

Project Name: UNIVERSITY OF CALIFORNIA, MERCED
STUDENT SERVICES BUILDING (SSB)
Project Number: 900120

ADDENDUM NO. 5

To the

CONTRACT DOCUMENTS

June 22, 2012

- I. Bidder acknowledges that it is the Bidder's responsibility to ascertain whether any Addenda have been issued and if so, to obtain copies of such Addenda. Bidder therefore agrees to be bound by all Addenda that have been issued for this bid.

This Addendum forms a part of the Contract Documents and modifies the original Bidding Documents. The following changes, additions, or deletions have been made to the following documents as indicated and all other Contract Documents shall remain the same.

II. CLARIFICATIONS

A. PRE-BID QUESTIONS – Questions received from bidders and responses are as follows:

1. Q: The Room Finish Schedule on A10.01, is calling out "F5" for the flooring for Room No. 217. F5 is not listed on the Finish Code List, please clarify?

A: The finish should be "F4". Schedule will be reissued in addendum.

2. Q: Please clarify the height of the Plastic Panels (FRP)/066400 in the Janitor rooms. I am not finding any interior elevations for these rooms, the specifications call out a width of 4'-0" and a length as indicated on the drawings. As noted, no elevations found for the rooms that have the FRP wall finish.

A: Refer to Standard Interior Detail 27/A9.01.

3. Q: Specification Sections 096500/Resilient Flooring and 096800/Carpeting, 3.1, Examination, both call out the following: "Contingency for High Moisture Readings: Report all unacceptable test results to University". Please clarify the intent of this notation. The contract documents do not specify any sort of vapor emission system such as Koester/Floor Seal Technology., etc.. for the concrete slabs. Since there is no contingency or allowance called out in the contract documents, we assume this "contingency" noted is being carried by the University. Please clarify.

A: Section 07 26 13 Concrete Moisture and Alkalinity Control specification is included as part of this addendum. Contractor is to provide a unit price for this scope of work.

4. Q: In Addendum No. 3, Question 21 requested additional time to finalize the (17) seventeen alternates. The response that with a 6 week bid period the GC's need to advise their potential subcontractors the entire bid needs to be submitted by the deadline. The problem with this is that no GC knows all of the subcontractors who may be bidding the project. The other problem with this many alternates is that it is not known who the low subbid may be until the last 15 minutes of the bid. Once that is determined, you need to have time to incorporate their bid amount into the total bid and write the name of the sub on the sublist and maybe the sublist as it applies for the alternate pricing. Alternates are certainly a part of the bidding process, but to have (17) to deal with on bid day is beyond difficult. Any way the number of alternates can be reduced?

A: The number of bid alternates is not going to change. Bids are due on or before 2:00 PM June 28, 2012.

5. Q: Requesting clarification on the requirements in Specification Section 014340/Exterior Enclosure Performance Requirements. It is typical to provide shop drawings/structural calculations for an item such as the curtain walls and or metal stud framing. This specification seems to require a complete structural analysis be provided by the GC on the building with all of the exterior enclosure components. Hasn't the structural engineer already provided this during his design of the structure? Please clarify.

A: Engineering design responsibility per specification section 01 43 40 is for the Exterior Enclosure only. Design of the buildings' vertical and lateral force resisting systems such as columns, beam, braces, foundations, etc, is the responsibility of the structural engineer of record.

6. Q: Spec section 12 93 00, 2.3A identifies the manufacturer as Creative Pipe; plan sheet E0.05, Exterior Light Fixture Schedule, F-3 identifies the manufacturer as Allscape. Which is correct?

A: Please refer to E0.05 - Exterior light fixture schedule in Addendum 5.

7. Q: Plan sheet L1.0 shows light bollards; 7 in one location (the note states 9) and 4 in another location. Plan sheet E1.01 shows 8 in one location and 6 in the other. Please clarify.

A: Please refer to updated E1.01 in Addendum 5 for quantities.

8. Q: On sheet C3.1, the horizontal control plan, they show an area that is to be done in phase 4. A copy is attached. Are we to exclude any work in this area?

A: No, the limits of the scopes of work for the Student Services Building project and the University's separate Phase 4 project are clarified in revised plans issued in Addendum 5.

9. Q: Please provide any Insurance Underwriter's design requirements that are not addressed in the referenced specification section.

A: The fire sprinkler design will be submitted to FM Global for review. Final FM Global recommendations and fire sprinkler design acceptability shall be determined by the Designated Campus Fire Marshal.

10. Q: The additional protection addressed in General Notes A & I on Sheet P2.11 exceeds code and State Fire Marshal requirements for the construction type indicated; will the Campus Fire Marshal require these items as part of the fire sprinkler system design for both buildings?

A: The Campus Fire Marshal requires sidewall sprinkler heads along the entire length of the exterior wall of the 3-story building ground level arcades, and second and third level exterior balconies (not stairs). There are no sprinkler requirements under the pavilion metal grid shade canopy.

11. Q: Is Freeze protection required for exposed fire sprinkler piping installed at the exterior of the buildings? If so, please address the acceptable methods and provide any applicable specifications.

A: Provide dry-type, sidewall sprinkler heads suitable for exterior installation, as Typco DS-1 Stainless Steel or equal.

12. Q: The equipment listed is part of the controls for a pre-action dry pipe system, though a system type is not specified in any portion of the contract documents; is wet pipe system acceptable for both buildings?

A: Provide wet pipe sprinkler systems in both buildings. There is no pre-action system in any of the two buildings.

13. Q: What degree of accommodation will be required of the fire sprinkler piping on the 3rd floor of the Student Services Building for future alterations to add Private Offices 310A and 310E?

A: No fire sprinkler system accommodations are required for the future alterations in Student Services Suite 310 for the five future offices. When the future offices are built, the sprinkler system will need to be adjusted. Revised design for Room 310 is included as part of addendum 5.

14. Q: On RCP where shades are noted, didn't see an M1 note (Single Motorized), saw M2 and S.

A: Please refer to updated Reflected Ceiling Plans in Addendum 3 and 5.

15. Q: Will the Campus Fire Marshal require fire protection inside the raised platforms referenced? If so, are fire sprinklers or noncombustible insulation preferred?

A: There does not need to be sprinklers under the platform as long as the space is totally enclosed and has no capability of storage placed under the platform.

16. Q: Mounting details A8.11 #2 & #19, didn't see any pocket details or any RCP notes showing a recessed pocket noted. Spec 12 24 00 2.1 C #1 mentions pockets.

A: Mounting details should follow details 2& 19/A8.11.

17. Q: Where they have M2 double shades, what do they want on the doors (manual blackout 0700)?

A: Shades will be stopped at the top of the door. Doors and their sidelights will be provided with glass film, no shades are needed. Glass film on door sidelights is clarified in Addendum 5.

18. Q: Detail 9/S4.05 is not clearly located anywhere on drawings. Do we assume this occurs at every beam to column location at all BRB frames? Please clarify.

A: Yes, as the detail is typical it occurs at every BRB frame column at every level. BRB frame columns are those columns that show and are labeled in the BRB Frame Elevation sheets, S4.01 and S4.02. BRB frame beams are those beams that show and are labeled in the BRB Frame Elevation sheets, S4.01 and S4.02.

19. Q: We are looking at the plumbing for this project and cannot find the plumbing insulation specifications. Please advice.

A: Refer to Section 23 07 00 for plumbing insulation. Specification revision is being issued as part of Addendum 5.

20. Q: Is there a minimum or average R-Value for the roof insulation under the PVC roofing?

A: The basis of design is an average R-38 roof insulation R-Value.

21. Q: Drawing M1.11, in the main building, show SAC Duct in 20in. diameter and 24in. diameter, as well as SAH duct size 36in. x 14in. Should these ducts be supplied in a fabric material Such as "Duct Sox" or equal?

A: See Spec 233113 paragraph 2.2 for information.

22. Q:

III. CHANGES TO BIDDING DOCUMENTS

A. BIDDING / CONTRACT DOCUMENTS AND DIVISION 1 SPECIFICATIONS –
VOLUME 1 OF 2

1. Specification Section 01 12 00.01.05 Bid Form: **DELETE** Bid Form and replace with Bid Form attached to this Addendum.
2. Specification Section 01 22 00 Unit Prices: **REVISE** paragraph 1.3 A to ADD Unit Price #2, Concrete Moisture & Alkalinity Control.
3. Specification Section 01 31 00 Project Coordination: **REVISE**
4. Specification Section 01 43 39 Mock-Ups: **REVISE** paragraph 1.1 A.1.b and **DELETE** paragraph 1.1 A.1c.

B. DIVISION 2 – 33 - VOLUME 2 OF 2

1. Table of Contents – Changes identified as (*Revision No. 3*)
2. Specification Section 05 12 00 Structural Steel Framing: **REVISE** paragraph 1.6 B.
3. Specification Section 05 12 50 Buckling-Restrained Braces: **ADD** paragraph 1.5 A.4.
4. Specification Section 05 20 00 Steel Joist: **ADD** paragraph 2.4 C.
5. Specification Section 07 26 13 Concrete Moisture & Alkalinity Control: **ADD** new specification section.
6. Specification Section 08 71 00 Door Hardware: **REVISE** Hardware Group 16.
7. Specification Section 08 80 00 Glazing: **REVISE** paragraph 2.7 A.
8. Specification Section 09 29 00 Gypsum Board: **REVISE** paragraph 2.3 E.
9. Specification Section 09 65 00 Resilient Flooring: **REVISE** paragraph 2.1 A.
10. Specification Section 10 14 00 Signage: **REVISE** paragraph 1.1 and paragraph 2.1 A 10.
11. Specification Section 12 93 00 Site Furnishing: **DELETE** entire section and **REPLACE** with new section attached to this Addendum.
12. Specification Section 21 12 00 Standpipes and Hose Valves: **REVISE** paragraph 1.2.
13. Specification Section 21 13 00 Fire Sprinklers: **REVISE** paragraph 1.2.
14. Specification Section 21 13 00 Fire Sprinklers: **REVISE** paragraph 1.4 K.

15. Specification Section 21 13 00 Fire Sprinklers: **REVISE** paragraph 2.5 A.
16. Specification Section 21 13 00 Fire Sprinklers: **REVISE** paragraph 2.9 C 4.
17. Specification Section 22 11 16 Domestic and Recycled Water Piping: **REVISE** paragraph 1.2.
18. Specification Section 22 12 16 Sanitary Waste and Vent Piping: **REVISE** paragraph 1.2.
19. Specification Section 22 14 16 Storm Drainage Piping: **REVISE** paragraph 1.2.
20. Specification Section 22 35 00 Domestic Water Heat Exchangers: **REVISE** paragraph 1.2.
21. Specification Section 23 05 00 Basic Mechanical Materials and Methods: **DELETE** entire section and **REPLACE** with new section attached to this Addendum which includes fire stopping system product literature.
22. Specification Section 23 05 29 Hanger and Supports: **ADD** paragraph 2.2 P and **REVISE** paragraph 2.3 A.
23. Specification Section 23 07 00 Mechanical Insulation: **ADD** paragraph 3.1 B.
24. Specification Section 23 07 00 Mechanical Insulation: **REVISE** paragraph 3.1 C, Application Schedule.
25. Specification Section 26 33 23 Central Battery Inverter System: **DELETE** entire section and **REPLACE** with new section attached to this Addendum.
26. Specification Section 27 41 13 Arch Integrated Projection Screens: **REVISE** paragraph 2.3, Projection Screen Schedule.
27. Specification Section 28 00 00 Basic Security Requirements: **DELETE** entire section and **REPLACE** with new section attached to this Addendum.
28. Specification Section 28 08 00 Security System Acceptance Testing: **DELETE** paragraph 1.1 C 6.
29. Specification Section 28 08 00 Security System Acceptance Testing: **REVISE** paragraph 3.2 4.
30. Specification Section 28 08 00 Security System Acceptance Testing: **REVISE** paragraph 3.5 D.1.
31. Specification Section 28 08 00 Security System Acceptance Testing: **DELETE** paragraph 1.1 C 6.
32. Specification Section 28 13 00 Access Control and Alarm Monitoring System: **DELETE** entire specification section. This section will not be replaced.
33. Specification Section 28 26 00 Security Communication System: **DELETE** entire section and **REPLACE** with new section attached to this Addendum.

34. Specification Section 32 18 00 Concrete Flatwork Finishes: **REVISE** paragraph 1.5 A.
35. Specification Section 32 18 00 Concrete Flatwork Finishes: **REVISE** paragraph 2.2 A.1.
36. Specification Section 32 90 00 Planting: **REVISE** paragraph 2.1 A.
37. Specification Section 32 90 00 Planting: **ADD** paragraph 2.2 F.

VI. DRAWINGS

A. DRAWING SHEET REVISIONS

1. Revised Drawing Lot is attached to Addendum 5

UNIVERSITY OF CALIFORNIA, MERCED

By: University of California, Merced
University's Representative

Leon Waller

Sr. Project Director

Enclosure:

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Drawings

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STUDENT SERVICES BUILDING
UNIVERSITY OF CALIFORNIA, MERCED
MERCED, CALIFORNIA

PROJECT NO.: 900120

BID FORM

FOR:

PROJECT NO. 900120
STUDENT SERVICES BUILDING

UNIVERSITY OF CALIFORNIA
MERCED CAMPUS, MERCED COUNTY
MERCED CALIFORNIA

BID TO:

PHYSICAL PLANNING, DESIGN & CONSTRUCTION
UNIVERSITY OF CALIFORNIA, MERCED
767 E. YOSEMITE AVE., SUITE C
MERCED CALIFORNIA 95340
TELEPHONE: (209) 228-0402

**FOR THE
FOLLOWING
WORK:**

Students Services Building Construction

BID FROM:

(Name of Firm Submitting Bid)

(Address)

(City) (State) (Zip Code)

(Telephone Number) (Fax Number)

(Date Bid Submitted)

Note: All portions of this Bid Form must be completed and the Bid Form must be signed before the Bid is submitted. Failure to do so will result in the Bid being rejected as non-responsive.

1.0 BIDDER'S REPRESENTATIONS

Bidder, represents that a) Bidder and all Subcontractors, regardless of tier, has the appropriate current and active Contractor's license required by the State of California and the Bidding Documents; b) it has carefully read and examined the Bidding Documents for the proposed Work on this Project; c) it has examined the site of the proposed Work and all Information Available to Bidders; d) it has become familiar with all the conditions related to the proposed Work, including the availability of labor, materials, and equipment. Bidder hereby offers to furnish all labor, materials, equipment, tools, transportation, and services necessary to complete the proposed Work on this Project in accordance with the Contract Documents for the sums quoted. Bidder further agrees that it will not withdraw its Bid within 60 days after the Bid Deadline, and that, if it is selected as the apparent lowest responsive and responsible Bidder, that it will, within 10 days after receipt of notice of selection, sign and deliver to University the Agreement in triplicate and furnish to University all items required by the Bidding Documents. If awarded the Contract, Bidder agrees to schedule and execute the Work within the Contract Time.

2.0 ADDENDA

Bidder acknowledges that it is Bidder's responsibility to ascertain whether any Addenda have been issued and if so, to obtain copies of such Addenda from University's Facility at the appropriate address stated on Page 1 of the Advertisement for Bids. Bidder therefore agrees to be bound by all Addenda that have been issued for this Bid.

3.0 (NOT USED)

4.0 LUMP SUM BASE BID

\$, , .

(Place figures in appropriate boxes.)

5.0 SELECTION OF APPARENT LOW BIDDER

Refer to the Instructions to Bidders for selection of apparent low bidder.

6.0 UNIT PRICES

Unit Price No. 1 - Provide and prepare ground floor door opening for power door operators.

\$, . x Per Door Opening

Unit Price No. 2 – Concrete Moisture & Alkalinity Control.

\$, . x 500 Square/feet

7.0 DAILY RATE OF COMPENSATION FOR COMPENSABLE DELAYS

Bidder shall determine and provide in the space below, the daily rate of compensation for any Compensable Delay caused by University at any time during the performance of the Work:

(MINIMUM AMOUNT ALLOWED IS \$1.00)

\$

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 .

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 x 10
multiplier
(Place figures in appropriate boxes.)

Failure to fill in a dollar figure for the daily rate for Compensable Delay shall render the bid non-responsive. **University will perform the extension of the daily rate times the multiplier.**

The daily rate shown above will be the total amount of Contractor entitlement for each day of Compensable Delay caused by University at any time during the performance of the Work and shall constitute payment in full for all delay costs, direct or indirect (including, without limitation, compensation for all extended home office overhead and extended general conditions), of the Contractor and all subcontractors, suppliers, persons, and entities under or claiming through Contractor on the Project. The number of days of Compensable Delay shown as a "multiplier" above is not intended as an estimate of the number of days of Compensable Delay anticipated by the University. The University will pay the daily rate of compensation only for the actual number of days of Compensable Delay, as defined in the General Conditions; the actual number of days of Compensable Delay may be greater or lesser than the "multiplier" shown above.

8.0 ALTERNATES

In order for a Bid to be responsive, Bidder must submit bid for Alternates listed below. The failure to do so shall result in the Bid being rejected as non-responsive.

ADD ALTERNATE #1

DESCRIPTION: 5-year Hydraulic Elevator maintenance agreement

Add

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ADD ALTERNATE #2

DESCRIPTION: NOT USED

Add

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ADD ALTERNATE #3

DESCRIPTION: Add Casework in Conference Room 238

Add

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ADD ALTERNATE #4

DESCRIPTION: Add Casework in Work Room 220

Add

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ADD ALTERNATE #5

DESCRIPTION: Add Finishes in Active Storage Room 110

Add

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ADD ALTERNATE #6

DESCRIPTION: Add Finishes in Active Storage Room 150

Add

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ADD ALTERNATE #7

DESCRIPTION: Add Benches and Trash and Recycling Receptacles (ADD 4)

Add

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ADD ALTERNATE #8

DESCRIPTION: Add Acoustical Panels to all Private Offices.

Add

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ADD ALTERNATE #9

DESCRIPTION: Remove & Replace Concrete Paving

Add

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DEDUCTIVE ALTERNATE #1

DESCRIPTION: Delete Pavilion Canopy Aluminum Grating

Deduct

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DEDUCTIVE ALTERNATE #2

DESCRIPTION: Delete Reclaimed Water Provisions

Deduct

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DEDUCTIVE ALTERNATE #3

DESCRIPTION: Delete 5 Skylights and Curbs at 3 Story Building

Deduct

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DEDUCTIVE ALTERNATE #4

DESCRIPTION: Reduce Glazing @ North & South Elevations of Pavilion Building

Deduct

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DEDUCTIVE ALTERNATE #5

DESCRIPTION: Delete Wall Partitions & Doors for Offices 221-226

Deduct

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DEDUCTIVE ALTERNATE #6

DESCRIPTION: Delete Pavers & provide Textured Concrete

Deduct

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DEDUCTIVE ALTERNATE #7

DESCRIPTION: Delete Exterior Operable Window & provide Fixed Windows

Deduct

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DEDUCTIVE ALTERNATE #8

DESCRIPTION: Delete 12 Skylights & Curbs at Pavilion Building

Deduct

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9.0 LIST OF SUBCONTRACTORS

Bidder will use Subcontractors for the Work: (Yes or No) _____

If yes, provide in the spaces below (a) the name and the location of the place of business of each subcontractor who will perform work or labor or render service to the Contractor in or about the construction of the work or improvement, or a subcontractor licensed by the state of California who, under subcontract to the Contractor, specifically fabricates and installs a portion of the work or improvement according to detailed drawings contained in the plans and specifications, in an amount in excess of 1/2 of 1 percent of the Contractor's total bid, (b) the portion of the work which will be done by each subcontractor. The Contractor shall list only one subcontractor for each such portion as is defined by the Contractor in its bid.

Work Activity	Subcontractor	
	Name	Location (City)

(Note: Add additional pages if required.)

10. LIST OF CHANGES IN SUBCONTRACTORS DUE TO ALTERNATES

The information below must be provided for all changes in first-tier Subcontractors if University selects Alternates. List changes in Subcontractors only for those portions of the Work valued in excess of 1/2 of 1% of Bidder's Total Bid.

Alternate No.	Work Activity	Subcontractor	
		Name	Location (City)

(Note: Add additional pages if required.)

11.0 BIDDER INFORMATION

TYPE OF ORGANIZATION:

(Corporation, Partnership, Individual, Joint Venture, etc.)

If a corporation, corporation is organized under the laws of:
the State of. _____

NAME OF PRESIDENT OF THE CORPORATION:

NAME OF SECRETARY OF THE CORPORATION:

IF A PARTNERSHIP, NAMES OF ALL GENERAL PARTNERS:

CALIFORNIA CONTRACTORS LICENSE(S):

(Name of Licensee)

(Classification)

(License Number)

(Expiration Date)

(For Joint Venture, list Joint Venture's license and licenses for all Joint Venture partners.)

12.0 REQUIRED COMPLETED ATTACHMENTS

The following documents are submitted with and made a condition of this Bid:

1. Bid Security in the form of Bid Bond or Certified Check
- 2.

13.0 DECLARATION

I, _____ (Printed name), hereby declare that I am the _____ (Title) of _____ (Name of bidder) submitting this Bid Form; that I am duly authorized to execute this Bid Form on behalf of Bidder; and that all information set forth in this Bid Form and all attachments hereto are, to the best of my knowledge, true, accurate, and complete as of its submission date.

I further declare that this bid is not made in the interest of, or on behalf of, any undisclosed person, partnership, company, association, organization, or corporation; that the bid is genuine and not collusive or sham; that the bidder has not directly or indirectly induced or solicited any other bidders to put in a false or sham bid, and has not directly or indirectly colluded, conspired, connived, or agreed with any bidder or anyone else to put in a sham bid, or that anyone shall refrain from bidding' that the bidder has not in any manner, directly or indirectly, sought by agreement, communication, or conference with anyone to fix the bid price of the bidder or any other bidder, or to fix any overhead, profit, or cost element of the bid price, or of that of any other bidder, or to secure an advantage against the public body awarding the contract of anyone interested in the proposed contract' that all statements contained in the bid are true; and, further, that the bidder has not, directly or indirectly, submitted his for her bid price or any breakdown thereof, or the contents thereof, or divulged information or data relative thereto, or paid , and will not pay any fee to any corporation, partnership, company association, organization, bid depository, or to any member or agent thereof to effectuate a collusive or sham bid.

I declare, under penalty of perjury, that the foregoing is true and correct and that this declaration was subscribed at: _____ (Name of City if within a City, otherwise Name of County), in the State of _____, on _____ (Date).

(Signature)

**SECTION 01 22 00
UNIT PRICES**

PART 1 - GENERAL

1.1 DESCRIPTION

- A. Unit Price quotations shall be inserted in the appropriate spaces in the Bid Form for each Unit Price item of Work described herein.
- B. Unit Prices stated in the Agreement shall be used to compute adjustments of the Contract Sum for approved Unit Price items of Work. Such adjustments shall be made by Change Order (Exhibit 9).
- C. Unit Prices shall include all labor, materials, tools, and equipment; all other direct and indirect costs necessary to complete the item of Work and to coordinate the Unit Price Work with adjacent Work; and shall include all overhead and profit. General Contractor shall accept compensation computed in accordance with the Unit Prices for work installed in place as full compensation for furnishing such Work.
- D. Compensation will be paid for those items of Work described in below, Unit Prices.

1.2 SPECIFIED WORK

- A. Applicable Sections of the Specifications describe the materials and methods required under the various Unit Price items of Work.

1.3 UNIT PRICES

- A. List of Unit Price Items and Descriptions

Unit Price No.	Description	Estimated Units
1	Provide and prepare ground floor door opening for power door operators.	4 Door Openings (ADD3)
2	Furnish & install Concrete Moisture & Alkalinity Control in accordance with specification section 07 26 13.	10,000 sq/ft (ADD5)

- B See Architectural and Electrical drawings for location and scope of work.

1.4 ADVANCED COORDINATION

- A. Immediately notify University's Representative when conditions require the use of Unit Price items of Work.
- B. The applicability of, measurement methods for, documentation of, and the final adjustment of the Contract Sum for Unit Price items of Work shall be determined by the University's Representative.
- C. After performing Unit Price items of Work as directed by University's Representative, General Contractor shall take necessary measurements in the presence of University's Representative and shall submit calculations of quantities to University's Representative for approval. General Contractor shall notify University's Representative 1 day in advance of taking measurements.

PART 2 - PRODUCTS (NOT USED)

PART 3 - EXECUTION (NOT USED)

END OF SECTION 01 22 00

SECTION 01 31 00
PROJECT COORDINATION

PART 1 - GENERAL

1.1 COORDINATION REQUIREMENTS

- A. General Contractor shall coordinate the Work and shall not delegate responsibility for coordination to any Subcontractor.
1. General Contractor shall anticipate the interrelationship of all Subcontractors and their relationship with the Work.
 2. General Contractor shall resolve differences or disputes between Subcontractors concerning coordination, interference, or extent of the Work between Sections.
 3. General Contractor shall coordinate the Work of Subcontractors so that portions of the Work are performed in a manner that minimizes interference with the progress of the Work.
 4. General Contractor shall not obstruct spaces and installations that are required to be clear by Applicable Code Requirements.
 5. General Contractor shall not cover any piping, wiring, ducts, or other installations until they have been inspected and approved and required certificates of inspection issued.
 6. General Contractor shall remove and replace all Work that does not comply with the Contract Documents. Repair or replace any other Work or property damaged by these operations with no adjustment of Contract Sum.
 7. General Contractor shall coordinate all portions of the Work requiring careful coordination in order to fit in space available. Before commencing such portions of the Work, prepare supplementary drawings for review by the University's Representative.
 8. General Contractor shall ensure that anchorage, blocking, joining, and other detailing are provided as required.
- B. Electrical and Mechanical Coordination
1. Routing and Coordination of overhead Mechanical, Fire Sprinkler, Plumbing and/or Electrical Installations
 - a. General Contractor shall schedule and coordinate the work of all **mechanical, fire sprinkler, plumbing, electrical, technology, structural steel, metal framing and acoustical ceiling** subcontractors having installation responsibilities within the ceiling **and shaft spaces**, with respect to the sequence of Work and the allocation of space among the trades. The planned sequence of Work in such areas and any proposed departure from it affecting or potentially affecting coordination of the overall installation shall be brought promptly, in writing, to the attention of the University's Representative.
 - b. **As soon as practical and in no case starting later than 15 days after the Notice To Proceed, the** General Contractor and Subcontractors shall participate in **a meeting for the** preparation of a coordinated 3-D Building Information Model (BIM) of the overhead mechanical, electrical, technology, fire protection and plumbing utilities

demonstrating how these utilities will fit within the designated ceiling and vertical shaft spaces. These utilities will be fully coordinated one with the other as well as with architectural and structural components of the building. The **metal framing** Subcontractor will provide input as to location of king studs and other wall and ceiling components which potentially impact placement of utilities. This effort shall be in accordance with the Coordination Process Article of the Instructions to Bidders. The **structural steel** Subcontractor shall provide a 3-D model of their work based on their approved shop drawings. Verify this scope.

- 1) **BIM layout models of all equipment, ductwork and piping shall be prepared at not less than a 3/8 scale and in the most current version of 3D CAD or BIM software format compatible with NavisWorks software. A listing of compatible formats can be found at <http://www.navisworks.com/en/support/formats>. The General Contractor shall establish standards governing model programs, coordinate system, communication and transfer protocols.**
- 2) **The resulting 3D models shall accurately show sequencing, routing, sizes and elevations of all ductwork, piping, equipment, registers, grilles, diffusers and similar features, as well as locations of all valves, dampers, services thermostats and all other items requiring access and maintenance. These models shall also accurately show structural and architectural components, including but not limited to beams, columns, walls, ceilings, doors and their types. Additionally, the General Contractor shall model any other major architectural and structural features as shown on their respective drawings or models. The design team's architectural and structural models will be available as supplementary information for coordination. The General Contractor shall within 30 days after the Notice To Proceed commence and manage the initial coordination with mechanical, plumbing, fire protection, security, telephone/data, audio/visual, casework, and electrical Subcontractors who shall then begin participating in regular BIM coordination meetings. The Subcontractors shall create their own models in adherence with the standards established in the initial BIM coordination meeting(s), including modeling accurate 3D routings, valves, access panels, switch panels, clearances, etc., as required. The updated models from all Subcontractors shall be uploaded via means established in the initial BIM coordination meeting on a weekly basis at minimum. The planned sequence of Work in such areas and any proposed departure from it affecting or potentially affecting coordination of the overall installation shall be brought promptly, in writing, to the attention of the University's Representative.**
- 3) **BIM Coordination Meetings: The General Contractor shall then prepare a preliminary composite of all models,**

incorporating all the information and BIM models provided by the Subcontractors. The composite model will then be reviewed during a series of BIM coordination meetings as directed by the General Contractor in coordination with the University's Representative, at which time all trades shall be represented by at least one project manager and one modeler in order to review and resolve any real or apparent inferences or conflicts. The General Contractor shall also have an active teleconference at all BIM coordination meetings for inclusion of the design team and University staff. In preparing the composite model, minor changes in duct, pipe or conduit routings that do not affect the intended function may be made as required to avoid conflicts. Items may not be resized, exposed, concealed or relocated without the University's Representative's written approvals. No changes shall be made in any wall or chase locations, soffit or ceiling heights, door swings or locations, window or other openings, or other features affecting the function or esthetic effect of the building. If conflicts or interferences cannot be satisfactorily resolved, the University's Representative shall be notified and their decision obtained. The composite BIM model need not be submitted as a whole, but they shall be submitted, in all cases, in ample time to avoid construction delay. The coordination model may lack complete data in certain instances pending receipt of shop drawings or fabrication models, but sufficient space shall be allotted for those items affected. When the final information is received, such data shall be promptly inserted in the composite model. All changes in the scope of work due to revisions formally issued and approved shall be shown on the composite model. All work on the coordination composite drawings shall be performed by competent modelers and shall be clear and fully usable. The University's Representative shall determine the acceptability of the BIM models.

- 4) **Composite BIM Model:** After all conflicts, interferences and associated issues are resolved, the General Contractor shall then develop a final composite model showing the agreed upon routing, layout and placement of all ductwork, conveyers, piping, conduit, valves, panels, lighting fixtures and all other major mechanical and electrical installations. In preparing the final composite model, any supplementary drawings shall be created as well to accurately communicate the as-built condition. Particular attention shall be given to the locations, size and clearances of all equipment items, shafts, soffits, ceilings, wall spaces and similar features. These final composite models and drawings shall then be signed off by each of the Subcontractors, indicating their awareness and agreement with the indicated routings, layouts and their interrelationship with the other work and

systems of all other Subcontractors. After sign-off, no unauthorized deviations will be permitted and if made without knowledge or agreement of the University's Representative, this unauthorized work will be removed and corrected by the General Contractor at no additional cost to the University. Furthermore, no extra compensation will be paid or additional time allowed relating to any system or component installed without proper coordination between all the trades involved. If any improperly coordinated work or work installed that is not in accordance with the approved coordinated composite model requires additional work by other trades, the costs of all such additional work shall be borne by the General Contractor.

- 5) Final Composite BIM Model and Drawings: After the final composite BIM model and associated drawings have been agreed upon and signed by the General Contractor and all Subcontractors, the General Contractor shall reproduce copies and distribute the BIM model/drawings for reference purposes to each of the participating Subcontractors and the University's Representative. Other Subcontractors responsible for supplementary composite drawings as previously indicated herein shall provide their information for the General Contractor's distribution. The University's Representative, General Contractor and each Subcontractor shall retain the record copies of final composite BIM models and drawings as working references. All shop drawings and fabrication models, prior to their submittal to the University and their design consultants, shall be compared with the record composite model/drawings and developed accordingly by the responsible Subcontractor. The General Contractor with the participation of Subcontractors shall be responsible for the up-to-date maintenance of their record copies of the composite model and to keep one copy available at the site. Any such revision to the composite model(s), which may become necessary during the progression of work shall be communicated to the General Contractor and shall be accurately recorded during construction and in a record model and associated drawings at the completion of work by the General Contractor. The University, the General Contractor and each Subcontractor shall utilize the composite BIM model and any subsequent revisions in the development of their as-built model and drawings.**
- c. Should unavoidable conflicts be encountered during the preparation or review of the Shop Drawings, or during construction, they shall be promptly brought to the attention of the University's Representative, in writing, for resolution.
- d. Where the Drawings are diagrammatic, showing only the general arrangement of the systems, General Contractor shall have responsibility for the fitting of materials and equipment to other parts of the equipment

and structure, and to make adjustments as necessary or required to resolve space problems, preserve service room, and avoid architectural and structural elements and the Work of other trades. General Contractor may be required to identify certain areas to relocate installations within the spaces depicted on the Drawings, e.g., ductwork may be shifted within the space shown to accommodate other systems. Such functional relocations shall not be deemed a change to the requirements of the Contract. In the event a major re-routing of a system appears necessary, General Contractor shall prepare and submit for approval, Shop Drawings of the proposed rearrangement.

- e. Because of the diagrammatic nature and small scale of the Drawings, all necessary offsets, adjustments, and transitions required for the complete installation are not shown. General Contractor shall carefully investigate the structural and finish conditions affecting all the Work and shall arrange such Work accordingly, furnishing such fittings, equipment, valves, accessories, etc., as may be required to meet such conditions, at no additional cost to the University.

PART 2 - PRODUCTS (NOT USED)

PART 3 - EXECUTION (NOT USED)

END OF SECTION 01 31 00

SECTION 01 43 39
MOCK-UPS

PART 1 - GENERAL

1.1 SUMMARY

- A. Section Includes: Requirements for full-size, physical assemblies that are constructed on-site or off-site as specified.
1. Construct mock-ups of the following:
 - a. Full-size composite exterior enclosure assembly constructed on site at location designated by University Representative.
 - b. Other material mock-ups required by various sections of the Specifications constructed either in place or at an on site at location designated by University Representative
 2. Design Concept: Mock-up is intended to permit verification of workmanship and visual qualities of the final completed installation.
 3. Mock-ups will be used:
 - a. To verify qualities of materials, and execution.
 - b. Field test composite exterior enclosure assembly mock-up to determine if system components and its integration with adjacent assemblies meet performance requirements.
 - c. To provide Exterior Enclosure Work with the opportunity to coordinate work.
 4. Review requirements specified in other appropriate Sections for specific mock-ups and for materials, methods, and additional sample submittal requirements.
 5. Accepted mock-up shall be used as a visual standard for the final installation.
- B. Related work not included in this section:
1. First-install mock-ups for products, systems, and finishes as specified in individual technical specification sections, which will become part of the completed Work.
- C. Related Sections:
1. Section 01 43 40 "Exterior Enclosure Performance Requirements"
 2. Section 05 12 30 "Architecturally Exposed Structural Steel Framing"
 3. Section 05 52 13 "Pipe and Tube Railings"
 4. Section 05 70 00 "Decorative Metal"
 5. Section 07 27 13 "Modified Bituminous Sheet Air Barriers."
 6. Section 07 42 13 "Metal Wall Panels"
 7. Section 07 62 00 "Sheet Metal Flashing and Trim."

8. Section 07 84 00 "Penetration Firestopping"
9. Section 07 92 00 "Joint Sealants"
10. Section 08 41 13 "Aluminum-Framed entrances and Storefronts."
11. Section 08 44 13 "Glazed Aluminum Curtain Walls"
12. Section 08 80 00 "Glazing"
13. Section 09 24 00 "Insulated Plaster System."
14. Section 09 29 00 "Gypsum Board"
15. Section 09 30 00 "Tiling"
- 16. Section 09 65 00 "Resilient Flooring"**
- 17. Section 09 77 23 "Fabric-Wrapped Panels"**
18. Section 09 91 13 " Exterior Painting"
19. Section 09 91 23 "Interior Painting"
- 20. Section 12 93 00 " Site Furnishings"**
21. Section 26 50 00 "Lighting Fixtures"
- 22. Section 27 41 16 " Integrated Audiovisual Equipment"**
- 23. Section 28 00 00 "Basic Security Requirements"**
- 24. Section 32 14 13 "Precast Concrete Unit Paving"**
- 25. Section 32 18 00 " Concrete Flatwork Finishes"**
26. Additional Sections as required for completion of mock-ups as specified or as shown on the Drawings.

1.2 REFERENCES

- A. The publications listed below form a part of this Section to the extent referenced. The publications are referred to in the text by the basic designation only.
- B. Unless otherwise noted, standards, manuals, and codes refer to the latest edition of such standards, manuals, and codes as of the date of issue of this Project Manual.
- C. Referenced Standards:
 1. ASTM E 1105 Standard Test Method for Field Determination of Water Penetration of Installed Exterior Windows, Skylights, Doors, and Curtain Walls, by Uniform or Cyclic Static Air Pressure Difference.

1.3 DESCRIPTION OF MOCK-UPS

- A. Composite Exterior Enclosure Assembly: Free-standing composite exterior enclosure assembly mock-up to be constructed at a location separate from the actual building and near the

Project site, as shown on the Drawings, or, if not shown, as directed by University's Representative.

1. This mock-up will be constructed "out of sequence" with respect to normal sequence of construction of component parts of the exterior enclosure to obtain approval by the University before commencing with the work represented by the composite exterior enclosure mock-up.
2. Provide finishes to match reviewed sample submittals.
3. Construct mock-up as shown on the Drawings.
4. Mock-up shall show:
 - a. Exterior wall assembly as specified in Division 05 Section "Cold-Formed Metal Framing", "Architecturally Exposed Structural Steel Framing (AESS)", "Decorative Metal", Division 07 "Modified Bituminous Sheet Air Barriers" and "Sheet Metal Flashing and Trim"
 - b. Insulated plaster system as specified in Division 09 Section "Insulated Plaster System."
 - c. Metal wall panels as specified in Division 07 Section "Metal Wall Panels",
 - d. Joint sealants as specified in Division 07 Section "Joint Sealants."
 - e. Flashings as specified in Division 07 Section "Sheet Metal Flashing and Trim."
 - f. Glazed-aluminum curtain wall systems as specified in Division 08 Section "Glazed-Aluminum Curtain Walls."
 - g. Aluminum windows as specified in Division 08 Section "Aluminum-Framed Entrances and Storefronts."
 - h. Glazing as specified in Division 08 Section "Glazing."
 - i. Portland cement plastering as specified in Division 09 Section "Portland Cement Plastering."

B. Site Concrete: Mock-up to be constructed at location near the Project Site, as directed by University Representative.

1. This mock-up will be constructed "out of sequence" with respect to normal sequence of construction to obtain approval by the University before commencing of work represented by the site concrete mock-up.

1.4 GENERAL REQUIREMENTS FOR MOCK-UPS

A. Maintain quality control over Work of various Section of Specifications, manufacturers, products, services, workmanship, and site conditions to produce mock-ups in accordance with the Contract Documents.

B. Pre-Installation Conference

1. Conduct pre-installation conference in accordance with Section 01 31 19 "Project Meetings."

2. Convene pre-installation conference at least one week prior to commencing work on Mock-ups.
- C. Workmanship:
1. Comply with standards specified in technical specification sections.
 2. Provide qualified personnel to produce mock-up of specified quality.
 - a. Use products, materials, finishes, fabrication methods, details, anchorage system, and construction methods identical with those required for the Work.
 - b. Use supervisor who will be involved in the actual construction.
 3. Secure mock-ups in place with positive anchorage devices designed and sized to withstand stresses, vibration, and tests.
 4. Provide finish to match approved samples.
- D. Assemble and erect complete, with specified attachment and anchorage devices, flashings, seals and finishes.
1. Anchorage and assembly shall conform to code requirements for seismic stability.
 2. Include, as part of the mock-up, required shoring and bracing to support mock-up.
 3. Coordinate mock-up construction with delivery and assembly of related materials and components to be included in each mock-up.
- E. Visual examination and testing of composite exterior enclosure assembly mock-up shall be completed prior to fabrication and installation of any component system.
- F. Correct work installed within the composite exterior enclosure assembly mock-up which is not acceptable to the University's Representative or does not pass testing requirements at no additional cost to the University. Correct subsequent installations elsewhere in the Work, which is not in accordance with the approved mock-up at no additional cost to the University.
- G. University's approval of component exterior enclosure assembly mock-up will not relieve the General Contractor of the responsibility for any deviations from the requirements of the Contract Documents unless the General Contractor has specifically informed the University's Representative in writing of any deviation at the time of the mock-up review and the University's Representative has given written approval of the specific deviation.
- H. Make necessary additions and modifications to the details shown on the Drawings as may be required to comply with specified performance requirements while maintaining the design concept.
- I. Maintain composite exterior enclosure assembly mock-up in a clean and undamaged condition during construction and dispose of mock-ups when no longer required as determined by University's Representative.

- J. Exterior Enclosure Mock-up support framing, seismic bracing, connections, and related hardware shall be designed under the direct supervision of a Professional Engineer experienced in the design of the work, registered and licensed in the state of California, using performance and design criteria and requirements specified in Section 01 43 39.

1.5 SUBMITTALS

- A. General: Review all Sections.
- B. Product data and samples for each component part of the exterior enclosure assembly as specified in each technical specification.
- C. Mock-up shop drawing: Submit detailed shop and erection drawings of component exterior enclosure assembly. Drawing shall include all large scale details for all components required for each composite exterior enclosure assembly mock-up, required supports, joint anchor assembly, sealant application, water collection and drainage systems, anchorage, and other required work to complete composite mock-up.
- D. Test Procedures: Prior to testing submit detailed test procedures, schedules, and reporting procedures.
- E. Test Reports: Submit test reports as required by testing requirements specified in this section.
- F. Submit structural calculations prepared and stamped by a Professional Engineer licensed in the state of California.

PART 2 - PRODUCTS

2.1 MATERIALS

- A. General: Except as otherwise specified, materials for mock-up shall be as shown and specified in the respective Specification Sections.

PART 3 - EXECUTION

3.1 EXAMINATION

- A. Examine site and area to receive mock-up and conditions under which mock-ups are to be constructed. Correct any deficiencies.

3.2 REVIEW AND ACCEPTANCE

- A. Upon completion of mock-up construction, notify University's Representative and make arrangements for review.

- B. Acceptable mock-ups shall become the standard of quality for the Work, as approved by University's Representative. Establish and document quality control standards for materials, fabrication, assembly and erection, including finishes, tolerances, sealant colors, and sealant applications.
- C. Maintain mock-ups in neat, clean, and "as-accepted" conditions.
- D. Mock-ups shall be completed and shall be approved by the University's Representative in writing, prior to commencing with Work.
- E. Modify the mock-ups, or construct new components if requested by the University's Representative, for further evaluation and until final acceptance is obtained.

3.3 TESTING OF COMPOSITE EXTERIOR ENCLOSURE ASSEMBLY

- A. Conduct testing in the presence of University Representative. Provide minimum one week prior notice of date and time of testing.
- B. Composite exterior enclosure assembly mock-up is subject to observation and inspection by University Representative throughout construction and testing.
- C. Construct test chamber in accordance with procedures and requirements of ASTM E 1105. Construct portable negative pressure enclosure unit sealed against the composite exterior wall mock-ups on the indoor side, and use suspended pipe grid with nozzles to supply the required water flow to the exterior of composite exterior wall mock-ups. Provide test enclosure equivalent in size to composite exterior wall mock-ups, unless directed otherwise. If required for the performance test, seal the south side of the mock-up. Provide air system, pressure measuring apparatus, and water-spray system in accordance with ASTM E 1105.
 - 1. Perform water penetration tests of the storefront, glazed aluminum curtain wall, and aluminum windows in accordance with procedures and requirements of ASTM E 1105, Procedure B with at least 3 cycles. Water-spray system shall deliver water uniformly against exterior surface of composite exterior wall mock-up at a minimum rate of 5 gallons per square foot per hour. Test pressure shall be an air pressure difference of 20 percent of design pressure, with minimum differential of 6.24 lbf/ft² (299 Pa) and maximum of 12.0 lbf/ft² (575 Pa).
 - 2. Perform a separate water penetration tests of the portland cement plaster assembly including wall system, sheathing, air barriers, including reveals, control joints, trim, and joints with adjacent materials using a modified ASTM E 1105 test for which no chamber test is required. Spray water into the mock-up at a rate of 5 gallons per square foot per hour for a period of 1.5 hours. Provide a thirty-minute drain period.
 - 3. Water Leakage: Water leakage is defined as any controlled water that appears on any normally exposed interior surfaces, that is not contained or drained back to the exterior, or that can cause damage to adjacent materials or finishes. Water contained within drained flashings, gutters, and sills is not considered water leakage.
 - 4. Prepare test reports as required by ASTM E 1105.

5. If water leakage occurs, revise and retest composite exterior wall mock-ups. Modifications must be realistic in terms of job conditions, must maintain standards of quality and durability, and are subject to review and action by Project Manager. Leave composite exterior wall mock-ups in place during installation of work
6. Approval of composite exterior wall mock-ups is a prerequisite for final approval of shop drawings.

3.4 AS-BUILT DRAWINGS

- A. Once mock-up testing is complete, provide As-Built Drawings documenting all deviations from the approved Shop Drawings and Construction Documents.

3.5 COMPLETION

- A. The mock-up must be approved in writing by the University's Representative prior to commencement of the Work.
- B. The mock-up may be rejected if the quality is inadequate or if it does not meet the intent of the Construction Documents. In the event that the mock-up is rejected, remove and replace it.
- C. Retain and maintain final approved mock-up during construction in an undisturbed condition as a standard for judging the completed Work.
- D. Except as otherwise specified, remove at no additional cost to the University, free-standing mock-ups which are not to be permanent prior to completion of Project but not before the work they are being used to judge has been accepted by the University's Representative.

END OF SECTION 01 43 39

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
		Addenda 3	Addenda 4	Addenda 5
A0.00	COVER SHEET	X	X	
A0.01	SHEET INDEX		X	
A0.02	PROJECT INFORMATION	X		
A0.03	PROJECT INFORMATION	X		
A0.04	UL LISTING REFERENCES	X		
A0.05	UL LISTING REFERENCES	X		
A0.06	UL LISTING REFERENCES	X		
A0.10	LOGISTICS SITE PLAN	X		
CIVIL				
C0.1	TITLE SHEET	X		
C0.2	EXISTING CONDITIONS (FOR REFERENCE ONLY)	X		
C1.1	DEMOLITION PLAN	X		X
C2.1	EROSION CONTROL PLAN	X		
C3.1	HORIZONTAL CONTROL PLAN	X		X
C4.1	GRADING PLAN	X		X
C5.1	UTILITY PLAN NORTH	X		X
C5.2	UTILITY PLAN SOUTH	X		X
C6.1	DETAILS			
C6.2	DETAILS	X		
C6.3	DETAILS			
C6.4	DETAILS	X		
C6.5	DETAILS	X		
LANDSCAPE				
L0.0	LANDSCAPE NOTES	X		X
L1.0	LANDSCAPE MATERIALS PLAN	X		X
L1.1	LANDSCAPE LAYOUT PLAN	X		X
L1.2	LANDSCAPE LAYOUT PLAN (ENLARGED)	X		X
L2.0	IRRIGATION PLAN	X		X
L2.1	IRRIGATION DETAILS	X		X
L3.0	PLANTING PLAN	X		X

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
L3.1	PLANTING DETAILS	X		X
L4.0	LANDSCAPE DETAILS - PAVING AND DRAINAGE	X		X
L4.1	LANDSCAPE DETAILS - FURNISHINGS	X		X
L4.2	LANDSCAPE DETAILS - FURNISHINGS	X		X
L4.3	LANDSCAPE DETAILS - FURNISHINGS	X		X
L4.4	LANDSCAPE DETAILS - FENCE	X		X
SITE UTILITIES				
UM0.01	MECHANICAL LEGEND AND ABBREVIATIONS			
UM1.01	MECHANICAL SITE PLAN (FOR REFERENCE ONLY)			
UM1.02	MECHANICAL SITE PLAN STUDENT SERVICES BUILDING	X		
UM2.01	EXISTING UTILITY TUNNEL MECHANICAL PLAN & DETAILS (FOR REFERENCE OONLY)			
UM2.02	EXISTING UTILITY TUNNEL MECHANICAL PLAN & DETAILS (FOR REFERENCE OONLY)			
UM2.03	EXISTING UTILITY TUNNEL MECHANICAL PLAN & DETAILS (FOR REFERENCE OONLY)			
UE1.01	ELECTRICAL SITE PLAN	X		
UE5.01	SINGLE LINE DIAGRAM	X		
UE7.01	ELECTRICAL SITE PLAN			
FIRE LIFE SAFETY				
FS0.01	FIRE SAFETY CODE COMPLANCE			
FS0.02	FIRE SAFETY CODE COMPLANCE			
FS1.01	EXIT DISCHARGE SITE PLAN			
FS2.01	GROUND FLOOR FIRE SAFETY PLAN			
FS2.02	SECOND FLOOR FIRE SAFETY PLAN			
FS2.03	THRID FLOOR FIRE SAFETY PLAN			
FS2.04	MECHANICAL EQUIPMENT LEVEL FIRE SAFETY PLAN			
ARCHITECTURAL				
A1.01	SITE PLAN	X		X
A2.11	FLOOR PLAN - GROUND FLOOR	X		
A2.12	FLOOR PLAN - SECOND FLOOR	X		
A2.13	FLOOR PLAN - THIRD FLOOR & ROOF	X		X
A2.21	SLAB PLAN - GROUND FLOOR	X		

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
A2.22	SLAB PLAN - SECOND FLOOR	X		X
A2.23	SLAB PLAN - THIRD FLOOR & ROOF	X		X
A2.31	SIGNAGE LOCATION - GROUND FLOOR	X		
A2.32	SIGNAGE LOCATION - SECOND & THIRD FLOOR	X		
A3.01	REFERENCE VIEWS			
A3.03	BUILDING ELEVATIONS	X		
A3.04	BUILDING ELEVATIONS	X		
A3.05	BUILDING ELEVATIONS - PAVILION	X		
A3.06	BUILDING SECTIONS	X		
A4.11	INTERIOR ELEVATIONS - PAVILION	X		X
A4.12	INTERIOR ELEVATIONS - GROUND FLOOR	X		X
A4.21	INTERIOR ELEVATIONS - SECOND FLOOR	X		X
A4.22	INTERIOR ELEVATIONS - SECOND FLOOR	X		
A4.31	INTERIOR ELEVATIONS - THIRD FLOOR	X		X
A4.41	RESTROOM ENLARGEMENTS - GROUND FLOOR	X		
A4.42	RESTROOM ENLARGEMENTS - SECOND & THIRD FLOOR	X		
A6.01	REFLECTED CEILING PLAN - GROUND FLOOR	X		X
A6.02	REFLECTED CEILING PLAN - SECOND & THIRD FLOOR	X		
A7.01	WALL SECTIONS			
A7.02	WALL SECTIONS			
A7.03	WALL SECTIONS			
A7.04	WALL SECTIONS			
A7.05	WALL SECTIONS			
A7.11	STAIR 1 - PLANS AND SECTIONS	X		
A7.12	STAIR 2 - PLANS AND SECTIONS	X		
A7.13	STAIR 3 - PLANS AND SECTIONS			X
A7.14	STAIR DETAILS	X		
A7.15	STAIR DETAILS	X		
A7.21	ENLARGED ELEVATOR PLANS AND SECTIONS	X		
A8.01	EXTERIOR DETAILS	X		X
A8.02	EXTERIOR DETAILS	X		
A8.03	TRASH ENCLOSURE & TRANSFORMER PAD	X		X
A8.04	TRASH ENCLOSURE	X		X

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
A8.11	EXTERIOR CLADDING DETAILS	X		
A8.12	EXTERIOR CLADDING DETAILS	X		
A8.15	EXTEIROR DETAILS - EXTERIOR STUD FRAMING	X		
A8.21	MOCK UP			
A9.01	INTERIOR DETAILS - STANDARDS	X		
A9.11	INTERIOR DETAILS - PARTITIONS	X		
A9.12	INTERIOR DETAILS - PARTITION FRAMING	X		
A9.13	INTERIOR DETAILS - PLATFORMS	X		X
A9.16		X		X
A9.21	INTERIOR DETAILS - DOORS AND ELEVATOR	X		
A9.31	INTERIOR DETAILS - CEILINGS	X		
A9.41	INTERIOR DETAILS - CASEWORK	X		
A9.61	SIGNAGE DETAILS	X		
A10.01	DOOR & ROOM FINISH SCHEDULE	X		X
STRUCTURAL				
S0.01	GENERAL NOTES	X		
S0.02	GENERAL NOTES		X	
S0.03	LOADING CRITERIA		X	
S2.01	MAIN BUILDING & CLASSROOM PAVILION LEVEL 1 FRAMING/FOUNDATION PLAN	X		
S2.02	MAIN BUILDING LEVEL 2 & CLASSROOM PAVILION ROOF FRAMING PLAN		X	
S2.03	MAIN BUILDING LEVEL 3 FRAMING PLAN	X		
S2.04	MAIN BUILDING ROOF FRAMING PLAN			
S3.01	TYPICAL CONCRETE DETAILS			
S3.02	TYPICAL CONCRETE DETAILS			
S3.03	TYPICAL FOUNDATION DETAILS	X		
S3.04	CONCRETE DETAILS	X		
S4.01	BRACED FRAME ELEVATIONS - MAIN BUILDING	X		
S4.02	BRACED FRAME ELEVATIONS - CLASSROOM PAVILION BUILDING			
S4.05	L.F.R.S. FRAME DETAILS		X	
S4.06	WELDED SEIMIC BRBF OPTION DETAILS		X	
S4.08	BRACE CONNECTION DETAILS		X	
S4.09	STEEL COLLECTOR DETAILS		X	

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
S5.01	TYPICAL STEEL DETAILS			
S5.02	TYPICAL STEEL DETAILS			
S5.03	TYPICAL STEEL JOIST DETAILS	X		X
S5.04	TYPICAL STEEL DECK & CONCRETE DETAILS		X	
S5.05	TYPICAL STEEL DECK & CONCRETE DETAILS	X		
S5.06	TYPICAL STEEL DECK & CONCRETE DETAILS		X	
S5.07	NON-FRAME STEEL COLUMN SCHEDULE & DETAILS			
S5.09	STEEL DETAILS			
S5.10	STEEL DETAILS	X		
S5.11	STEEL DETAILS		X	
S6.01	ROOF SCREEN ELEVATIONS - MAIN BUILDING			
S6.02	ROOF SCREEN ELEVATIONS - CLASSROOM PAVILION BUILDING	X		
S6.03	ROOF MEP SCREEN DETAILS	X		
S6.04	ROOF MEP SCREEN DETAILS			
S6.05	STAIR FRAMING - PARTIAL PLANS & DETAILS	X		
S6.06	STAIR DETAILS		X	
MECHANICAL				
M0.01	LEGEND, SYMBOLS, GENERAL NOTES & DRAWING LIST	X		X
M0.02	TITLE 24 DOCUMENTATION	X		
M0.03	TITLE 24 DOCUMENTATION	X		
M0.04	TITLE 24 DOCUMENTATION	X		
M1.11	GROUND FLOOR PLAN - HVAC	X		X
M1.12	SECOND FLOOR PLAN - HVAC	X		X
M1.13	THIRD FLOOR PLAN - HVAC	X		X
M1.14	PENTHOUSE PLAN - HVAC	X		
M2.11	GROUND FLOOR PLAN - PIPING	X		X
M2.12	SECOND FLOOR PLAN - PIPING	X		X
M2.13	THIRD FLOOR PLAN - PIPING	X		X
M2.14	PENTHOUSE PLAN - PIPING	X		
M3.01	SECTIONS	X		
M4.02	DETAILS	X		
M4.03	DETAILS	X		

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
M4.01	DETAILS			
M4.04	DETAILS			X
M4.05	DETAILS			
M4.06	DETAILS	X		
M4.07	DETAILS	X		
M4.08	DETAILS			
M4.09	DETAILS	X		
M5.01	SCHEDULES			
M5.02	SCHEDULES	X		
M5.03	SCHEDULES	X		
M5.04	SCHEDULES	X		X
M6.01	RISER FLOW DIAGRAMS	X		
M6.02	RISER FLOW DIAGRAMS	X		
M7.01	CONTROL DIAGRAMS	X		
M7.02	CONTROL DIAGRAMS	X		
M7.03	CONTROL DIAGRAMS	X		
M7.04	CONTROL DIAGRAMS			
M7.05	CONTROL DIAGRAMS	X		
M7.06	CONTROL DIAGRAMS			
M7.07	CONTROL DIAGRAMS			
M7.08	CONTROL DIAGRAMS	X		
M7.09	CONTROL DIAGRAMS	X		X
PLUMBING				
P0.01	LEGEND, SYMBOLS, GENERAL NOTES & DRAWING LIST	X		
P2.10	FOUNDATION PLAN - PLUMBING	X		X
P2.11	GROUND FLOOR PLAN - PLUMBING	X		X
P2.12	SECOND FLOOR PLAN - PLUMBING	X		X
P2.13	THIRD FLOOR PLAN - PLUMBING	X		X
P2.14	ROOF PLAN - PLUMBING	X		
P4.01	DETAILS	X		
P4.02	DETAILS			
P4.03	DETAILS			

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
P5.01	SCHEDULES	X		
P6.01	WATER RISER DIAGRAM	X		X
P6.02	WASTE AND VENT RISER DIAGRAM	X		
ELECTRICAL				
E0.01	LEGEND, SYMBOLS, GENERAL NOTES AND DRAWING LIST	X		X
E0.02	TITLE 24 COMPLIANCE DATA	X		
E0.03	TITLE 24 COMPLIANCE DATA	X		
E0.04	TITLE 24 COMPLIANCE DATA	X		
E0.05	LIGHT FIXTURE SCHEDULE & CONTROL DIAGRAMS	X		X
E1.01	SITE PLAN - ELECTRICAL	X		X
E2.01	SINGLE LINE DIAGRAM - NORMAL POWER	X		
E2.02	RISER DIAGRAM - LIGHTING CONTROL SYSTEM	X		
E2.03	RISER DIAGRAM - GROUNDING SYSTEM	X		X
E3.11	GROUND FLOOR PLAN - LIGHTING	X		X
E3.12	SECOND FLOOR PLAN - LIGHTING	X		X
E3.13	THIRD FLOOR PLAN - LIGHTING	X		X
E4.11	GROUND FLOOR PLAN - POWER	X		X
E4.12	SECOND FLOOR PLAN - POWER	X		X
E4.13	THIRD FLOOR PLAN - POWER	X		X
E4.14	ROOF PLAN - ELECTRICAL	X		X
E5.01	ENLARGED PLAN	X		X
E6.01	SCHEDULES - EQUIPMENT	X		
E6.02	SCHEDULES - PANELS	X		X
E7.01	DETAILS - POWER	X		
FIRE ALARM				
FA0.01	SYMBOLS, ABBREVIATIONS, GENERAL NOTES AND DRAWING LIST	X		X
FA3.11	GROUND FLOOR PLAN - FIRE ALARM	X		X
FA3.12	SECOND FLOOR PLAN - FIRE ALARM	X		X
FA3.13	THIRD FLOOR PLAN - FIRE ALARM	X		X
FA3.14	ROOF PLAN - FIRE ALARM	X		
FA5.01	RISER DIAGRAM - FIRE ALARM SYSTEM	X		

Drawing	Sheet Name	Revision 1	Revision 2	Revision 3
FA7.01	FA SYSTEM FUNCTION MATRIX AND MOUNTING DETAIL	X		
FA7.02	FA SYSTEM DETAILS			
FA7.03	FA SYSTEM DETAILS			
FA7.04	FA SYSTEM DETAILS	X		
TECHNOLOGY				
T0.01	TECHNOLOGY TITLE SHEET	X		
T0.02	TECHNOLOGY BACKBOX SCHEDULE	X		
T0.03	SCHEDULE - DOOR	X		
T0.10	PATHWAY RISER DIAGRAM	X		
T0.11	CABLE RISER DIAGRAM	X		
T0.20	AUDIOVISUAL PATHWAY DIAGRAMS	X		
T0.21	AUDIOVISUAL FUNCTIONAL DIAGRAMS	X		X
T0.22	AUDIOVISUAL FUNCTIONAL DIAGRAMS	X		
T0.23	AUDIOVISUAL FUNCTIONAL DIAGRAMS	X		
T1.01	SITE PLAN	X		
T2.11	GROUND FLOOR	X		
T2.12	SECOND FLOOR	X		
T2.13	THIRD FLOOR & ROOF	X		
T3.11	REFLECTED CEILING PLAN - GROUND FLOOR	X		X
T3.12	REFLECTED CEILING PLAN - SECOND FLOOR	X		
T3.13	REFLECTED CEILING PLAN - THIRD FLOOR	X		
T4.11	BDF - 1U1 ROOM PLANS	X		
T4.12	IDF - 2U2 ROOM PLANS	X		
T4.13	IDF - 1U5 ROOM PLANS	X		
T5.01	BONDING DETAILS	X		
T5.02	TELECOM ROOM INSTALLATION DETAILS	X		
T5.03	USER SPACE INSTALLATION DETAILS	X		
T5.10	INSTALLATION DETAILS	X		
T5.11	INSTALLATION DETAILS	X		