SECTION 102219

WORKSTATION SYSTEMS

The owner has selected Haworth Compose, Reside, X-Series and Zody Product for the Furniture Portion of this project. Please contract Tammie Gates at Price Modern for all Specifications, Pricing and Inquires. Pricing and Inquires must go through Tammie Gates. No substitutions on product or furniture dealer will be allowed.

Tammie Gates Contact Information
4400 Forbes Blvd, Suite A
Lanham, MD 20706
Cell: 703-595-6984

PART 1 GENERAL

1.1 RELATED DOCUMENTS

A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and Division 1 Specification Sections, apply to this Section.

1.2 SUMMARY

A. Section Includes

1. Partition Framing System.
2. Partition Glazing.
3. Doors.
4. Partition insulation.
5. Frames for Doors and Glazing.
6. Trim, Sealants, Hardware and Accessories.

1.3 RELATED SECTIONS

A. Section 081113 – Steel Doors and Frames

B. Section 081416 – Wood Doors

C. Section 087100 – Door Hardware

D. Section 088000 – Glass and Glazing

E. Section 096500 – Resilient Flooring

F. Section 096816 – Carpeting

G. Section 099000 – Painting

H. Section 097200 – Wall Coverings

1.4 REFERENCES

A. ANSI/BIFMA X5.5-2008 (Desks and Tables)

B. ANSI/BIFMA X5.6-2003, Standard for Panel Systems

C. ANSI/BIFMA X5.9-2004 (Storage Units)

D. ANSI/BIFMA X7.1 – 2007

E. ASTM E 72 - Standard Test Methods of Conducting Strength Tests of Panels for Building Construction

F. ASTM E 84 - Standard Test Method for Surface Burning Characteristics of Building Materials

G. ASTM E 90 - Standard Test Method for Laboratory Measurement of Airborne Sound Transmission Loss of Building Partitions and Elements

H. ASTM E 119 - Standard Test Methods for Fire Tests of Building Construction and Materials

I. ASTM E 413 - Classification for Rating Sound Insulation

J. Federal Test Method Standard No. 406, Method 1074

K. Federal Specification (FS), FS CCC-W-408A - Wall Covering-Vinyl Coated

L. Federal Specification (FS), FS HH-I-521 - Insulation Blankets, Thermal (Mineral Fiber, for Ambient Temperatures).

M. GREENGUARD Environmental Institute (www.greenguard.org), GREENGUARD Standard for Low Emitting Products

N. Underwriters Laboratories, Inc. (UL) Fire Resistance Directory

O. Warnock Hersey International (WHI), Certification Listings

1.5 MANUFACTURER CRITERIA

A. The panel system and storage products shall be manufactured in a ISO 9001 certified plant.

B. Manufacturer shall offer a program that provides extensive training and installation certification.

1.6 PERFORMANCE REQUIREMENTS

A. Sound Transmission Classification: Test in accordance with ASTM E 90 by an independent agency and classified in accordance with ASTM E 413.

1. NRC .85 and STC 18.

B. Structural Performance: Test in accordance with ASTM E 72.

1. Partitions must be capable of withstanding a uniformly distributed load of 5 psf applied perpendicular to the partition without exceeding deflection of 1/240 of the partition height.

C. Panel shall conform to BIFMA ANSI/BIFMA X5.6-2003 Standard for Panel Systems requirements.

D. Standard Panel Fabrics shall comply with NFPA 701, method 1, requirements or be tested in accordance with ASTM E 84 or UL 723, on entire assembled panel and have a flame spread rating not exceeding 25 and a smoke development rating not exceeding 450 (Class A Flammability Requirements).

E. Panels must meet Greenguard indoor air quality requirements or ANSI/BIFMA X7.1 - 2007 indoor air quality requirements

F. Systems Panels shall be Listed to UL 1286.

G. Task Lighting products shall meet the requirements of the UL Standard 153 portable electric luminaries and CSA standard for portable luminaries C22.2.12.

H. Storage pedestals, files are compliant with ANSI/BIFMA X5.9-2004 (Storage Units) or X5.6-2003 (Panel Systems with overhead shelving and units).

I. Freestanding elements shall conform to ANSI/BIFMA X5.5-2008 (Desks and Tables).

1.7 SUSTAINABILITY CRITERIA

A. Total recycled content shall be greater than 50% combining both post-consumer and pre-consumer recycled content.

B. All metal components shall be 100% recyclable.

C. All materials shall be free of hexavalent chrome, CFC's, and PDBE's.

D. Adhesives used shall be solvent free and free of any hazardous air pollutants.

E. Metal parts shall be powder coated and finished with a durable VOC-free finish which is applied in a process that generates low levels of recyclable waste.

F. Forest Stewardship Council (FSC) certified materials must be available or on special order basis.

G. Product shall be GREENGUARD Indoor Air Quality Certified as low emitting furniture meeting LEED requirements of IEQ 4.5 Low Emitting Furniture.

1.8 SUBMITTALS

A. Product Data: Submit manufacturer's detailed materials and fabrication specifications and installation instructions. Include catalog cuts of hardware, fastenings and other data as required.

B. Shop Drawings: Submit shop drawings for fabrication and erection of partition assemblies which are not fully described by manufacturer's data. Show anchorage and accessory items and finishes.

C. Samples: Submit samples of each required finish and color. Prepare samples on same materials which will be used in partition assemblies.

1.9 LEED SUBMITTALS

A. Submit product data for the following credits in accordance to LEED 2009 for Commercial Interiors (CI):

1. Energy and Atmosphere

a. Credit EA 1.1 – Optimize Energy Performance – Lighting Power

2. Materials and Resources (MR)

a. Credit MR 2 – Construction Waste Management
b. Credit MR 3.2 – Materials Reuse – Furniture and Furnishings
c. Credit MR 4 – Recycled Content
d. Credit MR 5 – Regional Materials
e. Credit MR 7 – Certified Wood

3. Indoor Environmental Quality (IEQ)

a. Credit IEQ 3.2 – Construction IAQ Management Plan – Before Occupancy
b. Credit IEQ 4.5 – Low-Emitting Materials – Systems Furniture and Seating
c. Credit IEQ 6.1 – Controllability of Systems – Lighting
d. Credit IEQ 8.1 – Daylight and Views – Daylight
e. Credit IEQ 8.2 – Daylight and Views – Views for Seated Spaces

4. Innovation & Design Process (ID)

a. Credit IDP 1 – Innovation in Design

B. Submit product data for the following credits in accordance to LEED 2009 for New Construction (NC):

1. Energy and Atmosphere

a. Credit EA 1 – Optimize Energy Performance

2. Materials and Resources (MR)

a. Credit MR 2 – Construction Waste Management
b. Credit MR 3 – Materials Reuse
c. Credit MR 4 – Recycled Content
d. Credit MR 5 – Regional Materials
e. Credit MR 7 – Certified Wood

3. Indoor Environmental Quality (IEQ)

a. Credit IEQ 3.2 – Construction IAQ Management Plan – Before Occupancy
b. Credit IEQ 6.1 – Controllability of Systems – Lighting
c. Credit IEQ 8.1 – Daylight and Views – Daylight
d. Credit IEQ 8.2 – Daylight and Views – Views

4. Innovation in Design (ID)

    a. Credit IDP 1 – Innovation Credit for Low Emitting Furniture

C. Submit product data for the following credits in accordance to LEED 2009 for Existing Buildings (EB):

1. Energy and Atmosphere

    a. Credit EA 1 – Optimize Energy Efficiency Performance

2. Materials and Resources (MR)

    a. Credit MR 2 – Sustainable Purchasing – Durable Goods

3. Indoor Environmental Quality (IEQ)

    a. Credit IEQ 2.2 – Controllability of Systems – Lighting
    b. Credit IEQ 2.4 – Daylight and Views

D. Submit product data for the following credits in accordance to LEED 2009 for Core and Shell Development:

1. Energy and Atmosphere

    a. Credit EA 1 – Optimize Energy Performance

2. Materials and Resources (MR)

    a. Credit MR 2 – Construction Waste Management
    b. Credit MR 3 – Materials Reuse
    c. Credit MR 4 – Recycled Content
    d. Credit MR 5 – Regional Materials
    e. Credit MR 6 – Certified Wood

3. Indoor Environmental Quality (IEQ)

    a. Credit IEQ 8.1 – Daylight and Views – Daylight
    b. Credit IEQ 8.2 – Daylight and Views – Views

1.10 QUALITY ASSURANCE

A. Manufacturer Qualifications: All primary products specified in this section will be supplied by a single manufacturer with a minimum of ten (10) years experience.

B. Installer Qualifications: All products listed in this section are to be installed by a single installer with a minimum of five (5) years demonstrated experience in installing products of the same type and scope as specified.

C. Mock-Up: Provide a mock-up for evaluation of surface preparation techniques and application workmanship.

1. Finish areas designated by Architect.

2. Do not proceed with remaining work until workmanship, color, and sheen are approved by Architect.

3. Refinish mock-up area as required to produce acceptable work.

D. Worksurfaces shall be capable of supporting the "BIFMA" functional load of 1.5 pounds per linear inch of perimeter and deflection not exceeding .0055 inches per linear inch of width.

1.11 DELIVERY, STORAGE, AND HANDLING

A. Deliver office partition system components cartoned or crated to provide protection during transit and job storage.

B. Inspect partition components upon delivery for damage. Minor damages may be repaired, provided finish items are equal to new work and acceptable to Architect. Remove and replace damaged items as directed.

C. Store partition components on raised platforms in vertical positions with blocking between units to allow air circulation. Keep stored material covered and protected from damage.

1.12 PROJECT CONDITIONS

A. Maintain environmental conditions (temperature, humidity, and ventilation) within limits recommended by manufacturer for optimum results. Do not install products under environmental conditions outside manufacturer's absolute limits.

1.13 WARRANTY

A. At project closeout, provide to Owner, or Owner’s Representative, an executed copy of the manufacturer's standard limited warranty against manufacturing defect, outlining its terms, conditions, and exclusions from coverage. Provide lifetime warranty on all products except those listed below:

1. 10-year warranty on all electrical components, electrical accessories and fixed task lighting, excluding underfloor power; seating mechanisms* excluding those in wood or wood framed chairs; upholstery foam, seat and back mesh, seating glides and casters; stack chair frames; wall products.

2. 10-year warranty on all products that are at any time used in a classroom or educational environment (other than administrative areas), except products listed below.

3. 5-year warranty on wood or wood framed products and wood chairs including their mechanisms; gel arm caps; fabric scrims and fabrics rated (A) heavy duty under the Association of Contract Textiles guidelines; user-adjustable worksurface mechanisms; thermofused laminates; slow-close mechanisms; ambient and flexible task lighting; horizontal glass or thermoplastic table assemblies and JumpStuff products other than Boogie Board (lifetime).

4. 3-year warranty on all flooring products, including underfloor power, other than factory-applied surfaces; plastic ultraviolet light color fastness; fabrics rated (A) General Contract under the Association of Contract Textile guidelines*.

1.14 ATTIC STOCK

A. Furnish items in original packaging clearly labeled with part number and description. Store in location designated by the Owner or Owner's representative.

B. Provide additional partition system components to match installed materials.

1. Wall Components: Provide sufficient components to construct _____ linear feet of two-sided partition. Provide trim for _____ inside corners, _____ outside corners, and _____ "T" intersections.

2. Frames: _____.

PART 2 PRODUCTS

2.1 MANUFACTURERS

A. Acceptable Manufacturer: Haworth, Inc. One Haworth Center, Holland, MI 49423-9576, telephone 616.393.3000, www.haworth.com.

2.2 PRODUCT

2.3 PANEL REQUIREMENTS

A. All panels shall have an overall thickness of 3".

B. Panel shall be capable of being monolithic, segmented and stackable.

C. Panel surfaces must be capable of being replaced or reupholstered in the field.

D. Fabric tiles shall have a thick steel frame to increase rigidity. Tiles shall be removeable.

E. Frames shall consist of four roll-formed cold rolled steel tubes welded together at the corners into a rectangular frame and finished using an e-coating process. Frames shall be load bearing.

F. Panels shall be reinforced to accommodate cantilevered work surfaces, shelves and storage units.

G. Panels shall have integrated slots in the vertical frame that allow components to be mounted in 1" increments.

H. Panel shall have leveling glides with a minimum 2.5" height adjustment and carpet grippers.

I. Green core fabric tiles

J. Panels must be available in nominal widths 18", 24", 30", 36", 42", 48", 54" and 60" (+/- 2")

K. Panels must be available in nominal heights: 34", 42", 50", 58", 66" and 74" (+/-2")

L. Tile surfaces shall include painted steel, fabric/acoustical, wood veneer, laminate, marker board, slat.

M. Panels shall have the capability to stack up to 90" and be connect to one another via a bolted connection.

N. Panel connectors must be universal for use in all 90 degree conditions (2-,3- and 4-way conditions shall be orderable as a single line item).

O. Glass stacking frames must be able to span multiple frames up to 96”.

P. Panels shall have the ability to make midpoint ("T-mount") connection without defacing the surface of the panel.

Q. Panels shall be able to wrap a standard 48", 60", 72" x 30" desk / table without additional stretchers, fillers, or the use of special sized panels.

R. The panel base raceway thickness shall not exceed the thickness of the panel. Base raceway shall contain all concealed electrical components.

S. Panels shall offer side independent surfaces that include monolithic and segmented in multiple material finishes.

T. Panel shall be available with wood trim (vertical and horizontal). Trim (whether wood or metal) shall span up to 120”.

U. Tiles must be capable of being specified to the floor (in lieu of a raceway cover) on both sides of the panel. Tiles must be the same catalog number regardless of install location.

V. Panels 66" to 74" (+/- 2") shall provide sliding door.

W. Include all hardware as required to attach partition to adjacent construction.

2.4 PANEL FRAME CONSTRUCTION

A. Frame Construction: Four roll-formed 17-gauge (0.060", 1.5mm) tubes welded together at each corner, forming a rectangular frame; painted using e-coating process.

1. Light block: Roll-formed 18-gauge (0.048", 1.2mm) 3-sided cross-member to support tile and block light.

2. Legs: 15-gauge (0.075", 1.9mm) steel legs welded to the frame and contain leveling glides.

3. Leveling glides: Cold-headed steel with molded plastic leveling foot; 2.5" vertical adjustment.

B. Top Trim: Painted steel, painted aluminum or veneer-wrapped aluminum.

1. Steel: 20-gauge (0.035", 0.89mm) roll-formed steel, powdercoat paint finish.

2. Aluminum: 13-gauge (0.090", 2.3mm) solid extruded aluminum, powdercoat paint finish.

3. Veneer-wrapped aluminum: 13-gauge (0.090", 2.3mm) solid extruded aluminum, laminated with 25-gauge (0.020", 0.51mm) wood veneer.

C. Corner cap: Zinc die-cast with steel spring clips for attachment, powdercoat paint finish.

D. Vertical Trim: Painted steel, painted aluminum or veneer-wrapped aluminum

1. Steel: 20-gauge (0.035", 0.89mm) roll-formed steel, powdercoat paint finish.

2. Aluminum: 13-gauge (0.090", 2.3mm) solid extruded aluminum, powdercoat paint finish

3. Veneer-wrapped aluminum: 13-gauge (0.090", 2.3mm) solid extruded aluminum, laminated with 25-gauge (0.020", 0.51mm) wood veneer.

E. Base Raceway Trim and Pan

1. Trim: 18-gauge (0.048", 1.2mm) roll-formed steel; powdercoat paint finish

2. Pan: 20-gauge (0.036", 0.9mm) roll-formed steel; powdercoat paint finish

2.5 STACKING FRAMES

A. Frame Construction: Four roll-formed 17-gauge (0.060", 1.5mm) tubes welded together at each corner, forming a rectangular frame; painted using e-coating process

1. Attachment: (0.4375", 11.1mm) nut, bolt, washer.

2.6 GLASS STACKING FRAMES

A. Frame construction: Four extruded aluminum 15-gauge (0.070", 1.78mm) rails connected by threaded fasteners at each intersection; attached to the outside of each vertical rail is a 17-gauge (0.060", 1.5mm) steel mounting strip

1. Glass insert: (0.250", 6.35mm) thick tempered glass

2.7 GLASS PANEL CONSTRUCTION

A. Frame construction: Four extruded aluminum 15-gauge (0.070", 1.78mm) rails connected by threaded fasteners at each intersection; attached to the outside of each vertical rail is a 17-gauge (0.060", 1.5mm) steel mounting strip; 23-gauge (0.250", 6.35mm) tempered glazed insert.

B. Legs: 15-gauge (0.075", 1.9mm) steel legs welded to the frame and contain leveling glides.

C. Leveling glides: Cold-headed steel with molded plastic leveling foot; 2.5" vertical adjustment.

2.8 TILE CONSTRUCTION

A. Painted steel tiles: 20-gauge (0.036", 0.90 mm) steel; powdercoat paint finish; steel attachment clips.

B. Fabric/tackable tiles: 20-gauge (0.036", 0.90mm) welded steel frame, no-added formaldehyde molded fiber-pad insert, covered with specified fabric; steel attachment clips.

C. Wood tiles: Wood composite core with wood veneer adhered to the front and back utilizing a water-based adhesive and wood finishing process; edges are finished with veneer edgebanding; steel attachment clips.

D. Markerboard tiles: Wood composite core with white markerboard laminate adhered to the front and back utilizing a water-based adhesive; steel attachment clips

E. Slat tiles: Extruded aluminum with powdercoat paint finish; steel attachment clips

2.9 WORKSURFACES REQUIREMENTS

A. Worksurfaces shall be available in widths from 24"-120" in 3" increments.

B. Worksurfaces shall be available in depths 18", 24" and 30".

C. Worksurfaces shall be a minimum 1 3/16" in thickness.

D. Worksurfaces shall be edged in ABS edge band or vinyl T-mold.

E. Worksurfaces shall be offered in wood veneer or plastic laminate.

F. Worksurfaces shall be of a minimum 45# density particleboard. The core shall be of a balanced construction between a laminate or veneer top and a backer sheet.

G. Worksurfaces shall offer a sustainable core material consisting of 100% recycled wood fiber or 100% post-consumer recycled wood waste bonded with no-added urea formaldehyde resin.

H. The end panels shall be the full depth (nominal) of 12", 18", 24" & 30" worksurfaces. The end panels shall have 2 adjustable glides for leveling. End Panels shall be both laminate and wood finishes.

I. Worksurfaces shall be predrilled to accept pedestals and/or cantilevers.

J. Provide grommet openings for wireway management.

2.10 WORKSURFACE CONSTRUCTION

A. Thickness: 1.1875”.

B. Standard core: Engineered composite made with 100% recycled and/or recovered wood fiber bonded with resin, minimum 45 lbs. density; underside finished with paper backing material; compliant with Greenguard and ANSI/BIFMA Standards for Low-Emitting Products.

C. Green core: Engineered composite made with 100% recycled wood fiber or 100% post-consumer recycled wood waste bonded with no-added urea formaldehyde resin, minimum 45 lbs. density; underside finished with paper backing material; compliant with Greenguard and ANSI/BIFMA Standards for Low-Emitting Products .

D. Deflection: Capable of supporting 200 lbs. with a deflection of no more than (0.0313") per foot.

E. Locating holes: Work surface to be pre-drilled with locating holes to accept cantilever supports and/or pedestal storage units.

F. Laminate covering: High Pressure Laminate

1. 0.030", 0.76mm thickness.

2. 0.118", 3mm radius t-mold edgeband.

3. 0.118", 3mm radius edgeband on user edge, 0.039", 1mm edgeband on remaining edges.

G. Wood Veneer

1. 0.020", 0.51mm thickness.

2. 0.118", 3mm radius edge band on user edge, 0.028", 0.7mm edgeband on remaining edges.

H. Work Surface Support Construction

1. Cantilever brackets.

a. Main cantilever brackets: 12-gauge (0.105", 2.7mm) steel.
b. Corner cantilever brackets: 14-gauge (0.075", 1.90mm) steel.

2. Flush-mount plates: 11-gauge (0.120", 3.05mm) steel.

I. End Panel

1. Wood composite core 1.5", 38.1mm thick.

2. Laminate or wood veneer facings.

3. 0.118", 3mm radius plastic edge band.

4. 0.100", 2.5mm thick wood edge band.

5. Leveling glides provide 2.25", 57.2mm of adjustment range.

2.11 UTILITIES - COMMUNICATIONS REQUIREMENTS

A. Communication pathways shall be available in the base of the panel. The pathways shall accommodate a minimum of 42 cables at the base; 0.25" diameter cable @ 40% fill (in powered panels).

B. Panel stack kits shall provide cable routing, storage, and access capability at work heights.

C. Panel shall provide capability to route communication cabling both vertically and horizontally within the panel.

D. Panel shall provide options for the mounting of single gang and modular telecommunications outlet faceplates.

E. Panel shall provide for the lay in of communication cables that does not require feed through from panel to panel the base raceway.

F. Routed cables shall be accessed from either side of the panel base raceway.

G. Cable management poles shall provide capability to route communication cabling from the ceiling to the base of a panel.

H. Cable management in panel must be capable of maintaining the minimum bend radius required for fiber optic cable.

I. Horizontal cable management from panel to panel at desk height and base.

J. Vertical cable manager for managing cables on the panel surface.

K. Cable storage trays for mounting below the work surface.

L. Worksurface data and receptacle ports must be offered as an option.

M. Electrical and communication cabling shall have the ability to be physically separated throughout the system.

N. Every panel offered in the series shall have a vertical cable way with the exception of glass panels.

O. Panels shall be capable of being ported (data) above and below the worksurface.

P. All worksurfaces shall be specifiable with a grommet opening for communications and wire management.

2.12 UTILITIES - POWER REQUIREMENTS

A. All electrical components shall be UL 1286 and/or 183 & CSA listed and meet the applicable requirements of the National Electrical Code/ Canadian Electrical Code.

B. All panels shall be shipped with a raceway capable of distribution of 3- or 4-circuit, 20 amp (15 amp Canada) circuits.

C. All Panels shall have the ability to ship with or without power installed. Retrofit kit must be made available to power non-power panels after installation.

D. All hot and neutral conductors of the electrical distribution system shall be minimum #12AWG. If shared neutrals are used the conductors must be minimum 10 AWG.

E. The product shall have component options that comply with Chicago and New York City codes.

F. Under work surface cord management for power shall be available.

G. Power pole shall be capable of carrying 3- or 4-circuit, 20 amp (15 amp Canada) electrical circuits plus the capability of carrying (23) 0.25 diameter cables @ a 40% fill rate.

H. Power pole widths shall be equal to the thickness of the panels and the pole finish shall match the finish of the panel trim.

I. Power pole shall be capable of being opened along the length of the vertical of the pole to permit lay-in of wiring.

J. Power pole must be totally supported by the panel system and be available for a minimum ceiling height of 10'.

K. Panels 30" to 60" wide must have power available at the base and desk height (32" to 38") above the finished floor.

L. Receptacles shall be offered in a field programmable version for 3 circuit application. Circuit identification on each receptacle should be easily seen by user. Isolated ground receptacles must be permanently marked with the proper symbol identification.

M. Panels 30" and wider must have the ability to provide a minimum four triplex per panel.

N. The panels shall be able to be powered from the floor or ceiling building source with systems in feed module or top feed pole.

O. For 3 circuit power, 15A receptacles are field programmable with all circuits able to access the isolated ground.

P. For 4 circuit power, 15A receptacles are shipped with factory set circuit identified on the face of the receptacle.

Q. 20A receptacles are shipped with specific circuit identification on the face of the receptacle.

R. Worksurface mounted receptacle shall be available to mount into surface grommet or clamp on back edge.

S. The modular electrical system must be available with UL 1286 and UL 183 Listed components.

T. Panel base raceway covers shall have factory installed knockouts (4 per panel, 2 each side).

U. Separate cable / power drop panel 6" to 12" in width that manages wire internally and allows for triplex power outlets at desk height in panel.

V. External base in feed modules shall be capable of mounting into every base receptacle outlet location.

W. The modular electrical system should be available with 100% PVC-free components.

2.13 PANEL POWER CONSTRUCTION

A. 3- or 4-Circuit (2+2, 3+1) 8-wire system.

B. 3-Circuit: 3 hot/3 neutral/1 ground/1 isolated ground rated at 20 amps; (8) 12-gauge copper wires.

C. 4-Circuit (2+2): 2 hot/1 neutral/2 hot/1 neutral/1 ground/1 isolated ground rated at 20 amps; (6) 12-gauge copper wires (hot and grounds), (2) 10-gauge copper wires (neutrals).

D. 4-Circuit (3+1): 3 hot/1 neutral/1 hot/1 neutral/1 ground/1 isolated ground rated at 20 amps; (6) 12-gauge copper wires (hot and grounds), (2) 10-gauge copper wires (neutrals).

E. Wire covering: Flex Noryl PVC-free.

F. Component housings: Flex Noryl PVC-free.

G. UL 457U Type 1 listed.

H. CSA Standard C22.2 No. 203 certified.

2.14 UPPER STORAGE SHELF AND OVERHEAD STORAGE UNITS (OSU)

A. OSU shall have a formed stop at top rear edge of shelf to protect panels.

B. All door types shall be available with optional slow close mechanism.

C. OSU shall be available with or without locks.

D. OSU shall be available in 24”, 30”, 36”, 42”, 48”, 54”, 60”, 66’, and 72” widths with a depth of 14” and height of 16”.

E. OSU shall include the top, door front with or without lock, end panels, shelf with back stop, and hardware.

F. The door of the OSU shall recede over the top providing the maximum usable interior storage.

G. OSU and shelf shall be roll-formed painted steel so the front edge conceals optional task light.

H. Locks shall be standard in black or chrome and lock options shall include keyed-alike and master-keying.

I. All units shall secure in place by an anti-dislodgment clip.

J. All units shall accept separately specified task lights of equal or shorter length.

K. Painted steel shelf dividers shall be available for both shelves and overheads.

L. Shelf widths shall include 24”, 30”, 36”, 42”, 48”, 54”, 60”, 66’, and 72”.

M. Shelves shall have a depth of 13¼” and shelf ends shall have a height of 8”.

N. Shelf shall accommodate under mounting of task lights of equal or shorter length.

O. Shelf and OSU shall be installed on equivalent width of one or more panels.

P. The shelf shall have powder paint finish.

Q. OSU and shelf shall be shipped unassembled.

R. Upper Storage Construction

1. Top: 18-gauge (0.048”, 1.2mm) steel.

2. Shelf: 18-gauge (0.048”, 1.2mm) steel.

3. End panels: 16-gauge (0.060”, 1.5mm) steel.

4. Steel door: 22-gauge (0.030”, 0.76mm) steel.

5. Wood door: 0.6875”, 17.5mm thick door with wood composite core and wood veneer over the face and balancing backer on the back, wood veneer edges.

6. Acrylic insert door: Extruded aluminum frame with powdercoat paint finish with (0.125”, 3.2mm) thick pane of acrylic (PETG).

S. Movement

1. Doors open and recede over the top of the cabinet.

2. Steel ball-bearing slides and hinges.

3. Available with or without locks.

4. Optional gas-assisted cylinder slow-close mechanism.

5. Optional 14-gauge (0.075”, 1.9mm) brackets to allow off-modular attachment to panel.

2.15 TASK LIGHTING

A. Task lights shall require no special tools for removal.

B. Task lights shall be available in at least three basic widths to fit under overhead storage components from 30" wide to 72" wide.

C. Task lighting shall meet the requirements of the appropriate UL Standard (153 Portable Luminaries, UL 1598 Luminaries).

D. Task lights shall offer an electronic high-efficiency ballast.

E. The light cord shall be heavy duty with a grounded plug and be a minimum of 6' but to 9' in length.

F. All task lights shall include the lamp and lens cover.

G. Task lights shall offer a diffuser and reflector shall provide veiling uniformity.

H. Panel supported ambient lights shall be available.

I. Task Lights shall be equipped with T8 bulbs.

J. Task lights shall have an option for LED technology which could be freestanding, work surface mounted, or panel mounted.

K. Task lights must have the ability to daisy chain to one another to a maximum of five units per power source.

L. Task Light Construction

1. 24-gauge (0.023”, 0.61mm) roll-formed steel, powdercoat paint finish.

2. Ballast.

3. Energy Star-rated electronic ballast.

4. UL listed.

5. Lamp.

6. T8 3500K Tri-Phospor Octic lamp with low mercury content.

7. Rated for 20,000 hour life.

PART 3 EXECUTION

3.1 INSTALLATION

A. Install in accordance with manufacturer's instructions.

END OF SECTION

SECTION 125213

CHAIRS

PART 1 GENERAL

1.1 RELATED DOCUMENTS

A. Drawings and general provisions of the Contract, including General and Supplementary Conditions and Division 1 Specification Sections, apply to this Section.

1.2 SUMMARY

A. Section Includes

1. Zody Chair Series

a. Task Chair without Arms
b. Task Chair with Fixed Arms
c. Task Chair with Height Adjustable Arms
d. Task Chair with 4D Arms

2. Hardware and Accessories

1.3 RELATED SECTIONS

A. Section 012500 – Substitution Procedures

1.4 REFERENCES

A. ANSI/BIFMA X5.1-2002 (General Purpose Office Chairs)

B. ANSI/BIFMA X7.1 – 2007, Standard for Indoor Air Quality

C. [BSR/HFES-100 2007][ANSI/HFES 100 - 2007, Ergonomic Requirements]

D. BIFMA G1 – 2002, Ergonomics Guideline

E. GREENGUARD Environmental Institute (www.greenguard.org), GREENGUARD Standard for Low Emitting Products

F. GREENGUARD Environmental Institute (www.greenguard.org), GREENGUARD for Children and Schools Product Certification Program

G. International Organization for Standardization (ISO), ISO 9001, Quality Management Systems – Requirements

H. McDonough Braungart Design Chemistry, LLC (MBDC), Cradle to Cradle Certification

1.5 MANUFACTURER CRITERIA

A. The seating products shall be manufactured in an ISO 9001 certified plant.

B. Manufacturer shall offer a program that provides extensive training and installation certification.

1.6 PERFORMANCE REQUIREMENTS

A. Chairs must conform to Greenguard indoor air quality requirements or ANSI/BIFMA X7.1 - 2007 indoor air quality requirements

B. Chairs shall conform to ANSI/BIFMA X5.1-2002 (General Purpose Office Chairs).

C. Ergonomic standards

1. Fit 5th percentile female to 95th percentile male.

2. Meets BIFMA G1 – 2002.

3. Meets BSR/HFES-100 2007.

1.7 SUSTAINABILITY CRITERIA

A. Total recycled content shall be greater than 50% combining both post-consumer and pre-consumer recycled content.

B. All metal components shall be 100% recyclable.

C. All materials shall be free of hexavalent chrome, CFC's, and PDBE's.

D. Adhesives used shall be solvent free and free of any hazardous air pollutants.

E. Metal parts shall be powder coated and finished with a durable VOC-free finish which is applied in a process that generates low levels of recyclable waste.

F. Chrome used shall be trivalent only.

G. Product shall be GREENGUARD Children and Schools Certified as low emitting furniture meeting LEED requirements of IEQ 4.5 Low Emitting Furniture.

H. Product shall be GREENGUARD Indoor Air Quality Certified as low emitting furniture meeting LEED requirements of IEQ 4.5 Low Emitting Furniture.

I. Product shall have MBDC Cradle to Cradle Certification with Gold product rating.

J. The seating products shall be manufactured in an ISO 14001 certified plant.

1.8 SUBMITTALS

A. Product Data: Submit manufacturer's detailed materials and fabrication specifications and installation instructions. Include catalog cuts of hardware, fastenings and other data as required.

B. Shop Drawings: Submit shop drawings for fabrication and erection of chairs which are not fully described by manufacturer's data. Show anchorage and accessory items and finishes.

C. Samples: Submit samples of each required finish and color. Prepare samples on same materials that will be used in chairs.

1.9 LEED SUBMITTALS

A. Submit product data for the following credits in accordance to LEED 2009 for Commercial Interiors (CI):

1. Materials and Resources (MR)

a. Credit MR 2 – Construction Waste Management
b. Credit MR 3.2 – Materials Reuse – Furniture and Furnishings
c. Credit MR 4 – Recycled Content
d. Credit MR 5 – Regional Materials
e. Credit MR 6 – Rapidly Renewable Materials

2. Indoor Environmental Quality (IEQ)

a. Credit IEQ 3.2 – Construction IAQ Management Plan – Before Occupancy
b. Credit IEQ 4.5 – Low-Emitting Materials – Systems Furniture and Seating

3. Innovation & Design Process (ID)

a. Credit IDP 1 – Innovation in Design
1). Exemplary Performance – OR –
2). Innovation Credit for Cradle to Cradle Certified Products

B. Submit product data for the following credits in accordance to LEED 2009 for New Construction (NC):

1. Materials and Resources (MR)

a. Credit MR 2 – Construction Waste Management
b. Credit MR 3 – Materials Reuse
c. Credit MR 4 – Recycled Content
d. Credit MR 5 – Regional Materials
e. Credit MR 6 – Rapidly Renewable Materials

2. Innovation & Design Process (ID)

a. Credit IDP 1 – Innovation in Design
1). Innovation Credit for Low Emitting Furniture – OR –
2). Innovation Credit for Cradle to Cradle Certified Products

C. Submit product data for the following credits in accordance to LEED 2009 for Existing Buildings (EB):

1. Materials and Resources (MR)

a. Credit MR 2 – Sustainable Purchasing – Durable Goods

D. Submit product data for the following credits in accordance to LEED 2009 for Core and Shell Development:

1. Materials and Resources (MR)

a. Credit MR 2 – Construction Waste Management
b. Credit MR 3 – Materials Reuse
c. Credit MR 4 – Recycled Content
d. Credit MR 5 – Regional Materials

1.10 QUALITY ASSURANCE

A. Manufacturer Qualifications: All primary products specified in this section will be supplied by a single manufacturer with a minimum of ten (10) years experience.

B. Installer Qualifications: All products listed in this section are to be installed by a single installer with a minimum of five (5) years demonstrated experience in installing products of the same type and scope as specified.

1.11 DELIVERY, STORAGE, AND HANDLING

A. Deliver chairs cartoned or crated to provide protection during transit and job storage.

B. Inspect chairs upon delivery for damage. Minor damages may be repaired, provided finish items are equal to new work and acceptable to Architect. Remove and replace damaged items as directed.

C. Store chairs on raised platforms in vertical positions with blocking between units to allow air circulation. Keep stored material covered and protected from damage.

1.12 PROJECT CONDITIONS

A. Maintain environmental conditions (temperature, humidity, and ventilation) within limits recommended by manufacturer for optimum results. Do not install products under environmental conditions outside manufacturer's absolute limits.

1.13 WARRANTY

A. At project closeout, provide to Owner, or Owner’s Representative, an executed copy of the manufacturer's standard limited warranty against manufacturing defect, outlining its terms, conditions, and exclusions from coverage.

1. Duration: One (1) Year from date of installation.

B. The manufacturer shall provide a limited lifetime warranty for all products, covering parts, labor, and shipping.

C. Provide 10-year warranty on all seating mechanisms, excluding mechanisms in wood or wood framed chairs; upholstery foam, seat and back mesh, seating glides and casters; stack chair frames.

1. The Applicable Warranty Period for seating mechanisms is a single shift forty hour week. If the chair is used more than this, then the Applicable Warranty Period will be reduced in proportion to the increased usage.

D. Provide 10-year warranty on all products that are at any time used in a classroom or educational environment (other than administrative areas), except products listed below:

1. Provide 5-year warranty on wood or wood framed products and wood chairs including their mechanisms; gel arm caps; fabric scrims and fabrics rated (A) heavy duty under the Association of Contract Textiles guidelines.

2. Provide 3-year warranty on plastic ultraviolet light color fastness; fabrics rated (A) heavy duty under the Association of Contract Textiles guidelines.

a. The Applicable Warranty Period for these products is a single shift forty hour week. If the chair is used more than this, then the Applicable Warranty Period will be reduced in proportion to the increased usage.

3. Provide 1 - 5 year warranty on products that are manufactured outside North America and sold into the North American market.

a. The product-specific Applicable Warranty Period is identified in individual price list publications

1.14 ATTIC STOCK

A. Furnish items in original packaging clearly labeled with part number and description. Store in location designated by the Owner or Owner's representative.

B. Provide additional chairs to match installed materials.

1. Task Chair without Arms.

2. Task Chair with Fixed Arms.

3. Task Chair with Height Adjustable Arms.

4. Task Chair with 4D Arms.

PART 2 PRODUCTS

2.1 MANUFACTURERS

A. Acceptable Manufacturer: Haworth, Inc. One Haworth Center, Holland, MI 49423-9576, telephone 616.393.3000, www.haworth.com.

B. Substitutions: Not permitted.

B. Requests for substitutions will be considered in accordance with provisions of Section 012500, Substitution Procedures.

2.2 MANUFACTURED UNITS

A. Basis of Design: Zody Chair Series by Haworth, Inc., or comparable product by one of the following:

1. Aeron by Herman Miller Inc.

2. Life by Knoll

3. Leap by Steelcase Inc.

B. Chairs shall have the ability to be integrated into private offices, open areas, and panel systems.

C. Each chair within the product line must include a caution label attached to the underside of the chair and visible to the user when underside is accessed. Label shall contain safety precautions including leveling, loading, and weight distribution.

D. Task Chair without Arms.

1. Seat: [Standard upholstered foam][Foam with Technogel® Soft Lite gel insert].

a. Seat Type: [Standard adjustable, 3" range][Fixed].
b. Outer shell: Stamped steel.
c. Inner shell: Contoured, injection molded, impact resistant polypropylene.
d. Seat edge: Waterfall front edge.
e. Seat Foam: Contoured, high resilient water base polyurethane foam, 2.7lbs minimum density, containing no Clora Flora Carbons (CFC's).
f. Seat fabric: As selected from manufacturer's standard available range.

2. Back: [Soft mesh][Mesh with upholstered back jacket].

a. Recline: 24 degrees from horizontal, accomplished with a three point synchronous mechanism. Seat pan moves downward 1 degree for every 2-3 degrees in back recline.
b. Back Frame: Glass reinforced nylon.
c. Back Mesh: 100% polyester tested to 60,000 double rubs per ASTM D 4157/3597 Modified-Wyzenbeek.

3. Base: Five-star die cast aluminum base, [painted][powder coated metallic][polished aluminum][hexavalent chrome] finish.

4. Arms: None

5. Dimensions, measured in accordance with BIFMA/CMD-1-2002:

a. SH: 14" - 21"
b. H: 36" - 43"
c. D: 29"
d. W: 29"
e. SW: 19.25"
f. SD: [16" - 19" adjustable seat depth][16"]

6. Height Adjustment [Pneumatic][Low position pneumatic]. Pneumatic gas lift shall be activated with a cable operated lever attached to the seat. [Seat height adjusts 5" from 16" to 21"][Low position seat height adjusts from 14" to 17"]

7. Adjustable Lumbar: 4" height adjustment and 1.5" depth adjustment. Can be adjusted independently for right- or left-hand side of user's body.

8. Additional Ergonomic Features

    a. Tilt with Back Stop: Back stops every 4 degrees throughout the full 24 degree recline of the chair. Includes tilt limiter.
    b. Forward Tilt: Seat pan moves downward 5 degrees from the initial position.
    c. Back Stop/Forward Tilt: Back stops every 4 degrees throughout the full 24 degree recline of the chair.
    d. PAL Back System: Asymmetrical lumbar support height adjusts 4" and can be adjusted independently for right- or left-hand side of user's body. Includes passive pelvic support.
    e. Headrest.

9. Casters: 60 mm hooded dual wheel easy glide [hard nylon][soft polyurethane] casters.

10. Up to 51% recycled content, 98% recyclable.

11. Frame Trim Color: [TR-F Black][TR-E Smoke].

12. Base Trim Colors:

    a. TR-F Black
    b. TR-LE Metallic Silver
    c. TR-MG Metallic Gunmetal
    d. TR-MC Metallic Champagne
    e. PM-P Polished Aluminum

13. Back Mesh: [Grade A][100% Polyester] Fabric.

    a. MA-001 Support
    b. MA-002 Comfort
    c. MA-003 Wellness
    d. MA-004 Relax
    e. MA-005 Gusto
    f. MA-006 Refresh
    g. MA-007 Soothe
    h. MA-008 Peaceful

E. Task Chair with Fixed Arms.

1. Seat: [Standard upholstered foam][Foam with Technogel® Soft Lite gel insert].

    a. Seat Type: [Standard adjustable, 3" range][Fixed].
    b. Outer shell: Stamped steel.
    c. Inner shell: Contoured, injection molded, impact resistant polypropylene.
    d. Seat edge: Waterfall front edge.

e. Seat Foam: Contoured, high resilient water base polyurethane foam, 2.7lbs minimum density, containing no Clora Flora Carbons (CFC's).
f. Seat fabric: As selected from manufacturer's standard available range.

2. Back: [Soft mesh][Mesh with upholstered back jacket].

a. Recline: 24 degrees from horizontal, accomplished with a three point synchronous mechanism. Seat pan moves downward 1 degree for every 2-3 degrees in back recline.
b. Back Frame: Glass reinforced nylon.
c. Back Mesh: 100% polyester tested to 60,000 double rubs per ASTM D 4157/3597 Modified-Wyzenbeek.

3. Base: Five-star die cast aluminum base, [painted][powder coated metallic finish][polished aluminum][hexavalent chrome].

4. Arms: Fixed.

a. Replaceable by removing one screw.
b. Arm Uprights: Die cast aluminum with glass reinforced nylon posts.

5. Dimensions, measured in accordance with BIFMA/CMD-1-2002:

a. SH: 14" - 21"
b. H: 36" - 43"
c. D: 29"
d. W: 29"
e. SW: 19.25"
f. AH: ____"
g. SD: [16" - 19" adjustable seat depth][16"].

6. Height Adjustment [Pneumatic][Low position pneumatic]. Pneumatic gas lift shall be activated with a cable operated lever attached to the seat. [Seat height adjusts 5" from 16" to 21"][Low position seat height adjusts from 14" to 17"]

7. Additional Ergonomic Features

a. Tilt with Back Stop: Back stops every 4 degrees throughout the full 24 degree recline of the chair. Includes tilt limiter.
b. Forward Tilt: Seat pan moves downward 5 degrees from the initial position.
c. Back Stop/Forward Tilt: Back stops every 4 degrees throughout the full 24 degree recline of the chair.
d. PAL Back System: Asymmetrical lumbar support height adjusts 4" and can be adjusted independently for right- or left-hand side of user's body. Includes passive pelvic support.
e. Headrest.

8. Adjustable Lumbar: 4" height adjustment and 1.5" depth adjustment. Can be adjusted independently for right- or left-hand side of user's body.

9. Casters: 60 mm hooded dual wheel easy glide [hard nylon][soft polyurethane] casters.

10. Up to 51% recycled content, 98% recyclable.

11. Frame and Arm Caps Trim Color: [TR-F Black][TR-E Smoke].

12. Base and Arm Uprights Trim Colors:

    a. TR-F Black
    b. TR-LE Metallic Silver
    c. TR-MG Metallic Gunmetal
    d. TR-MC Metallic Champagne
    e. PM-P Polished Aluminum

13. Back Mesh: [Grade A][100% Polyester] Fabric.

    a. MA-001 Support
    b. MA-002 Comfort
    c. MA-003 Wellness
    d. MA-004 Relax
    e. MA-005 Gusto
    f. MA-006 Refresh
    g. MA-007 Soothe
    h. MA-008 Peaceful

F. Task Chair with Height Adjustable Arms.

1. Seat: [Standard upholstered foam][Foam with Technogel® Soft Lite gel insert].

    a. Seat Type: [Standard adjustable, 3" range][Fixed].
    b. Outer shell: Stamped steel.
    c. Inner shell: Contoured, injection molded, impact resistant polypropylene.
    d. Seat edge: Waterfall front edge.
    e. Seat Foam: Contoured, high resilient water base polyurethane foam, 2.7lbs minimum density, containing no Clora Flora Carbons (CFC's).
    f. Seat fabric: As selected from manufacturer's standard available range.

2. Back: [Soft mesh][Mesh with upholstered back jacket].

    a. Recline: 24 degrees from horizontal, accomplished with a three point synchronous mechanism. Seat pan moves downward 1 degree for every 2-3 degrees in back recline.
    b. Back Frame: Glass reinforced nylon.
    c. Back Mesh: 100% polyester tested to 60,000 double rubs per ASTM D 4157/3597 Modified-Wyzenbeek.

3. Base: Five-star die cast aluminum base, [painted][powder coated metallic finish][polished aluminum][hexavalent chrome].

4. Arms: Height adjustable.

    a. Independently adjustable (right and left).
    b. Replaceable by removing one screw.
    c. Arm Uprights: Die cast aluminum with glass reinforced nylon posts.

d. Adjustable Height Arm: Arms adjust 4" vertically to accommodate varying elbow rest heights

5. Dimensions, measured in accordance with BIFMA/CMD-1-2002:

   a. SH: 14" - 21"
   b. H: 36" - 43"
   c. D: 29"
   d. W: 29"
   e. SW: 19.25"
   f. AH: 6.8" - 10.8" adjustable arm height from seat.
   g. SD: [16" - 19" adjustable seat depth][16"].

6. Height Adjustment [Pneumatic][Low position pneumatic]. Pneumatic gas lift shall be activated with a cable operated lever attached to the seat. [Seat height adjusts 5" from 16" to 21"][Low position seat height adjusts from 14" to 17"]

7. Back Stop: [Multi-position back stop including upright][Six position tilt stop – upright and every four degrees].

8. Additional Ergonomic Features

   a. Tilt with Back Stop: Back stops every 4 degrees throughout the full 24 degree recline of the chair. Includes tilt limiter.
   b. Forward Tilt: Seat pan moves downward 5 degrees from the initial position.
   c. Back Stop/Forward Tilt: Back stops every 4 degrees throughout the full 24 degree recline of the chair.
   d. PAL Back System: Asymmetrical lumbar support height adjusts 4" and can be adjusted independently for right- or left-hand side of user's body. Includes passive pelvic support.
   e. Headrest.

9. Adjustable Lumbar: 4" height adjustment and 1.5" depth adjustment. Can be adjusted independently for right- or left-hand side of user's body.

10. Casters: 60 mm hooded dual wheel easy glide [hard nylon][soft polyurethane] casters.

11. Up to 51% recycled content, 98% recyclable.

12. Frame and Arm Caps Trim Color: [TR-F Black][TR-E Smoke].

13. Base and Arm Uprights Trim Colors:

   a. TR-F Black
   b. TR-LE Metallic Silver
   c. TR-MG Metallic Gunmetal
   d. TR-MC Metallic Champagne
   e. PM-P Polished Aluminum

14. Back Mesh: [Grade A][100% Polyester] Fabric.

   a. MA-001 Support

b. MA-002 Comfort
c. MA-003 Wellness
d. MA-004 Relax
e. MA-005 Gusto
f. MA-006 Refresh
g. MA-007 Soothe
h. MA-008 Peaceful

G. Task Chair with 4D Arms.

1. Seat: [Standard upholstered foam][Foam with Technogel® Soft Lite gel insert].

   a. Seat Type: [Standard adjustable, 3" range][Fixed].
   b. Outer shell: Stamped steel.
   c. Inner shell: Contoured, injection molded, impact resistant polypropylene.
   d. Seat edge: Waterfall front edge.
   e. Seat Foam: Contoured, high resilient water base polyurethane foam, 2.7lbs minimum density, containing no Clora Flora Carbons (CFC's).
   f. Seat fabric: 100% recycled polyester, 15.65 oz. per linear yard, having abrasion resistance of 90,000 double rubs per ASTM D 4157/3597 Modified-Wyzenbeek.

2. Back: [Soft mesh][Mesh with upholstered back jacket].

   a. Recline: 24 degrees from horizontal, accomplished with a three point synchronous mechanism. Seat pan moves downward 1 degree for every 2-3 degrees in back recline.
   b. Back Frame: Glass reinforced nylon.
   c. Back Mesh: 100% polyester tested to 60,000 double rubs per ASTM D 4157/3597 Modified-Wyzenbeek.

3. Base: Five-star die cast aluminum base, [painted][powder coated metallic finish][polished aluminum][hexavalent chrome].

4. Arms: 4D.

   a. Independently adjustable (right and left).
   b. Replaceable by removing one screw.
   c. Arm Uprights: Die cast aluminum with glass reinforced nylon posts.
   d. Adjustable Height Arm: Arms adjust 4" vertically to accommodate varying elbow rest heights
   e. Side to side arm cap adjustment range: 3" (1.5" each arm cap)
   f. Front to back adjustment range: 3.5"
   g. Pivoting
      1). In: 20 degrees
      2). Out 20 degrees

5. Dimensions, measured in accordance with BIFMA/CMD-1-2002:

   a. SH: 14" - 21"
   b. H: 36" - 43"
   c. D: 29"

d. W: 29"
e. SW: 19.25"
f. AH: 6.8" - 10.8" adjustable arm height from seat.
g. SD: [16" - 19" adjustable seat depth][16"].

6. Height Adjustment [Pneumatic][Low position pneumatic]. Pneumatic gas lift shall be activated with a cable operated lever attached to the seat. [Seat height adjusts 5" from 16" to 21"][Low position seat height adjusts from 14" to 17"]

7. Additional Ergonomic Features

   a. Adjustable Height Arm: Arms adjust 4" vertically to accommodate varying elbow rest heights
   b. Tilt with Back Stop: Back stops every 4 degrees throughout the full 24 degree recline of the chair. Includes tilt limiter.
   c. Forward Tilt: Seat pan moves downward 5 degrees from the initial position.
   d. Back Stop/Forward Tilt: Back stops every 4 degrees throughout the full 24 degree recline of the chair.
   e. PAL Back System: Asymmetrical lumbar support height adjusts 4" and can be adjusted independently for right- or left-hand side of user's body. Includes passive pelvic support.
   f. Headrest.

8. Adjustable Lumbar: 4" height adjustment and 1.5" depth adjustment. Can be adjusted independently for right- or left-hand side of user's body.

9. Casters: 60 mm hooded dual wheel easy glide [hard nylon][soft polyurethane] casters.

10. Up to 51% recycled content, 98% recyclable.

11. Frame and Arm Caps Trim Color: [TR-F Black][TR-E Smoke].

12. Base and Arm Uprights Trim Colors:

    a. TR-F Black
    b. TR-LE Metallic Silver
    c. TR-MG Metallic Gunmetal
    d. TR-MC Metallic Champagne
    e. PM-P Polished Aluminum

13. Back Mesh: [Grade A][100% Polyester] Fabric.

    a. MA-001 Support
    b. MA-002 Comfort
    c. MA-003 Wellness
    d. MA-004 Relax
    e. MA-005 Gusto
    f. MA-006 Refresh
    g. MA-007 Soothe
    h. MA-008 Peaceful

PART 3 EXECUTION

3.1 EXAMINATION

A. Do not begin installation until substrates have been properly prepared.

B. If substrate preparation is the responsibility of another installer, notify Architect of unsatisfactory preparation before proceeding.

3.2 PREPARATION

A. Clean surfaces thoroughly prior to installation.

B. Prepare surfaces using the methods recommended by the manufacturer for achieving the best result for the substrate under the project conditions.

3.3 INSTALLATION

A. Install in accordance with manufacturer's instructions.

B. Locate chairs as indicated on approved shop drawings, with required clearances.

C. Adjust hardware and chairs and leave in proper operating condition.

3.4 PROTECTION

A. Protect installed products until completion of project.

B. Touch-up, repair or replace damaged products before Substantial Completion.

3.5 CHAIR SCHEDULE

A. Task Chair without Arms.

1. Quantity:
2. Frame Trim Color:
3. Base Trim Color:
4. Back Mesh Color:

B. Task Chair with Fixed Arms.

1. Quantity:
2. Frame and Arm Caps Trim Color:
3. Base and Arm Uprights Trim Color:
4. Back Mesh Color:

C. Task Chair with Height Adjustable Arms.

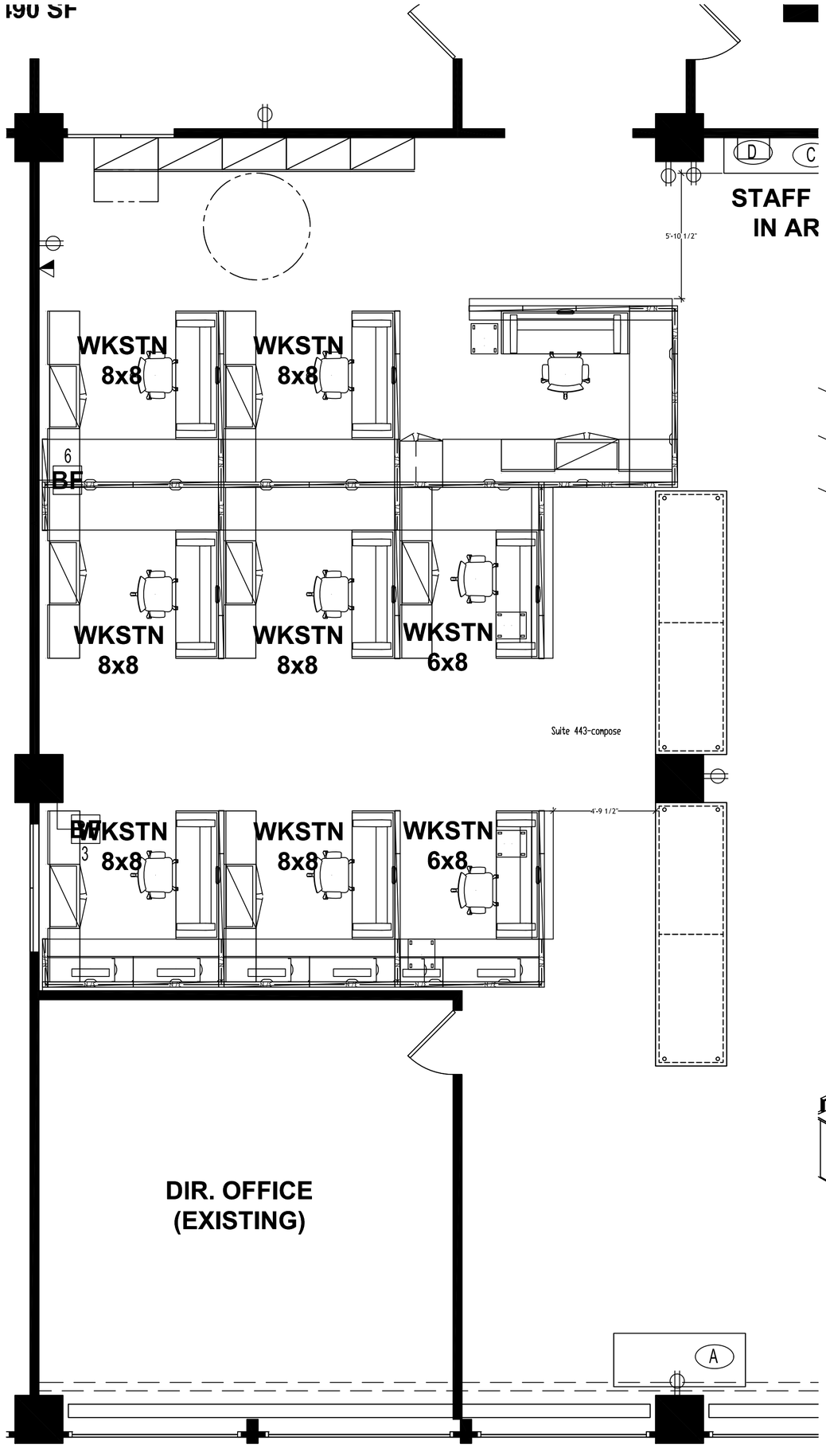
1. Quantity:

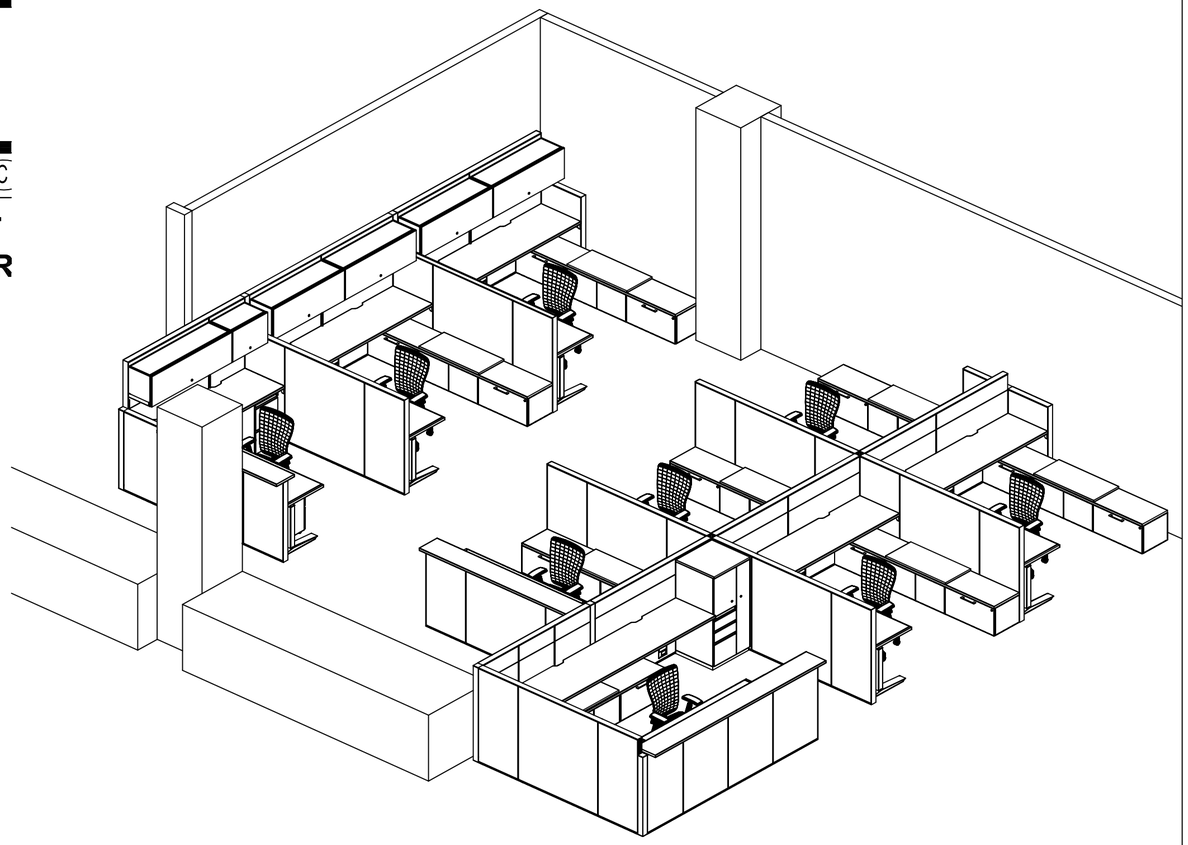
2. Frame and Arm Caps Trim Color:
3. Base and Arm Uprights Trim Color:
4. Back Mesh Color:

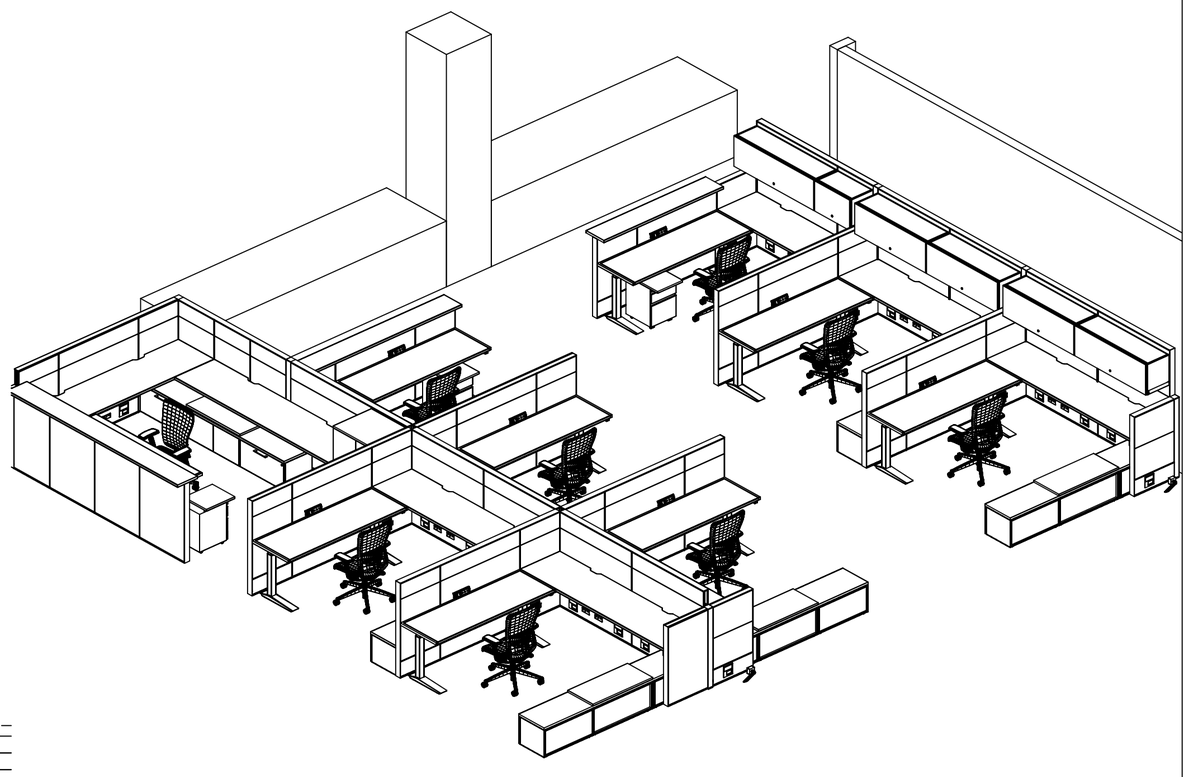
D. Task Chair with 4D Arms.

1. Quantity:
2. Frame and Arm Caps Trim Color:
3. Base and Arm Uprights Trim Color:
4. Back Mesh Color:

END OF SECTION







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f 301.459.3715
www.pricemodern.com

REVISIONS:

DATE	COMMENT	BY
5/2/14	Revisions	SBW

PROJECT:

MLK Library

Suite 443

COMPOSE

Scale:	1/4"=1'-0"
Date:	4/11/2014
Designer:	SBW
Project #:	143-14

DRAWING TITLE:

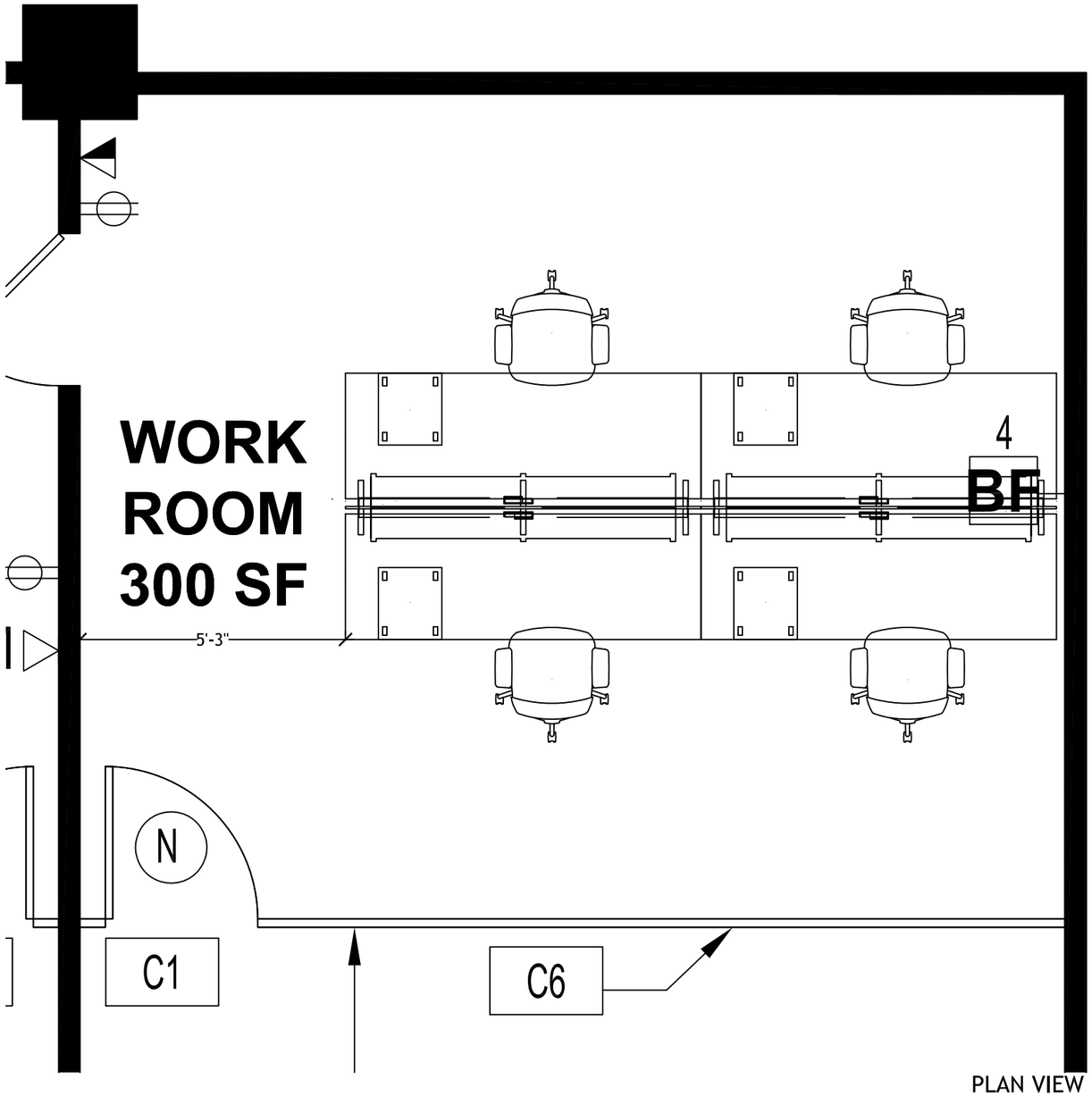
PROPOSED PLAN

SHEET NUMBER:

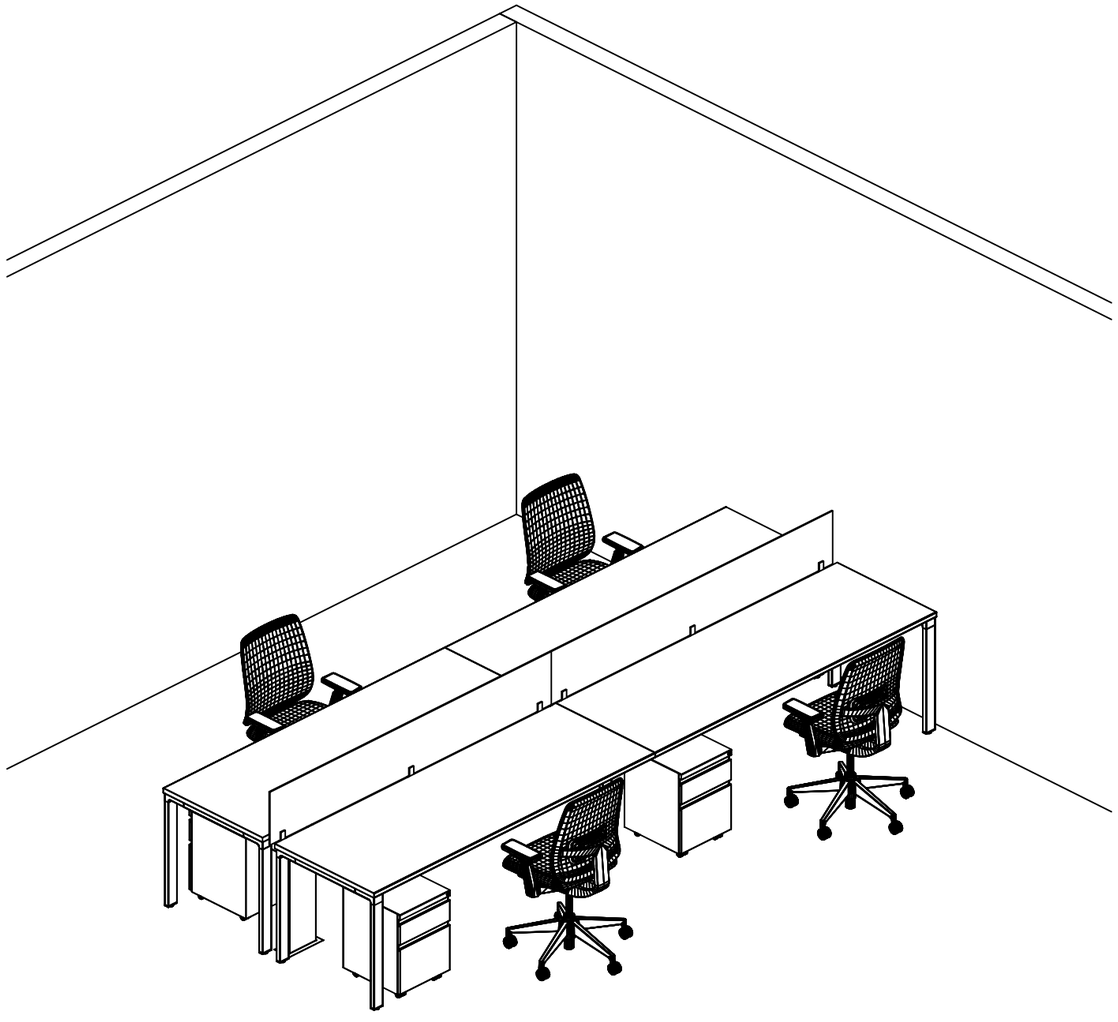
1 OF

MLK Library

Suite 443
WORK ROOM



PLAN VIEW



3-D VIEW

SCALE: 3/8"=1'-0" | DATE: 4/14/2014

PROJECT#: 143-14 | DESIGNER: SBW | REV#1: 5/1/2014

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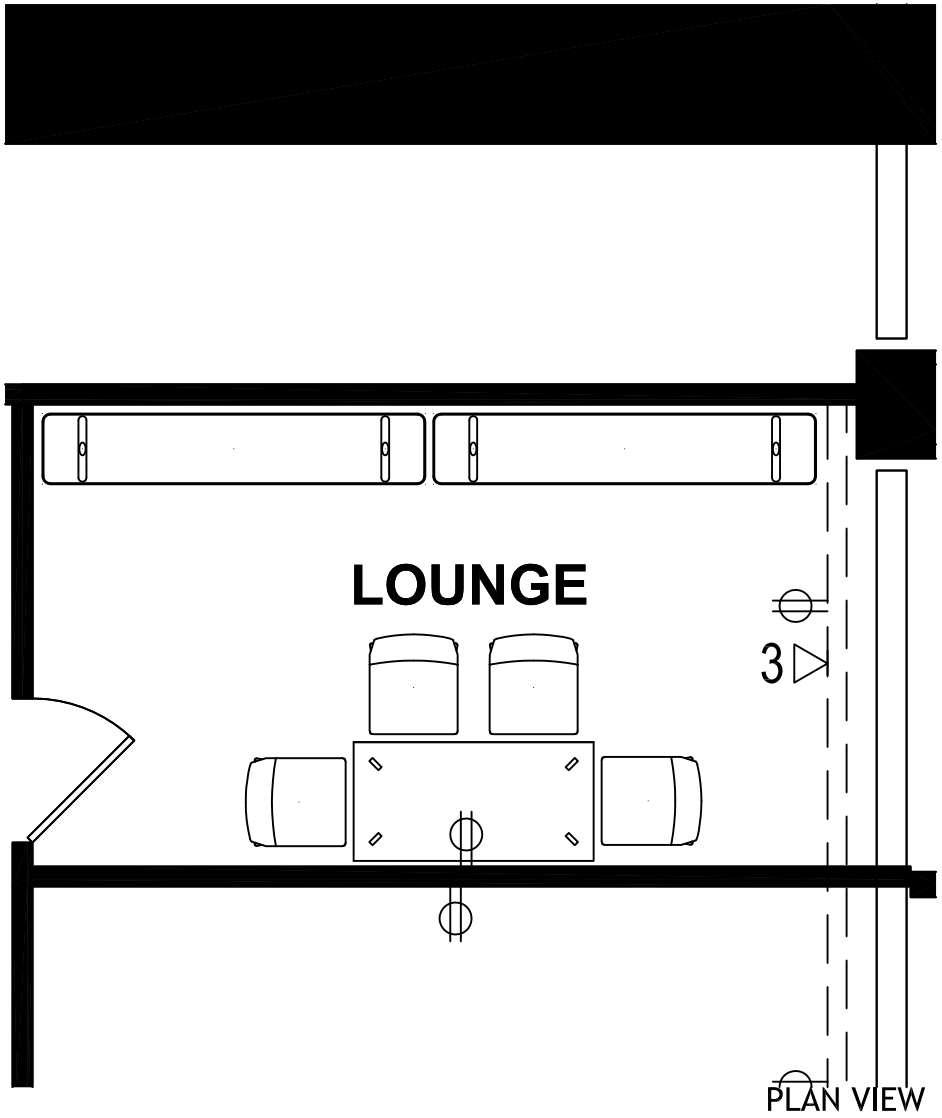
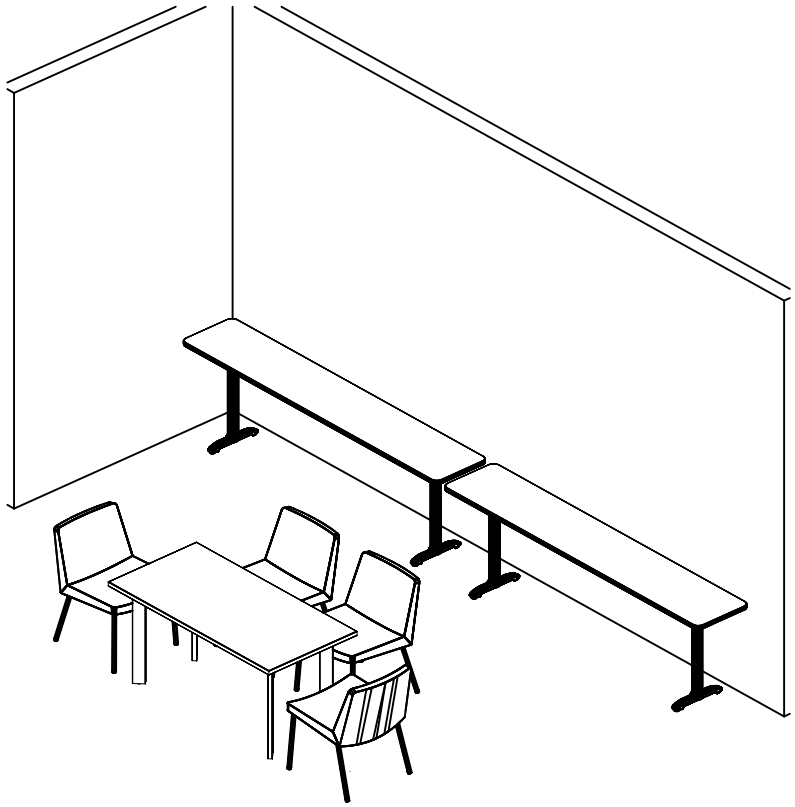
MLK Library

Suite 443
LOUNGE



PLAN VIEW



3-D VIEW

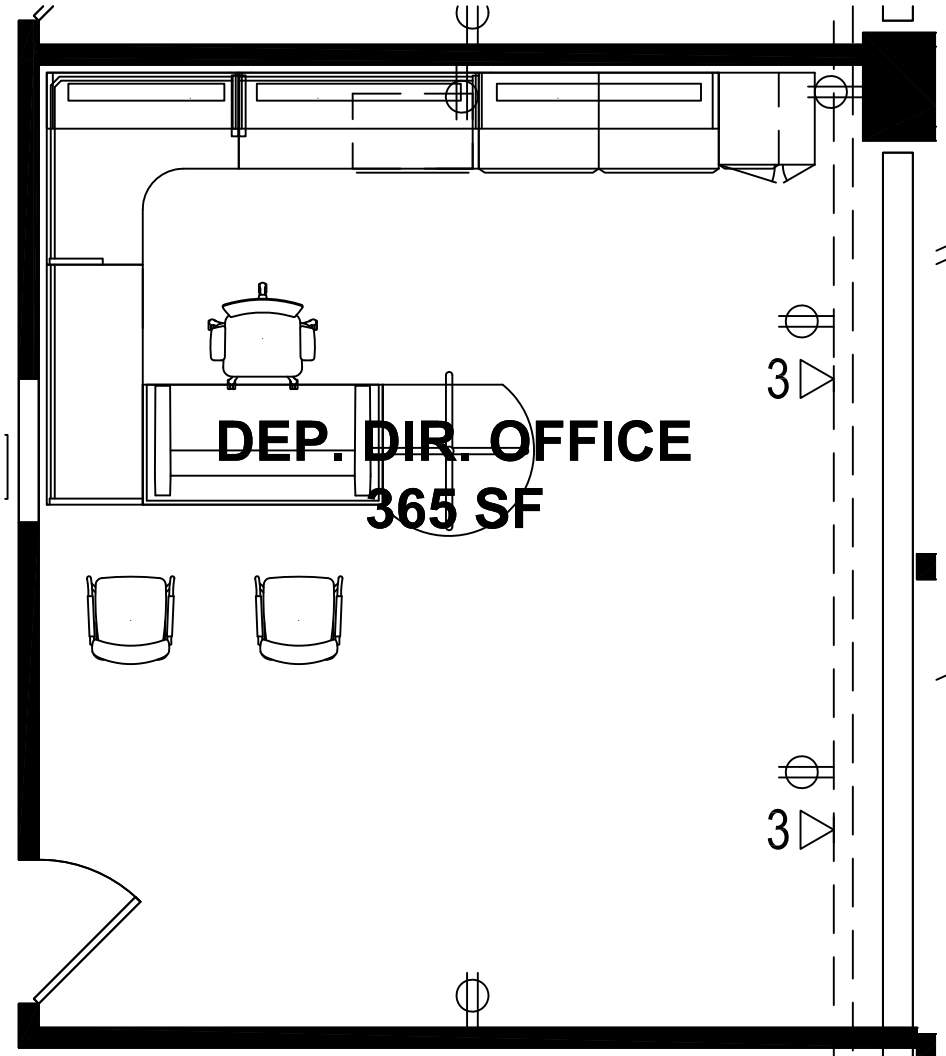
SCALE: 1/4"=1'-0" | DATE: 4/10/2014

PROJECT#: 143-14 | DESIGNER: SBW | REV#1: 5/1/2014

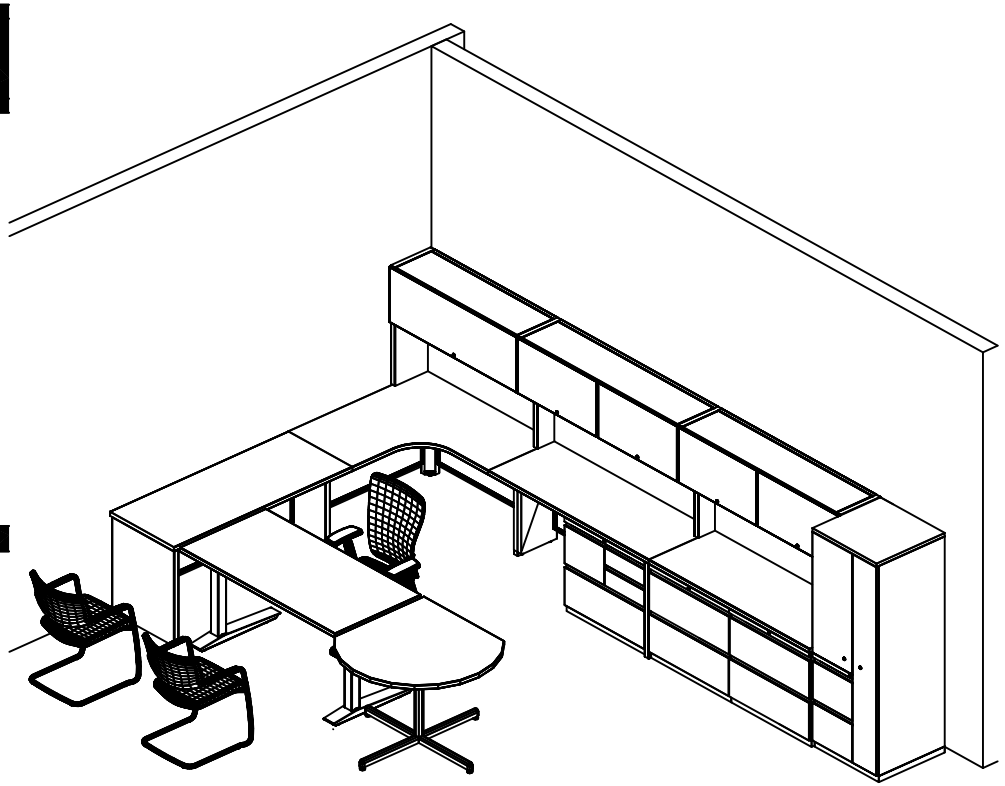
Price Modern

MLK Library

Suite 443
DEP.DIR. OFFICE



PLAN VIEW



3-D VIEW

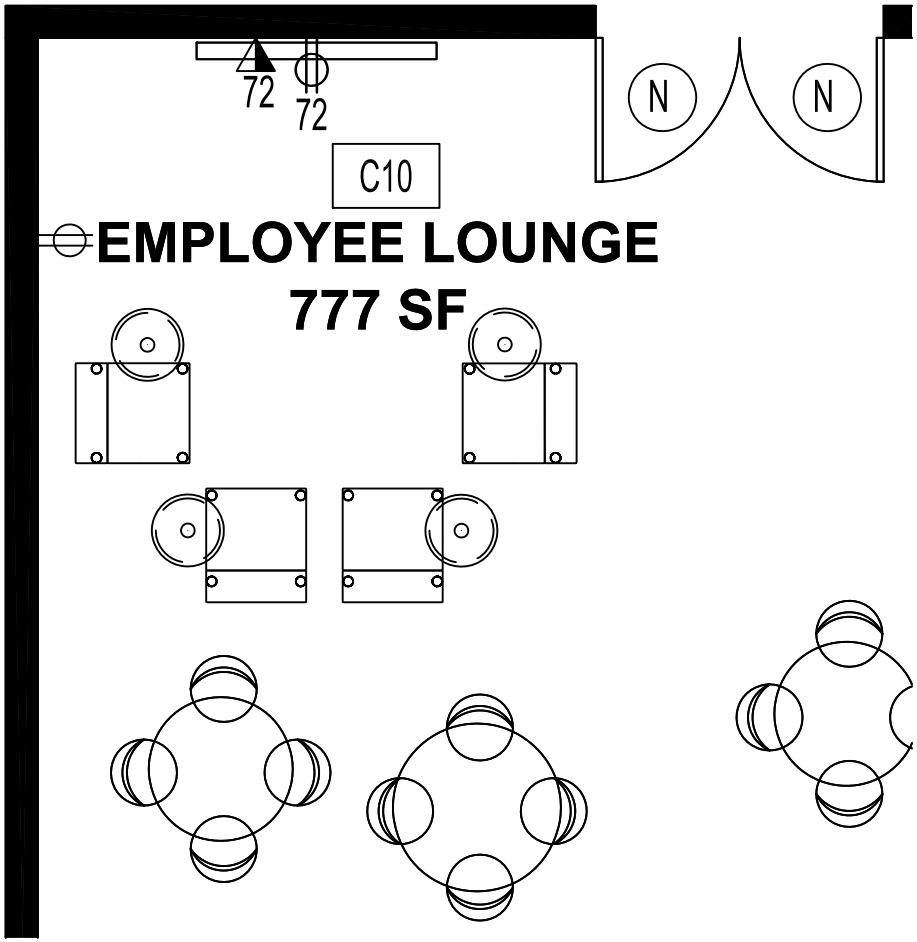
SCALE: 1/4"=1'-0" | DATE: 4/10/2014

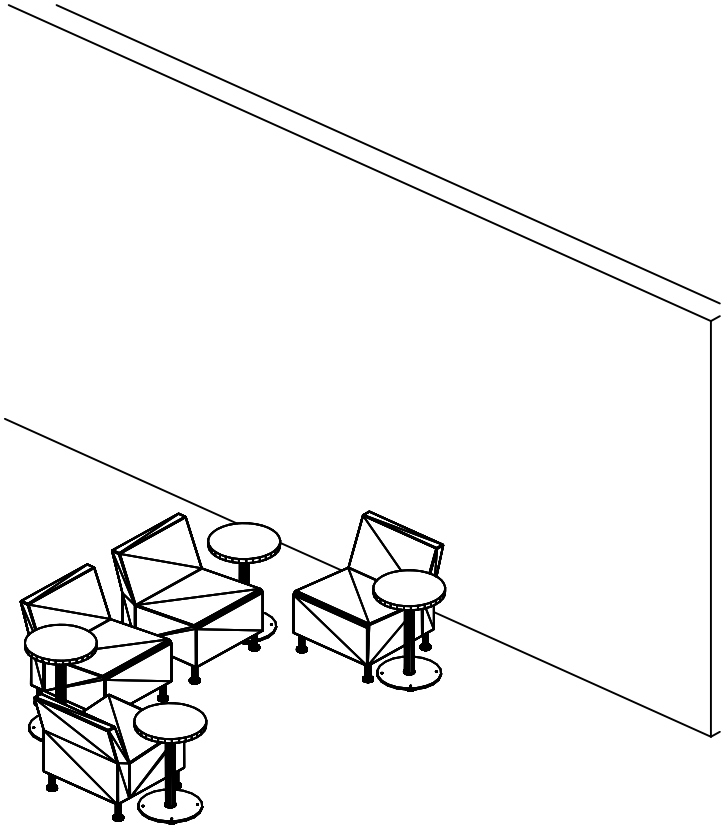
PROJECT#: 143-14 | DESIGNER: SBW | REV# :

Price Modern

MLK Library

EMPLOYEE LOUNGE





PLAN VIEW

3-D VIEW

SCALE: 1/4"=1'-0" | DATE: 4/10/2014

PROJECT#: 143-14 | DESIGNER: SBW | REV# :

Price Modern