ADDENDUM NO. ONE

DATE: August 23, 2010
PROJECT NAME: MCDB
PROJECT LOCATION: Boulder Colorado
LB PROJECT NUMBER: LB # 100002496-01
SPECIFICATION: 14220

The following Addenda items are to be incorporated into the elevator specification prepared by Lerch Bates Inc., dated May 16, 2010:

Section 14220, 2.04 OPERATION

1. Add A. Approved non-proprietary microprocessor-based elevator controls and landing systems are as follows;
   (1) Computerized Elevator Controls Corporation
   (2) Elevator Controls Corporation
   (3) Motion Control Engineering
   (4) SmartRise
   (5) Galaxy
   (6) Original Equipment Manufacturers
      (a) Major Manufacturers equipment may be substituted with documentation confirming strict adherence to Section 14220, 3.08, A, 1-9.
         (i) KONE, Otis, ThyssenKrupp, Schindler

2. 14220 – 10 F. 6. Change: Provide controller with serial data link through RJ45 Ethernet connection and install all devices necessary to monitor items outlined in Section 2.12.

3. 2.12 – MONITORING. Change to read: “2.12 - MONITORING CAPABILITIES”.
   A. Elevator controls must be capable of being monitored by monitoring systems as determined by the University of Colorado Facilities Management
4. **Part 2.13 EXECUTION**

Add the following in its entirety:

**2.20 ACCEPTANCE REVIEW AND TESTS**

A. Review procedure shall apply for individual elevators, portions of groups of elevators, and completed groups of elevators accepted on an interim basis or elevators and groups of elevators completed, accepted, and placed into operation.

B. Contractor shall perform review and evaluation of all aspects of its work prior to requesting Consultant’s final review. Work shall be considered ready for Consultant’s final contract compliance review when all Contractor’s tests are complete and all elements of work or a designated portion thereof are in place and elevator or groups of elevators are deemed ready for service as intended.

C. Furnish labor, materials, and equipment necessary for Consultant’s review. Notify Consultant a minimum of five (5) working days in advance when ready for final review of elevator or group.

D. Consultants’ written list of observed deficiencies of materials, equipment, and operating systems will be submitted to Contractor for corrective action. Consultant’s review shall include as a minimum:

1. Workmanship and equipment compliance with Contract Documents.


3. Performance of following is satisfactory:
   
   a. Starting, accelerating, running
   
   b. Decelerating, stopping accuracy
   
   c. Door operation and closing force
   
   d. Equipment noise levels
   
   e. Signal fixture utility
   
   f. Overall ride quality
   
   g. Performance of door control devices
   
   h. Operations of emergency two-way communication device
   
   i. Operations of firefighters’ service
4 Test Results:
   a. In all test conditions obtain specified contract speed, performance times, stopping accuracy without re-leveling, and ride quality to satisfaction of Purchaser and Consultant. Tests shall be conducted under both no load and full load condition.
   b. Temperature rise in motor windings limited to 50° Celsius above ambient. A full-capacity one (1) hour running test, stopping at each floor for ten (10) seconds in up and down directions, may be required.

E. Performance Guarantee: Should Consultant’s review identify defects, poor workmanship, variance or noncompliance with requirements of specified codes and/or ordinances, or variance or noncompliance with the requirements of Contract Documents, Contractor shall complete corrective work in an expedient manner to satisfaction of Purchaser and Consultant at no cost as follows:
   1. Replace equipment that does not meet code or Contract Document requirements.
   2. Perform work and furnish labor, materials, and equipment necessary to meet specified operation and performance.

F. A follow-up final contract compliance review shall be performed by Consultant after notification by Contractor that all deficiencies have been corrected. Provide Consultant with copies of the initial deficiency report marked to indicate items which Contractor considers complete.

3.03 PURCHASER’S INFORMATION

A. Provide three sets of neatly bound written information necessary for proper maintenance and adjustment of equipment within 30 days following final acceptance. Final retention will be withheld until data is received by Purchaser and reviewed by Consultant. Include the following as minimums:
   1. Straight-line wiring diagrams of “as-installed” elevator circuits with index of location and function of components. Provide one set reproducible master. Mount one set wiring diagrams on panels, racked, or similarly protected, in elevator control room. Provide remaining set rolled and in a protective drawing tube. Maintain all drawing sets with addition of all subsequent changes. These diagrams are Purchaser’s property.
      a. Provide one (1) electronic copy of all required documentation
2. Written Maintenance Control Program (MCP) specifically designed for the equipment included under this contract. Include any unique or product specific procedures or methods required to inspect or test the equipment. In addition, identify weekly, bi-weekly, monthly, quarterly, and annual maintenance procedures, including statutory and other required equipment tests.

3. Lubrication instructions including recommended grade of lubricants.

4. Parts catalogs for all replaceable parts including ordering forms, price lists and ordering instructions.

5. Four sets of keys for all switches and control features properly tagged and marked.

6. Diagnostic test devices together with all supporting information / documentation necessary for interpretation of test data, fault code interpretation, manufacturers acronym definitions, adjustment parameters, troubleshooting of elevator system, and performance of routine safety tests.

7. The elevator installation shall be a design that can be maintained by any licensed elevator maintenance company employing journeymen mechanics, or University of Colorado qualified elevator maintenance personnel without the need to purchase or lease additional diagnostic devices, special tools, or instructions from the original equipment Contractor.

   a. At the request of the University of Colorado, Provide 8 hrs of onsite controller diagnostic training to University of Colorado qualified elevator maintenance personnel

   b. Provide onsite capability to diagnose faults to the level of individual circuit boards and individual discrete components for the solid state elevator controller.

   c. Provide a separate, detachable device, as required to the Purchaser as part of this installation if the equipment for fault diagnosis is not completely self-contained within the controller. Such device shall be in possession of and become property of the Purchaser.

   d. Installed equipment not meeting this requirement shall be removed and replaced with conforming equipment at no cost to the Purchaser.
Provide software upgrades and/or revisions during progress of the work, warranty period and a term of 10 years from the date of substantial completion.

End of Addendum No. ONE
MCDB PROJECT

University of Colorado
Boulder