction Cost (\$472,000)	28,300
	Professional Services Fees	64,000
	TOTAL BUDGET 2003	\$672,000 <sub>1,2</sub>

Cost reduction possible based on work scope selected. See project description.
Possible additional repairs +\$35,000 pending inspection.

3. Includes Project 03.1, Professional Services fee of \$56,000.



2004



### **Project Schedule**

Construction Documents Complete: April 1, 2004

Construction Schedule Start of Project: May 1, 2004 Duration: one month Complete Project: May 31, 2004

### Annual Allowance

## ANNUAL PROJECT #1 Roofing — EPDM/Copper Inspection

### What Needs To Be Done?

Due to a variety of roof forms, the State House is protected by three types of roofing, i.e., copper at the high and two low domes, EPDM at the north/south low pitched roofs, and SBS (modified bitumen, see project 3.8 and 4.4) at the east/west sloped roofs.

This project involves the regular review and maintenance of all roofing systems. A yearly review of all roofing areas will be completed by a qualified independent roofing consultant. Areas requiring maintenance will be identified. Repairs will be completed by a roofing subcontractor.

#### Why?

A program of regular roofing maintenance is necessary to prevent deterioration and damage to interior areas of the State House. Under this yearly project, potential leak points will be identified and repaired before interior building finish or structural deterioration can occur.

\$ 5,000 (\$ 1,400 Roofing Inspection Services + \$3,600 Repair Allowance)





### **Project Schedule**

Construction Documents Scope of Work Descriptions

Construction Schedule Start of Project: Oct. 1, 2004 Duration: two weeks Complete Project: Oct. 15, 2004

### ANNUAL PROJECT #2 Building-Wide Interior Cleaning

### What Needs To Be Done?

This project involves a complete building-wide cleaning, including all public and staff spaces throughout the State House. Budget options are provided relative to the extent of cleaning to be undertaken.

### Why?

It is the intent of this project that, at the completion of each Legislative Session, a more thorough building-wide cleaning effort be completed than is normally possible during the active legislative Session.

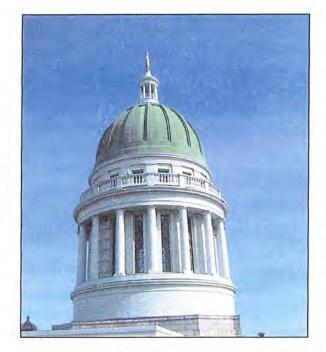
### Annual Allowance

Public Spaces Only: \$20,000

Public and Office Spaces: \$30,000

Public and Office Spaces and Exterior Window Surfaces: \$45,000





### **Project Schedule**

Construction Documents Complete: April 30, 2004

Construction Schedule Start of Project: June 1, 2004 Duration: six weeks Complete Project: July 15, 2004

### **Project Budget**

Plaster repair and preparation allowance: \$40,000 Painting allowance: \$30,000 Total allowance: \$70,000

### BIENNIAL PROJECT Painting & Cosmetic Upgrade at Public Spaces

### What Needs to be Done?

At each even year's session recess, two floors of the State House will be provided with a cosmetic and paint upgrade at all public and major ceremonial spaces.

With this project, a survey of all wall surfaces will be completed and plaster preparation and painting will be provided in all locations requiring maintenance.

Completed in two-floor phases, the result will be a cosmetic upgrade for each floor on a four-year rotating basis.

### Why?

As the state's most important public landmark facility and seat of government, the State House receives sustained and substantial use by the public, staff, and legislators. As a result, significant stress is placed on the appearance of the building, most particularly in the public corridors and major public spaces. This project will provide for regular scheduled maintenance.





### **Project Schedule**

Construction Documents Complete: May 1, 2004

Construction Schedule Start of Project: July 1, 2004 Duration: four months Complete Project: Oct. 31, 2004

### **Project Allowance**

\$ 125,000 (includes scrubbing option)

Cleaning Options: Chemical: \$25,000 High Pressure: \$30,000 Scrub: \$50,000 PHASED PROJECT, WEST WING Exterior Granite: Repointing, Granite Cleaning

## What Needs To Be Done?

This project will focus on the preservation and longterm maintenance of the exterior granite walls (envelope) of the State House. Repointing of the State House has not been done for more than 25 years.

The work of with this project includes repointing (new mortar) at selected locations, sealant replacement at granite/trim interface, and cleaning of exterior granite.

This project will be phased over three years due to the difficulty of providing concentrated building access and the abbreviated duration of the project timeframe.

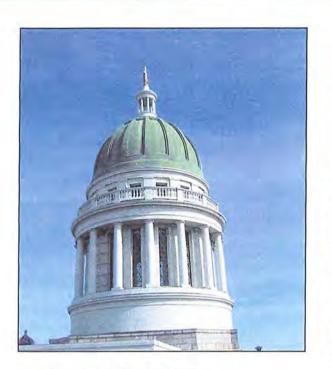
## Why?

Although the building is massive in appearance and structurally impenetrable, it is case that even small amounts of water infiltration into the exterior granite walls of the State House will cause significant long-term damage and structural deterioration.

By observation, there are a numerous locations where existing mortar has cracked or fallen from the walls. In addition, a number of building leaks have occurred due to wind-driven rain infiltration at high granite/roof/cornice intersections.

This project will restore the integrity of the State House exterior granite walls. Wind-driven rain will be interrupted and controlled in a manner that will protect the envelope well into the future.

This project will also provide for clean exterior granite walls for the first time in more than 50 years.



#### **Project Schedule**

Construction Documents Complete: May 1, 2004

Construction Schedule Start of Project: Sept. 1, 2004 Duration: one month Complete Project: Oct. 1, 2004

### **Project Budget**

\$ 45,000

### PROJECT 04.1 Dome Lighting

## What Needs to be Done?

In 1996, a significant dome relighting design and installation project was completed. At that time, exterior columns, interior high dome and top of dome cupola lighting was installed. It was planned that an eventual completion of the dome lighting project would provide exterior high copper dome lighting.

This project will complete the dome lighting project begun in 1996. With this project, distant template cut fixtures will be installed. These fixtures will provide for lighting directly on the profile of the green copper dome. No night-sky lighting will occur.

### Why?

With implementation of this project, the overall dome lighting project will be complete. The existing high cupola and lower dome column lighting will be joined by the properly lit green copper dome.

2004



### **Project Schedule**

Construction Documents Complete: May 1, 2004

Construction Schedule Start of Project: June 1, 2004 Duration: six weeks Complete Project: July 15, 2004

### Project Budget

\$ 25,000

### PROJECT 04.2 Granite Retaining Wall — Capstone Mortar Joints and Sealant

### What Needs to be Done?

In 1993, the exterior State House perimeter granite retaining wall was reconstructed. With that project, a significant effort was made to provide historically accurate wall stone and granite capstone detailing. Included with that detailing was the provision of grout joints at the majority of capstone locations. Sealant (soft) joints were provided at selected locations in an effort to accommodate the anticipated thermal movement of the capstones.

Subsequent field observations have determined that the effort to maintain historically appropriate detailing has resulted in thermal cracking at several capstone joints.

This project will provide for the removal of capstone grout joints and replacement with mortar. Sealant joints will also be replaced as they have reached their useful lifespan.

### Why?

Replacement of hairline cracked mortar joints is necessary in order to prevent water infiltration into the wall system that can damage the wall. In addition, selected sealant joints on a calculated spacing need to be provided in order to accommodate granite thermal movement. At the completion of this project, overall water repellant integrity will be restored at the granite retaining wall, thus preventing wall deterioration.



### **Project Schedule**

Construction Documents Complete: May 1, 2004

Construction Schedule Start of Project: Sept. 1, 2004 Duration: one month Complete Project: Sept. 30, 2004

### **Project Budget**

### \$ 90,000

Maintenance, pruning, and new plantings \$25,000 Irrigation, Phase 1 \$30,000 Irrigation, Phase 2 \$35,000

### PROJECT 04.3 State House Landscaping and Maintenance, Irrigation System

## What Needs to be Done?

This project is intended to provide much needed maintenance and pruning of the existing State House landscaping. In addition, selected plantings shall be provided in a manner consistent with the building's stature as the Maine State House, and the recommendations of the State House and Capitol Park Commission. Damaged or diseased trees will be repaired or replaced. An automatic lawn irrigation system will be provided.

### Why?

Maintenance and pruning is required in order to maintain the long-term health and durability of the vegetative stock. Improved landscape planting will be provided in a manner consistent with the State House stature as a significant public building. Lawn irrigation will provide for sustained lawn growth and uniform appearance.

Irrigation System Phases:

Phase 1 – 2004 east and south State House lawns

Phase 2 – 2005 west and north State House lawns and skylight island at west

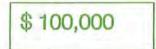


#### **Project Schedule**

Construction Documents Complete: 2001

Construction Schedule Start of Project: June 1, 2004 Duration: four months Complete Project: Oct. 1, 2004

### **Project Budget**



#### PROJECT 04.4

East Porch SBS Roofing Replacement with Standing-Seam Metal, Rain Leader Replacement

2004

### What Needs to be Done?

This project involves the removal of the in-place SBS roofing and replacement with standing-seam metal at the sloped East Porch roof. Also included will be the replacement of existing rain leaders (down spouts).

In 1994, the in-place SBS roofing was installed as a temporary repair measure only. This project will involve the removal of same, and the prior roof substrate, and replacement with standing-seam metal roofing. Roofing metal consistent with the character of the State House involving either copper, prepatinated copper, or lead-coated (gray) copper shall be employed.

## Why?

This project will restore the long-term waterproof integrity of the east porch sloped roof. Marginally functional rain leader systems will be restored, thereby controlling rain runoff in a manner that will protect the granite building envelope well into the future. In addition, this very prominent roof will be restored, employing a material consistent with the overall architectural integrity and quality of the State House.



### **Project Schedule**

Construction Documents Complete: May 1, 2004

Construction Schedule Start of Project: Sept. 1, 2004 Duration: two months Complete Project:

Oct. 31, 2004

### **Project Allowance**

\$ 40,000

### PROJECT 04.5 Granite Repairs at West Entry

### What Needs to be Done?

This project will provide repairs to the exterior building granite damaged during the recent building renovations. Although protected to the maximum extent possible, some degree of exterior granite cracks developed during the shoring operations necessary for Connector construction at the West Wing. During that construction phase, four-foot deep steel trusses were inserted through the existing exterior window openings for the purpose of providing shoring support to the State House while construction proceeded beneath same. Although significant care was taken, the force generated by the 97,000-lb jacking lift resulted in some cracked conditions at the shoring points. This project will provide repairs to these cracks visible to the general public.

#### Why?

In addition to restoring the building weatherproof envelope integrity at these construction-related cracks, these repairs will also restore the granite appearance at the new public entrance to the State House.

#### Additional Note:

This project will be completed concurrently with the west wing exterior granite repointing et al as described under "Phased Project, Year 1."

2004

## Final List of Projects for 2004

		Budget
Annual Project A.1	Roofing – EPDM/Copper Inspection	5,000
Annual Project A.2	Building-Wide Interior Cleaning	45,000 <sup>1</sup>
Biennial Project	Painting and Cosmetic Upgrade at Public Spaces	70,000
Phased Project – West Wing (Year #1)	Exterior Granite	125,000 <sup>1</sup>
Project 04.1	Dome Lighting	45,000
Project 04.2	Granite Retaining Wall – Capstone Mortar Joints & Sealant	25,000
Project 04.3	Landscaping, Irrigation System	55,000 <sup>2</sup>
Project 04.4	East Porch SBS Roofing Replacement with Standing Seam Metal	100,000
Project 04.5	Granite Repairs	40,000
	PROJECTS BUDGET	\$510,000
	Construction Manager Fee 6% of Construction Cost (\$464,000)	\$28,000
	Professional Services Fees	_\$45,000
	TOTAL BUDGET	\$583,000 <sub>1,2</sub>

1. Cost reduction possible based on work scope selected. See project description.

2. Includes Phase 1 irrigation only. See 2005 for Phase 2.





### **Project Schedule**

Construction Documents Complete: April 1, 2005

Construction Schedule Start of Project: May 1, 2005 Duration: one month Complete Project: May 31, 2005

### Annual Allowance

## ANNUAL PROJECT #1 Roofing — EPDM/Copper Inspection

### What Needs To Be Done?

Due to a variety of roof forms, the State House is protected by three types of roofing, i.e., copper at the high and two low domes, EPDM at the north/south low pitched roofs, and SBS (modified bitumen, see project 4.4) at the east/west sloped roofs.

This project involves the regular review and maintenance of all roofing systems. A yearly review of all roofing areas will be completed by a qualified independent roofing consultant. Areas requiring maintenance will be identified. Repairs will be completed by a roofing subcontractor.

### Why?

A program of regular roofing maintenance is necessary to prevent deterioration and damage to interior areas of the State House. Under this yearly project, potential leak points will be identified and repaired before interior building finish or structural deterioration can occur.

\$ 5,000 (\$1,400 Roofing Inspection Services + \$ 3,600 Repair Allowance)

Annual A.2

2005



## **Project Schedule**

Construction Documents Scope of Work Description

Construction Schedule Start of Project: Oct. 1, 2005 Duration: two weeks Complete Project: Oct. 15, 2005

## ANNUAL PROJECT #2 Building-Wide Interior Cleaning

## What Needs To Be Done?

This project involves a complete building-wide cleaning, including all public and staff spaces throughout the State House. Budget options are provided relative to the extent of cleaning to be undertaken.

## Why?

It is the intent of this project that, at the completion of each Legislative Session, a more thorough building-wide cleaning effort be completed than is normally possible during the active legislative session.

### **Annual Allowance**

Public Spaces Only: \$20,000

Public and Office Spaces: \$30,000

Public and Office Spaces and Exterior Window Surfaces: \$45,000





### **Project Schedule**

Construction Documents Complete: May 1, 2004

Construction Schedule Stari of Project: July 1, 2005 Duration: four months Complete Project: Oct. 31, 2005

### **Project Allowance**

\$ 200,000 (includes scrubbing option)

Cleaning options: Chemical: \$40,000 High pressure: \$48,000 Scrub: \$80,000 PHASED PROJECT, NORTH WING & EAST PORCH Exterior Granite: Repointing, Granite Cleaning

## What Needs To Be Done?

This project will focus on the preservation and longterm maintenance of the exterior granite walls (envelope) of the State House.

The work of with this project includes repointing (new mortar) at selected locations, sealant replacement at granite/trim interface, and cleaning of exterior granite.

This project will be phased over three years due to the difficulty of providing concentrated building access and the abbreviated duration of the construction timeframe.

## Why?

Although massive in appearance, it is case that even small amounts of water infiltration into the exterior granite walls of the State House will cause significant long-term damage and structural deterioration.

By observation, there are a number of locations where existing mortar has cracked or fallen from the walls. In addition, a number of building leaks have occurred due to wind-driven rain infiltration at high granite/roof/cornice intersections.

This project is intended to restore the integrity of the State House exterior granite walls. Wind-driven rain will be interrupted and controlled in a manner that will protect the envelope well into the future.

This project will also provide for clean exterior granite walls for the first time in recent memory.



### **Project Schedule**

### PROJECT 05.1 Repairs at West Wing Entry Stair Railings

2005

## What Needs to be Done?

The historic railings at the West Wing exterior stair demonstrate significant deterioration. This project is intended to provide repairs and metal stabilization as required at these railing systems.

## Why?

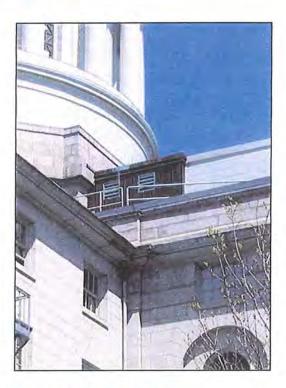
Continued deterioration of the existing railing systems will result in an unsafe condition. Reliance by the public on the structural integrity of the railing system mandates that it have appropriate structural integrity.

Construction Documents Complete: May 1, 2005

Construction Schedule Start of Project: Aug. 1, 2005 Duration: two weeks Complete Project: Aug. 15, 2005

### **Project Budget**





### **Project Schedule**

Construction Documents Complete: May 1, 2005

Construction Schedule Start of Project: July 1, 2005 Duration: three months Complete Project: Oct. 1, 2005

### **Project Budget**



### PROJECT 05.2 Remove South Roof Original Elevator Penthouse on South Roof

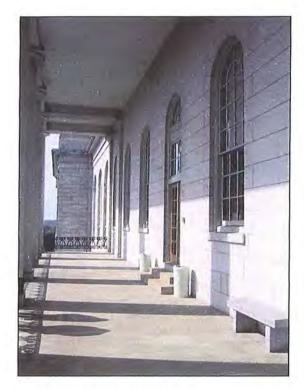
### What Needs to be Done?

Originally intended for demolition during the summer 1999 renovations, the existing elevator penthouse remaining at the roof immediately south of the high dome was left in place due to construction schedule conflicts. The new mechanical penthouse constructed with the 1999 renovations was designed to incorporate all new elevator equipment provided at that time. In order to maintain full and uninterrupted operation of the elevator, the equipment changeover was not be completed during that original renovation. Accordingly, this project will complete that renovation's original intent.

### Why?

Removal of this existing penthouse will provide a safer and improved access to the new mechanical penthouse, restore the visual integrity of the south roof area, and contribute





### **Project Schedule**

Construction Documents Complete: May 1, 2005

Construction Schedule Start of Project: July 1, 2005 Duration: three months Complete Project: Oct. 1, 2005

### **Project Allowance**



## PROJECT 05.3 Provide Handicapped Access Ramp to Third Floor East Porch

### What Needs to be Done?

This project will provide full accommodation and access to the public third floor east porch of the State House. An important component of the State House renovation has been the provision for full handicapped accessibility throughout the facility. The third floor east porch is an important public gathering place for legislators, staff, and the general public.

In addition to stair and ramp access, the existing guardrail system at the perimeter of this elevated porch must be extended in height in order to safeguard the general public. This guardrail extension has been specifically requested by local Codes Enforcement Officers. All work will be completed in consultation with the State House and Capitol Park Commission.

## Why?

Completion of this project will make the third floor porch accessible to those individuals in wheelchairs.





### PROJECT 05.4 Replace Selected Glass Blocks at Fourth Floor West Wing Ceiling

### What Needs to be Done?

This project replaces selected broken glass block panels located at the fourth floor West Wing ceiling.

While this project was originally anticipated for completion during the State House 2000 renovations, completion of this component of the renovation was postponed due to construction schedule implications.

### Why?

### **Project Schedule**

Construction Documents Complete: 2000

Construction Schedule Start of Project: June 1, 2005 Duration: two weeks Complete Project: June 15, 2005

### **Project Budget**



Replacing the broken glass blocks will restore the visual and structural integrity of this architectural element, and prevent potential injury.



**Project Schedule** 

Construction Documents Complete: May 1, 2005

Construction Schedule Start of Project: July 1, 2005 Duration: one month Complete Project: Aug. 1, 2005

### **Project Budget**

## \$ 70,000

### PROJECT 05.5 Capitol Park Improvement

### What Needs to be Done?

This project implements the recommendations of the State House and Capitol Park Commission to establish a Living Memorial to the Victims and Heroes of the September 11, 2001 terrorist attacks. Leaning columns will also be reset.

## Why?

The granite piers and curb at the park entrance have been seriously affected by freeze-thaw cycles and, as a result, are tilted and out of alignment. The park access stairs were never finished and are incomplete at the bottom.

2005

## Final List of Projects for 2005

Annual Project A.1	Roofing – EPDM/Copper Inspection	Budget
Annual Project A.1	Kooning – Er DM/Copper Inspection	5,000
Annual Project A.2	Building-Wide Interior Cleaning	45,000 <sup>1</sup>
Phased Project – North Wing and East Porch (Year 2)	Exterior Granite: Repointing, Granite Cleaning	200,000 <sup>1</sup>
Project 05.1	Repairs at West Wing Entry Stair Railings	9,000
Project 05.2	Remove South Roof Original Elevator Penthouse	145,000
Project 05.3	Provide Handicapped Access Ramp to Third Floor East Porch	95,000
Project 05.4	Replace Selected Glass Blocks at Fourth Floor West Wing Ceiling	3,000
Project 05.5	Capitol Park Improvements	70,000
Project 04.3	Phase 2 Irrigation (continuation)	35,000
	PROJECTS BUDGET	\$607,000 <sup>1</sup>
	Construction Manager Fee 6% of Construction Cost (\$560,600)	\$33,600
	Professional Services Fees	\$54,000
	TOTAL BUDGET	\$694,600 <sup>1</sup>

1. Cost reduction possible based on work scope selected. See project description.





#### **Project Schedule**

Construction Documents Complete: April 1, 2006

Construction Schedule Start of Project: May 1, 2006 Duration: one month Complete Project: May 31, 2006

### Project Budget

### ANNUAL PROJECT #1 Roofing — EPDM/Copper Inspection

### What Needs To Be Done?

Due to a variety of roof forms, the State House is protected by three types of roofing, i.e., copper at the high and two low domes, EPDM at the north/south low pitched roofs, and SBS (modified bitumen, see project 4.4) at the east/west sloped roofs.

This project involves the regular review and maintenance of all roofing systems. A yearly review of all roofing areas will be completed by a qualified independent roofing consultant. Areas requiring maintenance will be identified. Repairs will be completed by a roofing subcontractor.

#### Why?

A program of regular roofing maintenance is necessary to prevent deterioration and damage to interior areas of the State House. Under this yearly project, potential leak points will be identified and repaired before interior building finish and/or structural deterioration can occur.

\$ 5,000 (\$1,400 Roofing Inspection Services + \$3,600 Repair Allowance)





### **Project Schedule**

Construction Documents Scope of Work Description

Construction Schedule Start of Project: Oct. 1, 2006 Duration: two weeks Complete Project: Oct. 15, 2006

### ANNUAL PROJECT #2 Building-Wide Interior Cleaning

### What Needs To Be Done?

This project involves a complete building-wide cleaning, including all public and staff spaces throughout the State House. Budget options are provided relative to the extent of cleaning to be undertaken.

### Why?

It is the intent of this project that, at the completion of each Legislative Session, a more thorough building-wide cleaning effort be completed than is normally possible during the active legislative session.

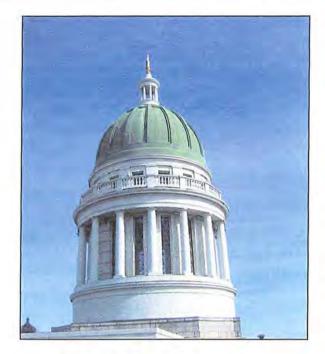
#### Annual Allowance

Public Spaces Only: \$20,000

Public and Office Spaces: \$30,000

Public and Office Spaces and Exterior Window Surfaces: \$45,000





### **Project Schedule**

Construction Documents Complete: April 30, 2006

Construction Schedule Start of Project: June 1, 2006 Duration: six weeks Complete Project: July 15, 2006

### **Project Budget**

Plaster repair and preparation allowance: \$40,000 Painting allowance: \$30,000 Total allowance: \$70,000

### BIENNIAL PROJECT Painting & Cosmetic Upgrade of Public Spaces

## What Needs to be Done?

At each even year's session recess, two floors of the State House will be provided with a cosmetic and paint upgrade at all public and major ceremonial spaces.

With this project, a survey of all wall and ceiling surfaces will be completed and plaster preparation and painting will be provided in all locations requiring maintenance.

Completed in two-floor phases, the result will be a cosmetic upgrade for each floor on a four-year rotating basis.

### Why?

As the state's most important public landmark facility and seat of government, the State House receives sustained and substantial use by the public, staff, and legislators. As a result, significant stress is placed on the appearance of the building, most particularly in the public corridors and major public spaces. This project will provide for regular scheduled maintenance.





**Project Schedule** 

Construction Documents Complete: May 1, 2004

Construction Schedule Start of Project: July 1, 2006 Duration: four months Complete Project: Oct. 31, 2006

### **Project Allowance**

\$ 160,000 (includes scrubbing option)

Cleaning Options: Chemical: \$33,000 High pressure: \$40,000 Scrub: \$65,000

## PHASED PROJECT, SOUTH WING Exterior Granite: Repointing, Granite Cleaning

## What Needs To Be Done?

This project will focus on the preservation and longterm maintenance of the exterior granite walls (envelope) of the State House.

The work of with this project includes repointing (new mortar) at selected locations, sealant replacement at granite/trim interface, and cleaning of exterior granite.

This project will be phased over three years due to the difficulty of providing concentrated building access and the abbreviated duration of the construction timeframe.

## Why?

Although massive in appearance, it is case that even small amounts of water infiltration into the exterior granite walls of the State House will cause significant long-term damage and structural deterioration.

By observation, there are a number of locations where existing mortar has cracked or fallen from the walls. In addition, a number of building leaks have occurred due to wind-driven rain infiltration at high granite/roof/cornice intersections.

This project is intended to restore the integrity of the State House exterior granite walls. Wind-driven rain will be interrupted and controlled in a manner that will protect the envelope well into the future.

This project will also provide for clean exterior granite walls for the first time in recent memory.





### **Project Schedule**

Construction Documents Complete with Completion of Part One

Construction Schedule Start of Project: May 15, 2006 Duration: five months Complete Project:

Oct. 30, 2006

Project Budget

\$ 25,000 (Part One) \$ 50,000 (Part Two)

### PROJECT 06.1 Provide Granite Veneer on West Wing North Rubble Foundation

#### What Needs to be Done?

This project addresses the inconsistent and unsightly visual appearance provided by the remaining rubble foundation visible at the West Wing north wall.

With this project, granite veneer will be installed at this portion of the State House. Originally intended for complete removal and new granite replacement during the State House 2000 renovations, the extent of building shoring required in order to install the granite as originally detailed was determined to significantly impact project completion schedules. Accordingly, this portion of exterior granite renovations was postponed.

Construction detailing for this new veneer has been modified and shoring requirements have been eliminated.

### Why?

This project will remove the unsightly concrete covered rubble foundation existing at this important public entry to the State House and give the wall base near the main entrance a finished appearance. In addition, the provision of exterior granite will provide a more complete and durable barrier to water infiltration at this north exposed location.

Part One – Site Excavation (three weeks duration) Excavate to reveal existing conditions and establish granite support. Backfill and stabilize. Order granite based on conditions encountered. (12-week lead time) Part Two – Install New Granite Excavate for installation of concrete and granite. Install granite.

Complete installation of backfill and pavement.

- 37 -





### **Project Schedule**

Construction Documents Complete: March 1, 2006

Construction Schedule Start of Project: May 1, 2006 Duration: two months Complete Project: July 1, 2006

### **Project Allowance**

\$75,000

#### PROJECT 06.2

Improved Pedestrian Access from Main Entrance to Northwest Parking Garage and Capitol Street

### What Needs to be Done?

This project is intended to provide an improved and easier access route from the new State House entry to the public parking garage located north of the State Office Building.

As currently exists, the excessively steep sidewalk and handrail system is a significant safety hazard for pedestrians, particularly during inclement weather.

This project would provide a combination of sidewalk, stair, and new lighting systems, which would eliminate excessive slope and greatly improve public access and safety en route to the main entrance of the State House.

### Why?

This project will eliminate current safety hazards due to the steepness and unevenness of the slope of the sidewalk to Capitol Street.

#### Note:

The project allowance assumes stairs, stair checkwalls, and pavers will be of concrete construction. Existing exterior stairs at the State house are of granite.

2006

## Final List of Projects for 2006

Annual Project A.1	Roofing – EPDM/Copper Inspection	5,000
		0,
Annual Project A.2	Building-Wide Interior Cleaning	45,000 <sup>1</sup>
Biennial Project	Painting and Cosmetic Upgrade at Public Spaces	70,000
Phased Project: South Wing (Year 3)	South Wing Exterior Granite	160,000 <sup>1</sup>
Project 06.1	Provide Granite Veneer on West Wing North Rubble Foundation	75,000
Project 06.2	Improved Pedestrian Access to	
	Northwest Parking Garage	
	PROJECTS TOTAL	\$430,000
	Construction Manager Fee 6% of	
	Construction Cost (\$383,600)	\$23,000
	Professional Services Fees	_\$35,200
	TOTAL BUDGET	\$488,200 <sup>1</sup>

1. Cost reduction possible based on work scope selected. See project description.





### **Project Schedule**

Construction Documents Complete: April 1, 2007

Construction Schedule Start of Project: May 1, 2007 Duration: one month Complete Project: May 31, 2007

#### Project Budget

#### \$ 5,000

(\$1,400 Roofing Inspection Services + \$3,600 Repair Allowance)

### ANNUAL PROJECT #1 Roofing — EPDM/Copper Inspection

### What Needs To Be Done?

Due to a variety of roof forms, the State House is protected by three types of roofing, i.e., copper at the high and two low domes, EPDM at the north/south low pitched roofs, and SBS (modified bitumen, see project 4.4) at the east/west sloped roofs.

This project involves the regular review and maintenance of all roofing systems. A yearly review of all roofing areas will be completed by a qualified independent roofing consultant. Areas requiring maintenance will be identified. Repairs will be completed by a roofing subcontractor.

#### Why?

A program of regular roofing maintenance is necessary to prevent deterioration and damage to interior areas of the State House. Under this yearly project, potential leak points will be identified and repaired before interior building finish or structural deterioration can occur.





**Project Schedule** 

Construction Documents Scope of Work Description

Construction Schedule Start of Project: Oct. 1, 2007 Duration: two weeks Complete Project: Oct. 15, 2007 ANNUAL PROJECT #2 Building-Wide Interior Cleaning

### What Needs To Be Done?

This project involves a complete building-wide cleaning, including all public and staff spaces throughout the State House. Budget options are provided relative to the extent of cleaning to be undertaken.

#### Why?

It is the intent of this project that, at the completion of each Legislative Session, a more thorough building-wide cleaning effort be completed than is normally possible during the active legislative session.

#### Annual Allowance

Public Spaces Only: \$20,000

Public and Office Spaces: \$30,000

Public and Office Spaces and Exterior Window Surfaces: \$45,000



### **Project Schedule**

Construction Documents Complete: May 1, 2007

Construction Schedule Start of Project: Jul. 1, 2007 Duration: two months Complete Project: Sept. 1, 2007

**Project Allowance** 

\$ 140,000

### PROJECT 07.1

Sidewalk and Lighting Enhancement to Legislative South Parking Lots

#### What Needs to be Done?

This project is intended to provide improved and safe pedestrian access to and from the State House south parking lot. With this project, pedestrian access through vehicular traffic will be minimized or eliminated. In addition, appropriate lighting will be provided in order to assure safe access to and from parking lots during all operating hours.

#### Why?

Currently, no sidewalk exists from the heavily used legislative parking lots to either the State House or the Cross Building. Pedestrians, including legislators, are forced to walk in the roadway. Line of sight in the roadway is inadequate to properly observe pedestrians in the road. Improved pedestrian safety is the overall goal of this project.

## Final List of Projects for 2007

		budger.
Annual Project A.1	Roofing – EPDM/Copper Inspection	5,000
Annual Project A.2	Building-Wide Interior Cleaning	45,0001
Project 07.1	Sidewalk and Lighting Enhancement to Legislative South Parking Lots	
	PROJECTS TOTAL	\$190,000
	Construction Manager Fee 6% of Construction Cost (\$143,600)	\$8,600
	Professional Services Fees	\$21,300
	TOTAL BUDGET	\$219,900 <sup>1</sup>

1. Cost reduction possible based on work scope selected. See project description.

Dudant