# SECTION 01 1000 SUMMARY

# PART 1 GENERAL

## 1.01 PROJECT

- A. Project Name: 2121 Minnehaha Stair and Trash Room Door Replacement
- B. Owner's Name: Minneapolis Public Housing Authority.
- C. Architect's Name: Adsit Architecture and Planning.
- D. The Project consists of the replacement of interior stair and trash room doors of a high rise building..

## **1.02 DESCRIPTION OF ALTERATIONS WORK**

- A. Scope of demolition and removal work is indicated on drawings and specified in Section 02 4100.
- B. Scope of alterations work is indicated on drawings.
- C. Refinish all surface areas of the following, as specified:
  - 1. Existing hollow metal frames.

## 1.03 OWNER OCCUPANCY

- A. Owner intends to continue to occupy adjacent portions of the existing building during the entire construction period.
- B. Cooperate with Owner to minimize conflict and to facilitate Owner's operations.
- C. Schedule the Work to accommodate Owner occupancy.

## 1.04 CONTRACTOR USE OF SITE AND PREMISES

- A. Arrange use of site and premises to allow:
  - 1. Owner occupancy.
  - 2. Use of site and premises by the public.
- B. Provide access to and from site as required by law and by Owner:
  - 1. Emergency Building Exits During Construction: Keep all exits required by code open during construction period; provide temporary exit signs if exit routes are temporarily altered.
  - 2. Do not obstruct roadways, sidewalks, or other public ways without permit.
- C. Existing building spaces may not be used for storage.

## PART 2 PRODUCTS - NOT USED

## PART 3 EXECUTION - NOT USED

# SECTION 02 4100 DEMOLITION

## PART 1 GENERAL

### 1.01 SECTION INCLUDES

A. Selective demolition of building elements for alteration purposes.

#### 1.02 RELATED REQUIREMENTS

- A. Section 01 1000 Summary: Limitations on Contractor's use of site and premises.
- B. Section 01 1000 Summary: Description of items to be salvaged or removed for re-use by Contractor.
- C. Section 01 6000 Product Requirements: Handling and storage of items removed for salvage and relocation.

### PART 3 EXECUTION

#### 2.01 SCOPE

- A. Remove existing interior stair and trash room doors and hardware.
- B. Remove other items indicated, for salvage. Salvage existing leversets and turn over to the owner.

## 2.02 GENERAL PROCEDURES AND PROJECT CONDITIONS

- A. Comply with applicable codes and regulations for demolition operations and safety of adjacent structures and the public.
  - 1. Obtain required permits.
  - 2. Conduct operations to minimize effects on and interference with adjacent structures and occupants.
  - 3. Conduct operations to minimize obstruction of public and private entrances and exits; do not obstruct required exits at any time; protect persons using entrances and exits from removal operations.
- B. Do not begin removal until receipt of notification to proceed from Owner.
- C. Protect existing structures and other elements that are not to be removed.

## 2.03 SELECTIVE DEMOLITION FOR ALTERATIONS

- A. Drawings showing existing construction and utilities are based on casual field observation and existing record documents only.
  - 1. Verify that construction and utility arrangements are as indicated.
  - 2. Report discrepancies to Architect before disturbing existing installation.
  - 3. Beginning of demolition work constitutes acceptance of existing conditions that would be apparent upon examination prior to starting demolition.
- B. Remove existing work as indicated and as required to accomplish new work.
  - 1. Remove items indicated on drawings.
- C. Protect existing work to remain.
  - 1. Prevent movement of structure; provide shoring and bracing if necessary.
  - 2. Perform cutting to accomplish removals neatly and as specified for cutting new work.
  - 3. Repair adjacent construction and finishes damaged during removal work.
  - 4. Patch as specified for patching new work.

## 2.04 DEBRIS AND WASTE REMOVAL

- A. Remove debris, junk, and trash from site.
- B. Leave site in clean condition, ready for subsequent work.
- C. Clean up spillage and wind-blown debris from public and private lands.

# SECTION 08 1416 FLUSH WOOD DOORS

#### PART 1 GENERAL

### 1.01 SECTION INCLUDES

A. Flush wood doors; flush configuration; fire-rated.

#### 1.02 RELATED REQUIREMENTS

A. Section 08 7100 - Door Hardware.

#### 1.03 REFERENCE STANDARDS

- A. AWI/AWMAC/WI (AWS) Architectural Woodwork Standards; 2014, with Errata (2018).
- B. AWMAC/WI (NAAWS) North American Architectural Woodwork Standards, U.S. Version 3.1; 2016, with Errata (2018).
- C. NFPA 80 Standard for Fire Doors and Other Opening Protectives; 2019.
- D. NFPA 105 Standard for Smoke Door Assemblies and Other Opening Protectives; 2016.
- E. UL 10C Standard for Positive Pressure Fire Tests of Door Assemblies; Current Edition, Including All Revisions.
- F. UL 1784 Standard for Air Leakage Tests of Door Assemblies; Current Edition, Including All Revisions.

### 1.04 SUBMITTALS

- A. Product Data: Indicate door core materials and construction; veneer species, type and characteristics.
- B. Shop Drawings: Show doors and frames, elevations, sizes, types, swings, undercuts, beveling, blocking for hardware, factory machining, factory finishing, cutouts for glazing and other details.
- C. Samples: Submit two samples of door veneer, 6 by 6 inch in size illustrating wood grain, stain color, and sheen.
- D. Certificate: Submit labels and certificates required by quality assurance and quality control programs.
- E. Manufacturer's Installation Instructions: Indicate special installation instructions.
- F. Warranty, executed in Owner's name.

#### 1.05 QUALITY ASSURANCE

- A. Manufacturer Qualifications: Company specializing in manufacturing the products specified in this section, with not less than three years of documented experience.
- B. Installer Qualifications: Company specializing in performing work of the type specified in this section, with not less than three years of documented experience.

## 1.06 DELIVERY, STORAGE, AND HANDLING

- A. Package, deliver and store doors in accordance with specified quality standard.
- B. Accept doors on site in manufacturer's packaging. Inspect for damage.
- C. Protect doors with resilient packaging sealed with heat shrunk plastic. Do not store in damp or wet areas; or in areas where sunlight might bleach veneer. Seal top and bottom edges with tinted sealer if stored more than one week. Break seal on site to permit ventilation.

# 1.07 WARRANTY

- A. Interior Doors: Provide manufacturer's warranty for the life of the installation.
- B. Include coverage for delamination of veneer, warping beyond specified installation tolerances, defective materials, and telegraphing core construction.

# PART 2 PRODUCTS

#### 2.01 MANUFACTURERS

- A. Wood Veneer Faced Doors:
  - 1. Eggers Industries; \_\_\_\_: www.eggersindustries.com/#sle.
  - 2. Graham Wood Doors; \_\_\_\_: www.grahamdoors.com/#sle.
  - 3. Marshfield DoorSystems, Inc; \_\_\_\_: www.marshfielddoors.com/#sle.
  - 4. Substitutions: Submit for Architect approval.

#### 2.02 DOORS

- A. Doors: Refer to drawings for locations and additional requirements.
  - 1. Quality Standard: Premium Grade, Heavy Duty performance, in accordance with AWI/AWMAC/WI (AWS) or AWMAC/WI (NAAWS), unless noted otherwise.
  - 2. Wood Veneer Faced Doors: 5-ply unless otherwise indicated.
- B. Interior Doors: 1-3/4 inches thick unless otherwise indicated; flush construction.
  - 1. Provide solid core doors at each location.
  - 2. Fire Rated Doors: Tested to ratings indicated on drawings in accordance with UL 10C -Positive Pressure; Underwriters Laboratories Inc (UL) or Intertek/Warnock Hersey (WHI) labeled without any visible seals when door is open.
  - 3. Smoke and Draft Control Doors: In addition to required fire rating, provide door assemblies tested in accordance with UL 1784 with maximum air leakage of 3.0 cfm per sq ft of door opening at 0.10 inch wg pressure at both ambient and elevated temperatures for "S" label; if necessary, provide additional gasketing or edge sealing.

#### 2.03 DOOR AND PANEL CORES

A. Fire-Rated Doors: Mineral core type, with fire resistant composite core (FD), plies and faces as indicated above; with core blocking as required to provide adequate anchorage of hardware without through-bolting.

#### 2.04 DOOR FACINGS

- A. Veneer Facing for Transparent Finish: Red oak, veneer grade in accordance with quality standard indicated, plain sliced (flat cut), with book match between leaves of veneer, running match of spliced veneer leaves assembled on door or panel face.
  - 1. Vertical Edges: Any option allowed by quality standard for grade.

### 2.05 DOOR CONSTRUCTION

- A. Fabricate doors in accordance with door quality standard specified.
- B. Cores Constructed with stiles and rails:
  - 1. Provide solid blocks at lock edge for hardware reinforcement.
  - 2. Provide solid blocking for other throughbolted hardware.
- C. Factory machine doors for hardware other than surface-mounted hardware, in accordance with hardware requirements and dimensions.
- D. Factory fit doors for frame opening dimensions identified on shop drawings, with edge clearances in accordance with specified quality standard.
- E. Provide edge clearances in accordance with the quality standard specified.

#### 2.06 FACTORY FINISHING - WOOD VENEER DOORS

- A. Finish work in accordance with AWI/AWMAC/WI (AWS) or AWMAC/WI (NAAWS), Section 5 -Finishing for grade specified and as follows:
  - 1. Transparent:
    - a. System 5, Varnish, Conversion.
    - b. Stain: As selected by Architect.
    - c. Sheen: Satin.
- B. Factory finish doors in accordance with approved sample.

C. Seal door top edge with color sealer to match door facing.

# 2.07 ACCESSORIES

A. Door Hardware: As specified in Section 08 7100.

# PART 3 EXECUTION

## 3.01 EXAMINATION

- A. Verify existing conditions before starting work.
- B. Verify that opening sizes and tolerances are acceptable.
- C. Do not install doors in frame openings that are not plumb or are out-of-tolerance for size or alignment.

## 3.02 INSTALLATION

- A. Install doors in accordance with manufacturer's instructions and specified quality standard.
  - 1. Install fire-rated doors in accordance with NFPA 80 requirements.
  - 2. Install smoke and draft control doors in accordance with NFPA 105 requirements.
- B. Factory-Finished Doors: Do not field cut or trim; if fit or clearance is not correct, replace door.
- C. Use machine tools to cut or drill for hardware.
- D. Coordinate installation of doors with installation of frames and hardware.

# 3.03 TOLERANCES

- A. Comply with specified quality standard for fit and clearance tolerances.
- B. Comply with specified quality standard for telegraphing, warp, and squareness.

## 3.04 ADJUSTING

- A. Adjust doors for smooth and balanced door movement.
- B. Adjust closers for full closure.

# SECTION 08 7100 DOOR HARDWARE

#### PART 1 GENERAL

## 1.01 SECTION INCLUDES

- A. Hardware for wood doors.
- B. Hardware for fire-rated doors.

#### 1.02 RELATED REQUIREMENTS

- A. Section 02 4100 -Demolition: Salvage of existing leversets
- B. Section 08 1416 Flush Wood Doors.

#### 1.03 REFERENCE STANDARDS

- A. ADA Standards Americans with Disabilities Act (ADA) Standards for Accessible Design; 2010.
- B. BHMA A156.1 American National Standard for Butts and Hinges; 2016.
- C. BHMA A156.2 American National Standard for Bored and Preassembled Locks & Latches; 2017.
- D. BHMA A156.4 American National Standard for Door Controls Closers; 2013.
- E. BHMA A156.6 American National Standard for Architectural Door Trim; 2015.
- F. BHMA A156.18 American National Standard for Materials and Finishes; 2016.
- G. DHI (LOCS) Recommended Locations for Architectural Hardware for Standard Steel Doors and Frames; 2004.
- H. ICC A117.1 Accessible and Usable Buildings and Facilities; 2017.
- I. ITS (DIR) Directory of Listed Products; current edition.
- J. NFPA 80 Standard for Fire Doors and Other Opening Protectives; 2019.
- K. NFPA 105 Standard for Smoke Door Assemblies and Other Opening Protectives; 2016.
- L. NFPA 252 Standard Methods of Fire Tests of Door Assemblies; 2017.
- M. UL (DIR) Online Certifications Directory; Current Edition.
- N. UL 10C Standard for Positive Pressure Fire Tests of Door Assemblies; Current Edition, Including All Revisions.
- O. UL 1784 Standard for Air Leakage Tests of Door Assemblies; Current Edition, Including All Revisions.

## 1.04 ADMINISTRATIVE REQUIREMENTS

- A. Coordinate the manufacture, fabrication, and installation of products that door hardware is installed on.
- B. Furnish templates for door and frame preparation to manufacturers and fabricators of products requiring internal reinforcement for door hardware.

#### 1.05 SUBMITTALS

- A. Product Data: Manufacturer's catalog literature for each type of hardware, marked to clearly show products to be furnished for this project, and includes construction details, material descriptions, finishes, and dimensions and profiles of individual components.
- B. Shop Drawings Door Hardware Schedule: Submit detailed listing that includes each item of hardware to be installed on each door. Use door numbering scheme as included in Contract Documents.
  - 1. Prepared by or under supervision of Architectural Hardware Consultant (AHC).
  - 2. Provide complete description for each door listed.
  - 3. Provide manufacturer's and product names, and catalog numbers; include functions, types, styles, sizes and finishes of each item.

C. Manufacturer's Installation Instructions: Indicate special procedures and perimeter conditions requiring special attention.

#### 1.06 QUALITY ASSURANCE

- A. Manufacturer Qualifications: Company specializing in manufacturing products specified in this section with minimum three years of documented experience.
- B. Installer Qualifications: Company specializing in performing work of the type specified for commercial door hardware with at least three years of documented experience.

#### 1.07 DELIVERY, STORAGE, AND HANDLING

A. Package hardware items individually; label and identify each package with door opening code to match door hardware schedule.

## 1.08 WARRANTY

- A. Warranty against defects in material and workmanship for period indicated, from Date of Substantial Completion.
  - 1. Closers: Ten years, minimum.
  - 2. Locksets and Cylinders: Three years, minimum.
  - 3. Other Hardware: Two years, minimum.

### PART 2 PRODUCTS

#### 2.01 DESIGN AND PERFORMANCE CRITERIA

- A. Provide specified door hardware as required to make doors fully functional, compliant with applicable codes, and secure to extent indicated.
- B. Provide individual items of single type, of same model, and by same manufacturer.
- C. Provide door hardware products that comply with the following requirements:
  - 1. Applicable provisions of federal, state, and local codes.
  - 2. Accessibility: ADA Standards and ICC A117.1.
  - 3. Fire-Rated Doors: NFPA 80, listed and labeled by qualified testing agency for fire protection ratings indicated, based on testing at positive pressure in accordance with NFPA 252 or UL 10C.
  - 4. Hardware on Fire-Rated Doors: Listed and classified by UL (DIR), ITS (DIR), or testing firm acceptable to authorities having jurisdiction as suitable for application indicated.
  - 5. Hardware for Smoke and Draft Control Doors: Provide door hardware that complies with local codes, and requirements of assemblies tested in accordance with UL 1784.
    - a. Air Leakage Rate: Tested in accordance with UL 1784, with air leakage rate not to exceed 3.0 cfm/sf of door opening at 0.10 inch of water for both ambient and elevated temperature tests.
- D. Lock Function: Provide lock and latch function numbers and descriptions of manufacturer's series. Refer to Door Hardware Schedule.
- E. Fasteners:
  - 1. Provide fasteners of proper type, size, quantity, and finish that comply with commercially recognized standards for proposed applications.
    - a. Aluminum fasteners are not permitted.
    - b. Provide phillips flat-head screws with heads finished to match door surface hardware unless otherwise indicated.
  - Provide machine screws for attachment to reinforced hollow metal and aluminum frames.
     a. Self-drilling (Tek) type screws are not permitted.
  - 3. Provide stainless steel machine screws and lead expansion shields for concrete and masonry substrates.
  - 4. Provide wall grip inserts for hollow wall construction.
  - 5. Provide spacers or sex bolts with sleeves for through bolting of hollow metal doors and frames.
  - 6. Fire-Rated Applications: Comply with NFPA 80.

- a. Provide wood or machine screws for hinges mortised to doors or frames, strike plates to frames, and closers to doors and frames.
- b. Provide steel through bolts for attachment of surface mounted closers, hinges, or exit devices to door panels unless proper door blocking is provided.

## 2.02 HINGES

- A. Manufacturers:
  - 1. Basis of Design: Ives 700 Series.
  - 2. McKinney; an Assa Abloy Group company; \_\_\_\_: www.assaabloydss.com/#sle.
  - 3. C. R. Laurence Co., Inc; \_\_\_\_\_: www.crl-arch.com/#sle.
  - 4. Hager Companies; \_\_\_\_: www.hagerco.com/#sle.
  - 5. Stanley, dormakaba Group; \_\_\_\_\_: www.stanleyhardwarefordoors.com/#sle.
- B. Hinges: Comply with BHMA A156.1, Grade 1.Verify placement and size of existing hinges to accommodate installation at existing frames.
  - 1. Provide hinges on every swinging door.
  - 2. Provide five-knuckle full mortise butt hinges unless otherwise indicated.
  - 3. Provide ball-bearing hinges at each door.
  - 4. Provide following quantity of butt hinges for each door:
    - a. Doors From 60 inches High up to 90 inches High: Three hinges.

## 2.03 CYLINDRICAL LOCKS

- A. Manufacturers:
  - 1. Basis of Design: Schlage ND Series.Passage function, Rhodes Lever,
- B. Cylindrical Locks (Bored): Comply with BHMA A156.2, Grade 1, 4000 Series.
  - 1. Bored Hole: 2-1/8 inch diameter.
  - 2. Latchbolt Throw: 1/2 inch, minimum.
  - 3. Backset: 2-3/4 inch unless otherwise indicated.
  - 4. Strikes: Provide manufacturer's standard strike for each latchset or lockset with strike box and curved lip extending to protect frame in compliance with indicated requirements.
    - a. Finish: To match lock or latch.
    - b. Field verify strike required with each existing hollow metal frame
    - Trim: Provide lever handle or pull trim on outside of each lock, unless otherwise indicated.

## 2.04 CLOSERS

5.

- A. Manufacturers; Surface Mounted:
  - 1. Basis of Design: Norton P8381 Low Profile Parallel Arm Closer.
- B. Closers: Comply with BHMA A156.4, Grade 1.. UL liseted for use on firerated doorsHeavy Duty with low profile parallel arm mounting.
  - 1. Type: Surface mounted to door, non hold open
  - 2. Provide door closer on each fire-rated and smoke-rated door.
  - 3. Provide metal cover.
  - 4. Push side mounted with low profile parallel arms,

## 2.05 PROTECTION PLATES

- A. Manufacturers:
  - 1. C. R. Laurence Company, Inc; \_\_\_\_: www.crl-arch.com/#sle.
  - 2. Hiawatha, Inc, an Activar Construction Products Group company; \_\_\_\_\_: www.activarcpg.com/hiawatha/#sle.
  - 3. Ives, an Allegion brand; \_\_\_\_\_: www.allegion.com/us/#sle.
  - 4. Trimco; \_\_\_\_: www.trimcohardware.com/#sle.
- B. Protection Plates: Comply with BHMA A156.6.
- C. Metal Properties: Stainless steel.Satin Finish
  - 1. Metal, Standard Duty: Thickness 0.05 inch, minimum.
- D. Edges: Beveled, on four sides unless otherwise indicated.

E. Fasteners: Countersunk screw fasteners.

### 2.06 SILENCERS

- A. Silencers: Provide at equal locations on door frame to mute sound of door's impact upon closing.
  - 1. Single Door: Provide three on strike jamb of frame.
  - 2. Material: Rubber, gray color.

#### 2.07 FINISHES

- A. Finishes: Provide door hardware of same finish, unless otherwise indicated.
  - 1. Primary Finish: 626; satin chromium plated over nickel, with brass or bronze base material (former US equivalent US26D); BHMA A156.18.
  - 2. Secondary Finish: 626; satin chromium plated over nickel, with brass or bronze base material (former US equivalent US26D); BHMA A156.18.

## PART 3 EXECUTION

#### 3.01 EXAMINATION

A. Verify that doors and frames are ready to receive this work; labeled, fire-rated doors and frames are properly installed, and dimensions are as indicated on shop drawings.

#### 3.02 INSTALLATION

- A. Install hardware in accordance with manufacturer's instructions and applicable codes.
- B. Install hardware on fire-rated doors and frames in accordance with applicable codes and NFPA 80.
- C. Install hardware for smoke and draft control doors in accordance with NFPA 105.
- D. Use templates provided by hardware item manufacturer.
- E. Do not install surface mounted items until application of finishes to substrate are fully completed.
- F. Door Hardware Mounting Heights: Distance from finished floor to center line of hardware item. As indicated in following list; unless noted otherwise in Door Hardware Schedule or on drawings.
  - 1. For Steel Doors and Frames: Install in compliance with DHI (LOCS) recommendations.

#### 3.03 ADJUSTING

- A. Adjust hardware for smooth operation.
- B. Adjust gasketing for complete, continuous seal; replace if unable to make complete seal.

#### 3.04 CLEANING

- A. Clean finished hardware in accordance with manufacturer's written instructions after final adjustments have been made.
- B. Clean adjacent surfaces soiled by hardware installation.
- C. Replace items that cannot be cleaned to manufacturer's level of finish quality at no additional cost.

HARDWARE GROUPS

NOTE: THE HARDWARE SUPPLIER IS RESPONSIBLE FOR FINAL SPECIFICATION OF THE ENTIRE HARDWARE GROUP AS REQUIRED FOR APPROPRIATE AND COMPLETE DOOR FUNCTION . THE HARDWARE IS TO COORDINATE WITH THE EXISTING CONDITIONS.

GROUP 1 FIRE RATED DOOR

(3) PAIR HINGES IVES 700 SERIES -VERIFY PLACEMENT AND SIZE OF HINGES ON EXISTING METAL FRAMES

(1) CYLINDRICAL LEVER SET - PASSAGE FUNCTION SCHLAGE ND 10S RHODES LEVER WITH TRIM

(1) KICKPLATE - SATIN STAINLESS STEEL 18" HIGH X 2" LESS THAN TOTAL DOOR WIDTH

- (1) CLOSER -NORTON P8381 LOW PROFILE PARALLEL ARM CLOSER
- (1) SET SMOKE SEALS

# SECTION 09 9123 INTERIOR PAINTING

## PART 1 GENERAL

### 1.01 SECTION INCLUDES

- A. Surface preparation.
- B. Field application of paints.
- C. Scope: Finish surfaces of existing frames exposed to view and unless otherwise indicated.
- D. Do Not Paint or Finish the Following Items:
  - 1. Items factory-finished unless otherwise indicated; materials and products having factory-applied primers are not considered factory finished.
  - 2. Items indicated to receive other finishes.
  - 3. Items indicated to remain unfinished.
  - 4. Fire rating labels, equipment serial number and capacity labels, bar code labels, and operating parts of equipment.

#### 1.02 REFERENCE STANDARDS

- A. 40 CFR 59, Subpart D National Volatile Organic Compound Emission Standards for Architectural Coatings; U.S. Environmental Protection Agency; current edition.
- B. MPI (APSM) Master Painters Institute Architectural Painting Specification Manual; Current Edition.
- C. SSPC-SP 1 Solvent Cleaning; 2015, with Editorial Revision (2016).

#### 1.03 SUBMITTALS

- A. Product Data: Provide complete list of products to be used, with the following information for each:
  - 1. Manufacturer's name, product name and/or catalog number, and general product category (e.g. "alkyd enamel").
  - 2. MPI product number (e.g. MPI #47).
  - 3. Cross-reference to specified paint system(s) product is to be used in; include description of each system.
- B. Samples: Submit three paper "draw down" samples, 8-1/2 by 11 inches in size, illustrating range of colors available for each finishing product specified.
  - 1. Where sheen is specified, submit samples in only that sheen.

## 1.04 QUALITY ASSURANCE

A. Manufacturer Qualifications: Company specializing in manufacturing the products specified, with minimum three years documented experience.

## 1.05 DELIVERY, STORAGE, AND HANDLING

- A. Deliver products to site in sealed and labeled containers; inspect to verify acceptability.
- B. Container Label: Include manufacturer's name, type of paint, brand name, lot number, brand code, coverage, surface preparation, drying time, cleanup requirements, color designation, and instructions for mixing and reducing.
- C. Paint Materials: Store at minimum ambient temperature of 45 degrees F and a maximum of 90 degrees F, in ventilated area, and as required by manufacturer's instructions.

#### 1.06 FIELD CONDITIONS

- A. Do not apply materials when surface and ambient temperatures are outside the temperature ranges required by the paint product manufacturer.
- B. Follow manufacturer's recommended procedures for producing best results, including testing of substrates, moisture in substrates, and humidity and temperature limitations.

- C. Minimum Application Temperatures for Paints: 50 degrees F for interiors unless required otherwise by manufacturer's instructions.
- D. Provide lighting level of 80 ft candles measured mid-height at substrate surface.

## PART 2 PRODUCTS

#### 2.01 MANUFACTURERS

- A. Provide paints and finishes used in any individual system from the same manufacturer; no exceptions.
- B. Paints:
  - 1. Base Manufacturer: Sherwin Williams Company.
  - 2. PPG Paints: www.ppgpaints.com/#sle.
  - 3. Sherwin-Williams Company: www.sherwin-williams.com/#sle.
- C. Primer Sealers: Same manufacturer as top coats.
- D. Substitutions: See Section 01 6000 Product Requirements.

## 2.02 PAINTS AND FINISHES - GENERAL

- A. Paints and Finishes: Ready mixed, unless intended to be a field-catalyzed paint.
  - 1. Provide paints and finishes of a soft paste consistency, capable of being readily and uniformly dispersed to a homogeneous coating, with good flow and brushing properties, and capable of drying or curing free of streaks or sags.
  - 2. Supply each paint material in quantity required to complete entire project's work from a single production run.
  - 3. Do not reduce, thin, or dilute paint or finishes or add materials unless such procedure is specifically described in manufacturer's product instructions.
- B. Volatile Organic Compound (VOC) Content:
  - 1. Provide paints and finishes that comply with the most stringent requirements specified in the following:
    - a. 40 CFR 59, Subpart D--National Volatile Organic Compound Emission Standards for Architectural Coatings.
  - 2. Determination of VOC Content: Testing and calculation in accordance with 40 CFR 59, Subpart D (EPA Method 24), exclusive of colorants added to a tint base and water added at project site; or other method acceptable to authorities having jurisdiction.
- C. Sheens: Provide the sheens specified; where sheen is not specified, sheen will be selected later by Architect from the manufacturer's full line.
- D. Colors: To be selected from manufacturer's full range of available colors.
  1. Selection to be made by Architect after award of contract.

#### 2.03 PAINT SYSTEMS - INTERIOR

- A. Paint I-OP-MD-DT Medium Duty Door/Trim: For surfaces subject to frequent contact by occupants, including metals:
  - 1. Medium duty applications include doors and door frames.
  - 2. Two top coats and one coat primer. Omit primer on factory primed or previously painted surfaces
  - 3. Top Coat(s): Interior Epoxy-Modified Latex; MPI #115 or 215.
    - a. Products:
      - 1) PPG Paints Pitt-Glaze WB Water-Borne Acrylic Epoxy, 16-598 Series, Semi-Gloss.
      - 2) Sherwin-Williams Waterbased Catalyzed Epoxy, Semi-Gloss.

## 2.04 PRIMERS

- A. Primers: Provide the following unless other primer is required or recommended by manufacturer of top coats.
  - 1. Interior Institutional Low Odor/VOC Primer Sealer; MPI #149.

- a. Products:
  - 1) PPG Paints Pure Performance Interior Latex Primer, 9-900.

## PART 3 EXECUTION

## 3.01 EXAMINATION

- A. Do not begin application of paints and finishes until substrates have been properly prepared.
- B. Verify that surfaces are ready to receive work as instructed by the product manufacturer.
- C. Examine surfaces scheduled to be finished prior to commencement of work. Report any condition that may potentially effect proper application.
- D. If substrate preparation is the responsibility of another installer, notify Architect of unsatisfactory preparation before proceeding.
- E. Test shop-applied primer for compatibility with subsequent cover materials.

#### 3.02 PREPARATION

- A. Clean surfaces thoroughly and correct defects prior to application.
- B. Prepare surfaces using the methods recommended by the manufacturer for achieving the best result for the substrate under the project conditions.
- C. Remove or repair existing paints or finishes that exhibit surface defects.
- D. Remove or mask surface appurtenances, including electrical plates, hardware, light fixture trim, escutcheons, and fittings, prior to preparing surfaces or finishing.
- E. Seal surfaces that might cause bleed through or staining of topcoat.
- F. Ferrous Metal:
  - 1. Solvent clean according to SSPC-SP 1.
  - 2. Shop-Primed Surfaces: Sand and scrape to remove loose primer and rust. Feather edges to make touch-up patches inconspicuous. Clean surfaces with solvent. Prime bare steel surfaces. Re-prime entire shop-primed item.
- G. Metal Doors to be Painted: Prime metal door top and bottom edge surfaces.

## 3.03 APPLICATION

- A. Apply products in accordance with manufacturer's written instructions and recommendations in "MPI Architectural Painting Specification Manual".
- B. Do not apply finishes to surfaces that are not dry. Allow applied coats to dry before next coat is applied.
- C. Apply each coat to uniform appearance in thicknesses specified by manufacturer.
- D. Sand metal surfaces lightly between coats to achieve required finish.
- E. Vacuum clean surfaces of loose particles. Use tack cloth to remove dust and particles just prior to applying next coat.

#### 3.04 CLEANING

A. Collect waste material that could constitute a fire hazard, place in closed metal containers, and remove daily from site.

## 3.05 PROTECTION

A. Protect finishes until completion of project.

## 3.06 SCHEDULE - PAINT SYSTEMS

A. Steel Doors and Frames: Finish surfaces exposed to view; I-OP-MD-DT, Semi-Gloss