SECTION 09 20 99

RESTORATION OF DECORATIVE PLASTER CEILING AND WALL SURFACES

PART 1 – GENERAL – For additional information, refer to Volume II, Section C, Historic Guidelines and Criteria

1.01 DESCRIPTION

- A. This Section describes the requirements for restoration of decorative plaster ceiling and wall surfaces, including the following:
 - 1. Grand Lobby Loggia and Corridors 102, 201, 202 and Historic Stairs 5, 6, 7, 8 and 9:
 - a. Groin Vaulted Plaster Ceilings:
 - 1) Encapsulate lead based paint as required.
 - 2) Repair water damaged plaster. Remove loose plaster, replace plaster as required and repaint the ceiling as specified in Section 09 91 00.
 - 3) Repair damage to plaster edge molding as required.
 - 4) Repair edge stenciling. Repair will consist of cleaning and infill painting where required by a specialty paint finish contractor.
 - 2. Elevator Lobbies Floors 3 through 8 Rooms 301, 401, 501, 601, 701 and 801:
 - a. Utilize existing mold of plaster cove made by the Soft Demolition Contractor prior to removal of the existing plaster cove.
 - b. Replace existing plaster walls, ceiling and cove molding with new plaster finishes as required to match the original plaster finish.
 - 3. Historic Courtroom Room 816 and Jury Room 819:
 - a. Repair existing plaster walls and ceilings, cast plaster brackets and plaster cove moldings as required.

1.02 SUBMITTALS

- A. Product Data: Manufacturer's technical data for each product to be used, including recommendations for application and use.
- B. Samples: Furnish the following for verification purposes prior to mock-up erection:
 - 1. Patching material for repairing damaged plaster.

1.03 QUALITY ASSURANCE

- A. Restoration Specialist: Firm having minimum 5-years experience in comparable historic restoration Projects, employing personnel skilled in the restoration and operations specified.
- B. Field Constructed Mock-Up: Prior to start of work, prepare a mock-up of plaster repair where directed by the County's Representative. Obtain County's Representative's approval of visual qualities before proceeding with the work.

1.04 DELIVERY, STORAGE AND HANDLING

- A. Deliver materials in manufacturer's original and unopened containers and packaging, bearing labels indicating type and names of products and manufacturers.
- B. Protect materials during storage and construction from wetting by rain or ground water, and from staining or intermixture with earth and other types of materials.
- C. Protect materials from deterioration by moisture and temperature.
 - 1. Store in a dry location or in waterproof containers.
 - 2. Keep containers tightly closed and away from open flames.
 - 3. Comply with manufacturer's recommendations for storage temperature requirements.

1.05 PROJECT CONDITIONS

A. Prevent plaster materials from staining face of surrounding surfaces. Remove immediately from exposed surfaces.

PART 2 - PRODUCTS

2.01 PLASTER MATERIALS

A. Provide plaster materials as required to match the appearance of existing decorative plaster.

PART 3 - EXECUTION

3.01 REPAIRING PLASTER WALLS AND CEILINGS

A. Filling Cracks:

- 1. For cracks that reopen with temperature and humidity changes, the crack shall be widened with a sharp, pointed tool and then filled.
- 2. For persistent cracks, bridge the crack with fiberglass mesh tape pressed into the patching material. After the first application of a quick setting joint compound dries, a second coat shall cover the tape, feathering at the edges. Apply a third coat to even out the surface and follow by a light sanding.
- 3. Large cracks due to structural movement shall be repaired after repairs to the structural system have been made. The plaster on each side of the crack shall be removed to a width of approximately 6-inches down to the lath. Clean out debris and apply metal lath to the cleaned area leaving the existing wood lath in place. Patch the crack with an appropriate plaster in three layers.
- B. Replacing Delaminated Areas of the Finish Coat: Paint a liquid plaster bonding agent on the areas of basecoat plaster that will be re-plastered with a new lime finish coat.
- C. Patching Holes in Walls:
 - 1. Repair small holes less than 4-inches in diameter in two applications. Trowel-apply a layer of base coat plaster and scrape back below the level of the existing plaster. When the base coat has set but before it dries, apply more plaster to create a smooth, level surface.
 - 2. For larger holes where three coats of plaster are damaged or missing down to the lath, remove the old plaster and re-attach any loose lath. Apply plaster in 3 layers lapping each new layer over the old plaster so that old and new are evenly joined.

- 3. If a patch is made in a plaster wall that is slightly wavy, the contour of the patch shall conform to the irregularities of the existing work.
- D. Patching Holes in Ceilings: Examine the plaster around the loose plaster. If the surrounding areas are in reasonably good condition, the loose plaster can be re-attached to the lath using flathead wood screws and plaster washers. To patch a hole in the ceiling plaster, fasten metal lath over the wood lath and fill the hole with successive layers of plaster.
- E. Establishing New Plaster Keys:
 - 1. If the back of the ceiling lath is accessible, small areas of bowed out plaster can be pushed back against the lath.
 - 2. After dampening the old lath and coating the damaged area with a bonding agent, a liquid plaster mix with glue size retardant added shall be applied to the backs of the lath and worked into the voids between the faces of the lath and the back of the plaster. While the first layer is still damp, plaster-soaked strips of jute scrim shall be laid across the backs of the lath and pressed firmly into the first layer as reinforcement.
 - 3. Loose, damaged plaster can also be re-keyed when the goal is to conserve decorative surfaces or wallpaper.
- F. Plaster Patching Materials: Plaster shall be determined by the plasterer.

END OF SECTION