

AIRFIELD PAVEMENT WEATHER SENSORS PROJECT SIA PROJECT #16-41-1869

Addendum No. 2

DATE OF ADDENDUM: August 11, 2016

The following changes, additions, and/or deletions are considered as Addendum No. 2, and are hereby made a part of the contract documents. All bidders are required to base their bid upon the information furnished in this addendum; and as required in the contract documents. The Contractor is required to acknowledge Addendum No. 2 in their company proposal. Failure to acknowledge addendum on the bid form will result in bid being declared non-responsive.

Bid records will be available for public inspection after issuance of the notice of intent to award or the award of the contract. Bidder should contact the Airport to arrange an appointment to review the bid record.

The bid opening date scheduled for **Tuesday**, **August 16**, **2016 at 1:00 pm** in the Spokane International Airport Board Room has <u>not</u> changed.

Attached are the following documents, to be acknowledged with each contractors bid package as part of Addendum <u>No. 2</u>.

Attachments to this addendum are as follows:

• Bidders Question Log #1 (3 pages)

CHANGES, ADDITIONS, DELETIONS AND/OR CLARIFICATIONS TO THE CONTRACT DOCUMENTS:

SPECIFICATIONS

SECTION 02505 (ITEM P-605), JOINT SEALANTS FOR PAVEMENTS

In Section 2.1, Joint Sealants, DELETE the second paragraph and REPLACE it with:

"Cold-applied joint sealants for concrete pavements shall meet the requirements of ASTM D5893, Cold Applied Silicone Joint Sealant for PCC pavements.

Hot-applied joint sealants for concrete pavements shall meet the requirements of ASTM D6690, Joint and Crack Sealants, Hot Applied, for Concrete and Asphalt Pavements; Type IV.

Hot-applied joint sealants for asphalt pavements shall meet the requirements of ASTM D6690, Joint and Crack Sealants, Hot Applied, for Concrete and Asphalt Pavements; Type I, II, III, or IV."

SECTION 16850, RUNWAY WEATHER INFORMATION SYSTEM

In Section 2.3.C, Classifying Precipitation and Visibility Sensor, Item 1, CHANGE the first sentence to read:

"The Contractor shall supply and install two (2) classifying precipitation sensors, one at each weather station, at approximately 6 feet above ground, as recommended by the equipment vendor."

In the remainder of Section 2.3.C, CHANGE "the sensor" to read "each sensor".

In Section 2.3.D, Precipitation Occurrence Sensor, Item 1, CHANGE the first sentence to read: "The Contractor shall supply and install two (2) precipitation occurrence sensors (yes/no sensors), one at each weather station, at approximately 6 feet above ground, as recommended by the equipment vendor."

In the remainder of Section 2.3.D, CHANGE "the sensor" to read "each sensor".

In Section 2.3.E, Air Temperature / Relative Humidity Sensor, CHANGE Item 1 to read: "The Contractor shall supply and install two (2) combined air temperature / relative humidity sensors, one at each weather station, at approximately 6 feet above ground, as recommended by the equipment vendor."

In the remainder of Section 2.3.E, CHANGE "the sensor" to read "each sensor".

In Section 2.3.F, Heated Ultrasonic Wind Speed / Direction Sensor, Item 1, CHANGE the first sentence to read:

"The Contractor shall supply and install two (2) ultrasonic wind sensors, one at each weather station, at approximately 8 feet above ground, as recommended by the equipment vendor."

In the remainder of Section 2.3.F, CHANGE "the sensor" to read "each sensor".

In Section 2.3.G, Barometric Pressure Sensor, Item 1, CHANGE the first sentence to read: "The Contractor shall supply one (1) pre-installed solid-state barometric pressure sensor, DIN rail mounted inside South Weather Station #813, at a height recommended by the equipment vendor."

In Section 2.3.H, Solar Radiation Sensor, Item 1, CHANGE the first sentence to read: "The Contractor shall supply and install one (1) solar radiation sensor at the South Weather Station #813, at approximately 6 feet above ground, as recommended by the equipment vendor."

In Section 2.3.I, Ultrasonic Snow Depth Sensor, Item 1, CHANGE the first sentence to read: "The Contractor shall supply and install two (2) ultrasonic snow depth sensors, one at each weather station, at approximately 6 feet above ground."

SECTION L-110, AIRPORT UNDERGROUND ELECTRICAL DUCT BANKS & CONDUITS

In Section 110-2.3, Plastic Conduit, second paragraph, DELETE items 'a' and 'b' regarding Schedule 40 PVC.

GENERAL NOTES / CLARIFICATIONS

• Questions from Bidders, posed outside the Pre-Bid Conference, are attached, along with the Engineer's response.

End of Addendum No. 2

BIDDERS QUESTION LOG #1

- PROJECT TITLE: Spokane International Airport Airfield Pavement Weather Sensors Project SIA Project #16-41-1869
- OWNER: Spokane Airports
- ENGINEER: T-O Engineers, Inc. 121 West Pacific Avenue Spokane, WA 99201 (509) 319-2580

Date of Question(s):	August 5 & August 8, 2016
Person:	Terry Den Boer
Company:	Colvico, Inc.

Person Responding: Chris Mansfield (T-O Engineers) and Zachary McMackin (Trindera)

QUESTIONS & ANSWERS:

Note: Questions 1 thru 6 were addressed in the Pre-Bid Conference. See Addendum 1.

- Q7: How many total pavement sensors do you see, 12?
- A7: Yes, twelve (12) pavement sensors, including one (1) sub-surface temperature probe with Sensor #801.
- Q8: How many sub-probe sensors do you see? I would recommend locating one sub-probe at Weather Station #804. It is required in order to get the ice-break model.
- A8: One (1) sub-surface temperature probe is required at Sensor #801, per Plan Sheets 9 and 13.
- Q9: The pavement sensor installation drawing is wrong in the plans. I have attached the correct pavement and sub-surface sensor instructions.
- A9: Pavement sensors to be installed per the manufacturer's recommendations, per note in bottom-right corner of Plan Sheet 22.
- Q10: How many pavement sensors connect to South Weather Station, 4?
- A10: As depicted on the plans, Weather Station #813 has four (4) pavement surface sensors including one (1) sub-surface pavement sensor.
- Q11: How many pavement sensors connect to the North Weather Station, 8?
- A11: As depicted on the plans, Weather Station #814 has a total of eight (8) pavement surface sensors.
- Q12: How many total feet of Type V cable will you need based on one run per sensor, and one run for sub-probe.
- A12: Material take-off quantities are responsibility of bidding party and may be derived from plan sheets 10 through 20.

QUESTIONS & ANSWERS (cont'd):

- Q13: What atmospheric sensors go on North Weather Station?
- A13: Atmospheric sensors for each weather station are indicated in Specification 16850, section 2.2 and section 2.3.C through 2.3.I. See Addendum #2 for changes to Specification 16850.2.3. Also see responses to Q16, Q18, and Q19.
- Q14: What atmospheric sensors go on South Weather Station?
- A14: Atmospheric sensors for each weather station are indicated in Specification 16850, section 2.2 and section 2.3.C through 2.3.I. See Addendum #2 for changes to Specification 16850.2.3. Also see responses to Q15 thru Q19.
- Q15: Do they want 2 solar radiation sensors or 1? If they even want this sensor, 1 is plenty good enough.
- A15: One (1) solar radiation sensor is sufficient and shall be part of South Weather Station #813. See Addendum #2 for changes to Specification 16850.2.3.H.
- Q16: Do they want 2 snow depth sensors or 1? If they even want this sensor, 1 is good enough.
- A16: Two (2) ultrasonic snow depth sensors are requested: one for each weather station. See Addendum #2 for changes to Specification 16850.2.3.I.
- Q17: Do they want 2 barometric pressure sensor or 1? One is plenty good enough.
- A17: One (1) barometric pressure sensor is sufficient and shall be part of South Weather Station #813. See Addendum #2 for changes to Specification 16850.2.3.G.
- Q18: They want 1 PWD12 present weather sensor on one weather station, and 1 DRD11a yes/no precipitation sensor on the other station, correct?
- A18: A visibility/present weather sensor is requested for each weather station, and a precipitation occurrence sensor is requested for each weather station. See Addendum #2 for changes to Specification 16850.2.3.C and 2.3.D, respectively.
- Q19: Both weather stations would WMT702 get ultrasonic wind and HMP155 relative humidity/air temperature, correct?
- A19: Correct. Each weather station is to have one (1) ultrasonic wind speed/direction sensor and one (1) air temperature/relative humidity sensor. See Addendum #2 for changes to Specification 16850.2.3.F.
- Q20: The sub-surface probe normally installs at the same location as one of the surface sensors. It appears the 12th sensor location is a sub-surface sensor?
- A20: Per Note N3 on Sheet 13, Sensor #801 consists of a pavement sensor and an underground temperature probe.
- Q21: The pavement sensor installation drawing is wrong in the plans. I have attached the correct pavement and sub-surface sensor instructions. Please verify with airport that it is OK to use these instructions.
- A21: Pavement sensors to be installed per the manufacturer's recommendations, per note in bottom-right corner of Plan Sheet 22.

QUESTIONS & ANSWERS (cont'd):

- Q22: Is the Pvc conduit called out in bid items to be schedule 80 or schedule 40. The specs call for either, but a few of the details on the drawings call out schedule 80. Please clarify.
- A22: For Bid Items 18 through 22, PVC Conduit shall be Schedule 80. See Addendum #2 for changes to Specification L-110.

Date of Question 23:	August 10, 2016
Person:	Marlin (?)
Company:	Unknown

- Q23: What specific type of ASTM D6690 joint sealant is required in the pavement areas?
- A23: Hot poured joint sealants in concrete pavements shall conform to ASTM D6690 Type IV. Hot poured joint sealants in asphalt pavements shall conform to ASTM D6690 Type I, II, III, or IV. See Addendum #2 for changes to Spec Section 02525 (Item P-605).