



UNITED STATES
CIVILIAN BOARD OF CONTRACT APPEALS

CBCA 5540 GRANTED;
CBCA 5541 DISMISSED;
CBCA 6037 DENIED: May 16, 2018

CBCA 5540, 5541, 6037

MARE SOLUTIONS, INC.,

Appellant,

v.

DEPARTMENT OF VETERANS AFFAIRS,

Respondent.

James R. Mall of Meyer, Unkovic & Scott LLP, Pittsburgh, PA, counsel for Appellant.

Neil S. Deol, Office of General Counsel, Department of Veterans Affairs, Decatur, GA, counsel for Respondent.

Before Board Judges **ZISCHKAU**, **RUSSELL**, and **O'ROURKE**.

O'ROURKE, Board Judge.

The Department of Veterans Affairs (VA) issued solicitation number VA244-14-B-0079 for the construction of a two-story parking garage at the VA Medical Center (VAMC) in Erie, Pennsylvania. Attached to the solicitation were 1832 pages of specifications and 172 pages of drawings developed by the VA's design services contractor, Westlake Reed Leskosky (WRL or AE).¹ A public bid opening was held on March 27, 2014. On May 6,

¹ WRL is the architect-engineering (AE) firm that developed the design for the garage. Exhibit 121 (all exhibits are found in the appeal file unless otherwise noted).

2014, the contract was awarded to Mare Solutions, Inc. (Mare), a service-disabled, veteran-owned small business in Pittsburgh.

When the project was nearly complete, two disputes arose between the parties, one involving buckled metal conduit on the first floor ceiling of the garage and the other regarding which party was responsible for purchasing “head-end” equipment for the video surveillance system. The contracting officer (CO) issued final decisions on both issues, which Mare disagreed with and timely appealed to the Board. Mare sought declaratory relief in both appeals, requesting an interpretation of the contract’s terms that absolved it of liability for the buckled conduit and for the purchase of head-end equipment. Those appeals, dated November 7, 2016, were docketed as CBCA 5540 and CBCA 5541.

During a hearing in May 2017, Mare testified that it had purchased and installed the head-end equipment and now sought reimbursement for the equipment costs. The buckled conduit, on the other hand, remained a live performance dispute. The Board raised concerns about its jurisdiction to decide the video equipment dispute since a monetary claim was never presented to the contracting officer. To resolve those concerns, Mare filed a claim for the costs of the equipment on February 9, 2018. The contracting officer denied the claim, and Mare filed a third appeal at the Board on February 16, 2018. That appeal was docketed as CBCA 6037. All three appeals were consolidated and are decided here.

Findings of Fact

I. The Buckled Conduit – CBCA 5540

The dispute over the buckled conduit primarily involved whether expansion couplings² should have been installed on the conduit. Although the contract included specifications for expansion couplings, the parties disagreed on whether the conditions requiring their installation were present in the parking garage.

A. Specifications, Drawings, and Relevant Contract Terms

Specification 26 05 11, part one, paragraph 1.1.B (Requirements for Electrical Installations) required the contractor to “[f]urnish and install electrical wiring, systems, equipment and accessories in accordance with the specifications and drawings.” Paragraph

² An expansion coupling is “an electrical fitting for a conduit run that would allow for expansion . . . on the conduit run.” Transcript at 79.

1.2.A (Minimum Requirements) established the National Electrical Code (NEC) as a minimum standard for installation of the conduit.³ Exhibit 1 at 1031.

Specification 26 05 33 (Raceway and Boxes for Electrical Systems) called for the “furnishing, installation, and connection of conduit, fittings, and boxes, to form complete, coordinated, grounded raceway systems” throughout the garage. Conduit was defined as “any or all of the raceway types specified.” Exhibit 1 at 1063. Part two of the specification identified the following products for use relevant to conduit and expansion couplings:

C.6. Surface metal raceway fittings: As recommended by the raceway manufacturer. Include couplings, offsets, elbows, expansion joints, adapters, hold-down straps, end caps, conduit entry fittings, accessories, and other fittings as required for [a] complete system.

C.7. Expansion and deflection couplings: . . . b. Accommodate a 0.75 in [19mm] deflection, expansion, or contraction in any direction, and allow 30 degree angular deflections.

Id. at 1066-67. Part three of the specification addressed the installation of conduit. Paragraph 3.9 focused specifically on expansion couplings, stating:

A. Conduit 3 in [75mm] and larger that are secured to the building structure on opposite sides of a building expansion joint^[4] require expansion couplings. Install the couplings in accordance with the manufacturer’s recommendations.

B. Provide conduit smaller than 3 in [75mm] with junction boxes on both sides of the expansion joints. Connect conduit to junction boxes with sufficient slack of flexible conduit to produce 5 in [125mm] vertical drop midway between the ends. Flexible conduit shall have a bonding jumper installed. In lieu of this flexible conduit, expansion and deflection couplings as specified above for conduit 15 in [375mm] and larger are acceptable.

C. Install expansion and deflection couplings “where shown.”

³ Article 300, paragraph 300.7 states “[r]aceways shall be provided with expansion fittings where necessary to compensate for thermal expansion and contraction.”

⁴ A building expansion joint is not the same as an expansion coupling. An expansion joint is a section of a building that allows the building to move. Transcript at 80.

Id. at 1071-72. None of the drawings attached to the solicitation showed any conduit runs, expansion couplings, or fasteners. The layout of conduit runs was determined in the field by the installers, which was typical in the industry. The drawings showed expansion joints only in the area of the stairwells. None of the buckled conduit runs crossed those expansion joints. Transcript at 79, 83-85.

Contract clause FAR 52.236-21, Specifications and Drawings for Construction (February 1997), included the following paragraphs relevant to the buckled conduit dispute:

(a) . . . Anything mentioned in the specifications and not shown on the drawings, or shown on the drawings and not mentioned in the specifications, shall be of like effect as if shown or mentioned in both. In case of difference between drawings and specifications, the specifications shall govern.

(c) Where “as shown,” “as indicated,” “as detailed,” or words of similar import are used, it shall be understood that the reference is made to the drawings accompanying this contract unless stated otherwise. The word “provided” as used herein shall be understood to mean “provide complete in place,” that is “furnished and installed.”

Exhibit 7 at 32.

B. Mare’s Bid and Installation of the Conduit

Mare is a general contractor headquartered in Pittsburgh, Pennsylvania, with extensive experience in VA projects. Mare hires subcontractors to perform various aspects of the work on each project, but often performs the electrical work itself. Mr. Raymond Laughlin, Mare’s president for twelve years, spent thirty-eight years in the VA as a contracting professional. Mr. Laughlin testified that the team of employees who put together Mare’s bid for this project included an experienced electrician who reviewed the specifications and drawings and determined that expansion couplings were not required on the conduit, and therefore were not included in Mare’s bid. Transcript at 31-39.

After award, Mr. Laughlin assigned a superintendent to the project who had significant electrical experience, including twenty-four years as a union electrician. The superintendent was on-site daily during the performance of the project and maintained a copy of the specifications and drawings at the job site as required. He personally supervised the installation of the conduit, which was accomplished by “very experienced and very competent” union-trained electricians. Mare utilized both three-quarter-inch steel conduit and one-inch steel conduit to construct the specified raceways and did not install expansion

couplings on the conduit. Mare's superintendent testified that he regularly reviewed the drawings and specifications, and agreed that expansion couplings were not required by the contract since none were shown on the drawings and since the conduit, as installed, did not cross any building expansion joints. He acknowledged that in certain instances, compliance with the NEC required the installation of expansion couplings, but in his experience, the designers usually accounted for it in the design, and in this case, they did not. During the installation of the conduit, none of the VA or AE representatives present at the job site expressed any concerns to the superintendent about not utilizing expansion couplings. Transcript at 72-94.

C. The Dispute Over the Cause of, and Solution to, the Buckled Conduit

In August 2016, some of the conduit runs had noticeably buckled. *See* Exhibit 16 at 2-5. The contracting officer (CO) consulted with technical representatives from the VA and AE, who determined that compliance with the NEC required the installation of expansion couplings, and that qualified installers were expected to make such determinations in the field. The VA determined that the lack of expansion couplings caused the conduit to buckle due to variations in temperature in the area. Exhibit 15. At the CO's request, the AE developed a new drawing depicting the conduit runs (as installed) and the places where it believed the couplings should have been installed to account for thermal expansion of the conduit. The drawing showed fifty-two locations for expansion couplings. *See* Appellant's Hearing Exhibit 1. The vast majority of those locations had experienced no buckling. Nevertheless, the CO directed Mare to install expansion couplings and provided Mare a copy of the new drawing "to aid [Mare] in the code-required installation." Exhibit 49 at 4.

Mare made its own inquiry into the matter. Mr. Laughlin asked his employees about the buckled conduit and consulted with independent engineering experts to determine the cause of the buckling and ascertain whether Mare should have installed expansion couplings. Although Mare had not experienced buckled conduit on past projects, this was Mare's first parking garage project. Transcript at 65. Based on Mr. Laughlin's discussions with his staff and the investigations of the engineering experts, he informed the CO that the contract did not require expansion couplings, but that Mare was willing to move forward with the VA's preferred solution as long as the VA modified the contract to include the additional work. He also testified that all of the conduit was fully serviceable as the parties were working toward a solution. Exhibit 21; Transcript at 42-65.

In a letter dated September 1, 2016, Mare formally disputed the VA's contention that it was contractually required to install expansion couplings, as none of the conditions requiring their installation were present. Mare requested a contracting officer's final decision on the matter. The CO issued a final decision on September 15, 2016, stating that "the

contract clearly spells out that the contractor . . . is contractually responsible for installation of the expansion joints [*sic*] in the electrical conduit.” Exhibit 24. On November 7, 2016, Mare appealed the decision to the Board, requesting an interpretation of the contract’s terms. Specifically, Mare urged the Board to find that, based on the design of the project and the contract requirements, Mare was not responsible for the acquisition and installation of expansion couplings. The Board docketed the appeal as CBCA 5540. *See* Notice of Appeal.

D. The Hearing: Mr. Wunderly’s Expert Testimony

The Board conducted a hearing on CBCA 5540 and CBCA 5541 in May 2017, in Pittsburgh. Mare presented expert testimony from two independent engineers on CBCA 5540, the buckled conduit issue: Mr. Edward Wunderly, an electrical engineer, and Mr. Charles Churches, a structural engineer. Mr. Wunderly is a licensed, professional engineer with extensive experience in designing electrical systems and supervising other engineers, designers, and drafters. He has been a member of the Board of Standards and Appeals for the city of Pittsburgh for twenty years, where he serves as the Board’s electrical engineer, a position which requires his expertise in resolving disputes regarding compliance with the NEC. In addition to performing electrical engineering work on projects such as schools, hospitals, and commercial high rise buildings, Mr. Wunderly was the designer of record for two large parking structures that involved conduit attached to the garage ceilings. Mr. Wunderly reviewed the specifications and drawings for the project. He also visited the garage, where he observed warping of conduit in a few areas and concluded:

Based on the documents I reviewed, I don’t think they required expansion fittings⁵ for the conduit . . . these runs were so similar and so close together, and some are warped and some are straight, it doesn’t seem reasonable that [the warping] could have been caused by thermal expansion of the conduit. In my experience, steel conduit on common building materials doesn’t expand significantly more than the building materials themselves, which means that as the temperature changes and the conduit expands, the structure to which the conduit is attached also expands.

Transcript at 159-202.

Mr. Wunderly quoted the National Electrical Contractors Association’s (NECA) published industry standard for steel conduit: “Where the conduit is not exposed to the direct heat of the sun, expansion fittings are not generally necessary because the coefficients in

⁵ Expansion fittings and expansion couplings are used synonymously in this case.

expansion for steel and common building materials are so similar.” Transcript at 171-72. Mr. Wunderly testified that the conduit in the Erie garage was installed on the ceiling of the first floor of the garage, and therefore, was not exposed to the direct heat of the sun. He stated that if he had designed the garage, he would not have put in any expansion fittings for thermal concerns. *Id.* at 172-73. He concluded that based on his review of the documents, observations of the conduit, substantial experience working with the NEC, and knowledge of the NECA standards, expansion fittings were not required in this case. *Id.* at 178-80.

E. Mr. Churches’ Expert Testimony

Mr. Churches has been a structural engineer for nearly forty-five years, specializing in the design and construction of medium to large commercial projects, to include more than 250 parking structures. He resides in Pennsylvania and has done many projects in the Erie region. Mr. Churches is the author of the design guides for parking structures for the American Institute for Steel Construction and holds patents for the design of precast concrete structures. Mr. Churches testified that as the concrete settled, it shortened approximately two-and-one-half inches, causing conduit to buckle in certain areas. He explained that the Erie parking garage is a post-tension structure, which shortens when under compression, “[s]o the structure is behaving exactly the way it’s supposed to and once it’s stressed, it shortens, but the materials applied to the structure were not detailed to permit the shortening . . . all that happened was the anchors of the conduit reached the limit of the movement and when it stopped, the conduit just bowed a little bit . . . if you just loosen the connector and slide it back to the center of the stop and re-tighten the connector, the bow would be gone.” Transcript at 208-10.

When asked whether expansion couplings were required in this building, or should have been required, Mr. Churches replied, “No . . . the designers are supposed to specify the anticipated shortening of the slab . . . the applied materials, masonry, conduit, and everything else, should be detailed on the contract documents to accommodate the shortening of the slab.” *Id.* at 212. Mr. Churches did not agree with the VA that the bowing was caused by thermal expansion. He testified that “the structure cannot expand to the extent it shortened. The maximum thermal expansion you should get out of this, say 50 degrees, is probably five eighths, three quarters of an inch. So it shortened more than it can ever expand.” *Id.* at 213-14. He also stated that the coefficients of expansion for steel and concrete are very close. When asked whether the installation of expansion couplings would have prevented the conduit from bowing due to the shortening of the concrete, he replied, “[N]o . . . the bowing was in between the connectors, which fasten to the conduit pipe, and the connectors are closer than an expansion coupling would be.” *Id.* at 214-15. During cross examination, he commented that “you never see expansion fittings all through a garage” and noted that “there couldn’t have been more than three or four conduit that had bowed. And it doesn’t take

much to bow a conduit. As soon as you release the connector, it will come straight back. All you have to do is go to the connection, center the connection, and you're done. It's a very easy fix." *Id.* at 216.

F. Testimony of the VA's Construction Control Representative

The VA's witness on the buckled conduit issue was an electrician with twenty-five years of experience between his time in the Navy and in an electrical union. He worked at the VA as a construction control representative (CCR) and reported to the contracting officer's representative (COR). During the construction of the parking garage, the CCR was on site regularly observing the work. The CCR had extensive knowledge of electrical systems and was very familiar with the region. He testified that expansion fittings are not usually shown on drawings, but installers do not need an engineer to tell them where or how to install them. Installers can—and do—determine the locations in the field.

The CCR is not an engineer and was not offered or qualified as an expert witness during the hearing. Nevertheless, he testified that using a one-hundred degree temperature variation as an example, and referring to Table 352.44 of the NEC, a journeyman should be able to take the values for PVC in the code "and adjust the coefficient for rigid metallic conduit . . . by multiplying [the rate of expansion or contraction based on temperature variation, or 4.06] by .20 [that gives you] around .8 . . . which is three quarters or seven eighths of an inch of expansion and contraction." He noted that the NEC requires an expansion fitting "if you receive a movement of more than a quarter of an inch," and observed that "we have three times that movement in that simple math table in the National Electrical Code book." On cross examination, it was pointed out that his testimony deviated from the calculations on a drawing. Referring to the AE, the CCR responded that he wasn't sure "how they came [up] with that math," and stated that journeymen can do the same math.

With regard to the bowed conduit, the CCR testified: "I work there every day. I walk through that parking garage every day. And depending on the weather . . . you can see variations in buckling." The CCR concluded: "that concrete is flexing, whether it's temperature, whether it's the cars rolling on top. I'm not an expert on all of it, but I know what I see." The CCR disagreed with Mr. Wunderly's testimony that the expansion rates of steel and common building materials is similar. "My stance is the concrete is expanding and contracting; the steel underneath is not getting the temperature variation. They're resting everything on the steel is moving. The steel is not moving. The concrete and the embedded supports are moving, which is bowing the conduit." The CCR testified that he discounted the experts' opinions because they were not as familiar with the region as he was. The CCR stated that expansion fittings would have prevented the conduit from buckling. When asked

if expansion fittings were included as a punch list item, he responded that the punch list only noted that the conduit was misaligned. Transcript at 286-312, 319-59.

G. Testimony by the COR and the CO

The COR is a registered professional engineer with a degree in mechanical engineering. His position requires that he regularly coordinate with the CO, the AE, and other staff. During the hearing, he testified generally that the VA relies on its AE to assist with technical responses to requests for information (RFIs) during contract administration. Transcript at 220-28. He also stated that the VA's AE contractor designed the garage and was often on site during construction. Exhibit 121 at 27.

The CO has more than eight years of experience working as a CO and is level-III⁶ certified. He also has a bachelor's degree in industrial management and a master's degree in business administration. The CO testified that the AE contractor developed the design of the project over a one-year period and that bidders had approximately thirty days to submit bids. He also testified that, even though it was not the AE's responsibility, the AE developed a drawing, at his request, to show Mare where to install expansion couplings on the conduit in accordance with the contract specifications. The drawing showed fifty-two expansion couplings throughout the garage. The CO did not pay the AE for the drawing. "[The AE] just did it as a request from myself." Transcript at 397-444.

II. The Purchase and Installation of Head-End Equipment – CBCA 5541

The second dispute involved the components required for the video surveillance system in the garage. The crux of the issue was whether the contract required Mare or the VA to purchase the head-end equipment⁷ for the system.

⁶ A level-III certification is the highest certification a CO can receive for contracting under the Federal Acquisition Certification program. Transcript at 397-98.

⁷ Although none of the specifications or drawings refer to head-end equipment, several documents in the record, as well as hearing testimony, established that head-end equipment is a common phrase used to refer to equipment at the "head end" of a system. In this case, head-end equipment referred to controlling equipment, monitoring equipment, and recording equipment which included an encoding and/or decoding device that would allow the VA's analog security system to communicate with the new garage's digital closed circuit television system (CCTV).

A. Specifications, Drawings, and Relevant Contract Terms

Contract specification 28 23 00 (Video Surveillance) required Mare to “[p]rovide and install a complete Video Surveillance System,” which was also referred to as the CCTV. Exhibit 4 at 2107. Under the quality assurance section of the specification, it stated that “[t]he contractor shall be responsible for providing, installing, and the operation of the CCTV System as shown.” *Id.*

Part two of the specification addressed “products” and contained information about the equipment and materials required for the CCTV system. In addition to requiring compatibility of products to ensure correct operation, the specification required certain equipment to be “home-run to a monitoring and recording device via a controlling device, such as a matrix switcher or network server and monitored on a 24-hour basis at a Designated Access Control System and Database Management Location.” Exhibit 4 at 2112.

The specification further informed bidders, “[I]f using a camera as part of a CCTV network, a video encoder shall be used to convert the signal from National Television System(s) Committee (NTSC) to Moving Picture Experts Group (MPEG) format.” Exhibit 4 at 2113. Under the subsection entitled “Controlling Equipment,” the specification referred to operation of a CCTV system over a network server which “shall operate in a box-to-box configuration allowing for encoded video to be decoded and displayed on an analog monitor.” *Id.* at 2125. The specification listed equipment requirements for configuring a CCTV system network, which included a system server, computer workstation, recording device, encoder/decoder, monitor, hub/switch, router, and an encryptor. *Id.* The specification further stated, “If analog equipment is used as part of the system, then either an encoder or decoder will be utilized to convert the analog signal to a digital one.” *Id.*

Part three of the specification addressed “installation” and stated, “[t]he CCTV system contractor shall install all system components, including Government Furnished Equipment, and appurtenances, in accordance with the manufacturer’s instructions . . . and shall furnish all necessary connectors, terminators, interconnections, services, and adjustments required for a complete and operable system.” It also required the CCTV system to be “designed, engineered, installed, and tested to ensure all components are fully compatible as a system and can be integrated with all associated security subsystems, whether the system is a stand alone or complete network.” Exhibit 4 at 2139.

Part three defined “a complete CCTV System” as including, at a minimum, cameras, lenses, video display equipment, camera housings and mounts, controlling equipment, recording devices, and wiring and cabling. The specification required the contractor to “visit the site and verify that site conditions are in agreement/compliance with the design package,”

or report any deviations to the CO. The contractor was not permitted to take any corrective action regarding site conditions without written permission from the CO. Exhibit 4 at 2141.

Drawing TE-501, entitled “Telecom Details and Rack Elevations,” depicted two racks for information technology (IT) equipment. Each rack showed numbers directly on, or next to, various sections of the racks. The numbers ranged from one through eleven and corresponded to keynotes immediately to the right of the rack illustrations. Item numbers one through six, as well as item number eight, identified certain equipment followed by the phrase “by contractor.” Item number seven, “48 port ethernet switch,” stated “by government.” Item number nine referred to “space allocated for government provided CCTV equipment.” Item number ten referred to “space allocated for government provided equipment and future growth.” Item number eleven referred to “space allocated for [uninterrupted power supply] by government.”

Drawing TE-601, entitled “CCTV Motoring [sic] System Diagram,” contained a diagram of “IT Room 105,” which was on level one of the garage. The diagram showed a power over ethernet (PoE) switch inside the room, and a line or cable extending from the PoE switch to the hospital local area network (LAN).

Contract clause VAAR 852.236-91 Special Notes (July 2002), stated in paragraph (d):

In some instances it may have been impractical to detail all items in specifications or on drawings because of variances in manufacturers’ methods of achieving specified results. In such instances the contractor will be required to furnish all labor, materials, drawings, services and connections necessary to produce systems or equipment which are completely installed, functional, and ready for operation by facility personnel in accordance with their intended use.

Exhibit 7 at 48.

B. The Solicitation and Questions from Bidders

The solicitation contained the aforementioned specifications and drawings and stated, in part: “Work shall be performed in accordance with the attached specifications, drawings and other federal, state and local codes, standards and regulations and are part of this solicitation and any contract that may result.” Exhibit 7 at 1. A question and answer period followed the posting of the solicitation. Sixty questions were submitted in response to the specifications and drawings, some of which raised concerns about drawings in the parking garage solicitation that actually pertained to a different project (the community living center or, “CLC” project). As a result of the questions received, the VA issued five amendments

to the solicitation. The amendments contained revised drawings and specifications, added new specifications, deleted irrelevant work, clarified requirements, and provided technical reports to better inform potential bidders about the project's requirements. Questions and responses (or portions thereof) relevant to these disputes included:

Question #19 We see several digital electrical meters shown on [drawing] E-601 which appear to be part of the CLC contract. Is there any metering equipment in *this contract*? [Emphasis added].

Response: The meters provided under this project shall communicate to the existing Johnson Controls

Question #45 Since the generator and transfer switches are not part of this project, what should feed [the] panels []? [The] panels are to be fed from equipment supplied in the CLC project so they do not have a feed at this time.

Response: See revised drawings ES-102 and E-601 dated 2/28/2014.

Question #47 Are all of the digital meters shown on the riser for the . . . CLC project and no metering is required for the parking ramp?

Response: Provide digital meters on all circuit breakers in Switchboards []. Digital meters shall report to the Johnson Controls system, provide new graphics for electrical metering.

Question #49 Are communications and electronic safety and security systems part of *this bid*, or are these systems provided by the owner's preferred vendors and conduits only are to be in the bids? [Emphasis added].

Response: The communications and electronic safety systems indicated on the documents are to be provided as part of this project.

Exhibit 7 at 6-12.

The solicitation of the project, to include the amendments to the solicitation, did not contain any references to the phrase "head-end equipment." The phrase "head-end equipment" did not appear in any of the specifications or on any of the drawings. No questions were received from potential bidders during the solicitation process regarding "head-end equipment."

C. Mare's Video Surveillance System Submittals and RFIs

On July 15, 2015, Mare submitted a proposed design for the video surveillance system. The submittal (#122) was developed by a subcontractor and identified the equipment

type, quantity, model, and manufacturer for each component of the system it intended to use, including twenty-three Bosch IP cameras, eleven Bosch wall mounts, ten Bosch pole mounts, and one PoE switch from Allied Telesis. Data sheets attached to the submittal contained information about the capabilities and features of the equipment, as well as illustrations, certifications, and technical specifications. Exhibit 10 at 1-17.

The AE reviewed the submittal and stamped it with further instructions to the contractor to “make corrections noted.”⁸ The corrections were to “provide all required licenses for PoE switch and cameras,” and to “verify correct operation with current VAMC central equipment.” The stamp also contained the reviewer’s name, the company name and address, the date of the review (August 31, 2015), and the following disclaimer:

Reviewing is for conformance with the design concept of the Project and compliance with the information given in the Contract Documents. Contractor is responsible for dimensions to be confirmed and correlated at the job site, for information that pertains solely to the fabrication processes or to techniques of construction, and for coordination of the work of all trades.

Exhibit 10 at 3.

On April 27, 2016, Mare submitted RFI #137, “Exterior CCTV Camera IP [internet protocol] Addressing,” to the AE, stating that “Twenty-three (23) exterior IP cameras . . . are to be installed. IP addresses for all cameras must be established. Please provide point of contact at the VA for turning cameras over for . . . addressing.” The AE responded on May 10, 2016: “VA team to advise on point of contact.” Notice of Appeal at 47.

Between May 17 and June 7, 2016, at least three construction meetings were held between the VA and Mare. The minutes from each meeting referenced “RFI Follow up: #137,” stating “WRL working on interface [connection] for camera systems”; “VA working with WRL to address head-end equipment”; and “VA working on head-end solution; no action required by Mare. IP addresses will be furnished ASAP. Camera testing to be performed on 6/8/16.” Notice of Appeal at 48-50.

On June 10, 2016, the COR emailed Mare: “I’m with Keystone [an independent contractor] now over at the IT closet We’ll soon have the head-end equipment all ready

⁸ The stamp provided these options based on AE review: 1) reviewed, 2) make corrections noted, 3) resubmit for record, 4) revise and resubmit, 5) rejected, and 6) not reviewed. In this case, the AE checked “make corrections noted.”

for you guys to have the cameras programmed into the new system. Just had the guys here to see what we need to get.” Notice of Appeal at 52. That same day, Mare submitted RFI no. 141, “Access Control System — Network Equipment in Rack,” and referenced drawing TE-101. The description stated, in part: “VA furnished and installed rack-mounted network equipment, required for system must be installed and uplinked prior to our subcontractor performing final connections and terminations. Please advise.” Notice of Appeal at 54.

On June 14, 2016, the COR replied to RFI #137, stating:

VA is obtaining prices on the head-end system for the camera system. If the VA is able to install the system prior to contract close-out, we will provide the IP addresses for the system for Mare to provide programming of the cameras. If the system is not in prior to close-out, the VA will do the programming.

Notice of Appeal at 47.

On June 20, 2016, the COR responded to RFI no. 142, stating: “This too (as with RFI 141), will be addressed with the new Bosch head-end equipment which is being purchased through Keystone.” Notice of Appeal at 53.

On June 23, 2016, the VA obtained a quote from Keystone for the head-end equipment. The quote included a camera server, licenses for the camera server, connection ports for fiber optic cable between the garage and the hospital security office, a fee for connecting existing monitors in the security office to the CCTV system, and conduit for connections to the racks. The quote specifically noted that the switch for the cameras in the garage would be “installed by others.” The proposed cost of the head-end equipment ranged between \$37,650 and \$43,530, depending upon the number of cameras feeding into the server for video storage. Exhibit 67 at 3.

On June 30, 2016, the CCR emailed the CO and COR, noting that contract specification 28 23 00 required Mare to provide “a complete, working video surveillance system,” and recommended that the VA “cease all efforts to provide a working head-end and redirect Mare and its subcontractor to provide contract required services.” Exhibit 70 at 1. The CO requested a written response from the AE on the CCR’s interpretation of the specification. In its memo, the AE stated that the video surveillance specification was based on the VA standard, which required the contractor to provide a complete system, including control monitoring and recording equipment. The AE also stated that the system was not considered complete and demonstrated without the head-end equipment. Exhibit 93 at 5. The CO emailed Mare about its revised position on specification 28 23 00, stating that it

required Mare “to provide and install a complete video surveillance system including control monitoring and recording equipment.” Exhibit 76 at 1.

On July 5, 2016, the AE sent a follow-up email to the VA with submittal #122 attached, stating that it had reviewed the submittal and returned it to Mare with instructions to make the noted corrections. The email also stated:

The review of this submittal could in no way be construed as an acceptance of any submitted system design. No such design was ever submitted and the requirements of Part 1.3B were never met. The submittal requirements are extensive and noted the requirements for a series of pre-installation design packages for review by the contractor and the VA representative. Packages at 35%, 65%, 90%, and 100%. If this design and review process as specified, or even an abbreviated version were followed, the issue of compatibility and proper operation of the system would have been avoided. Keynotes 9 & 10 on TE-501 do not infer that the space is allocated for the head end.

Exhibit 75 at 1.

On July 7, 2016, Mare responded by email, disputing the requirement for Mare to install head-end equipment. Exhibit 78 at 2. The VA and Mare traded several additional emails and letters in an attempt to resolve the dispute, but no agreement was reached. The VA issued a cure notice on August 4, 2016, which Mare vigorously disputed since the garage was substantially complete. Exhibits 17, 20.

D. Mare’s Appeal and the Hearing on Head-End Equipment

On September 15, 2016, the CO issued a final decision stating, “The Government maintains that the contract requires the contractor to install the contractually required encoder/decoder needed to convert the digital signals of the security cameras . . . to the analog system that is currently in place at the Erie VA.” Exhibit 23.

On November 3, 2016, Mare appealed the decision to the Board, stating, “Appellant installed the CCTV system in accordance with its contractual obligations and the VA has an installed CCTV system as required per the construction documents and approved submittals.” The appeal also stated, “VA representatives were in agreement with Appellant’s interpretation of the contract documents that the ‘head-end’ equipment was never part of Appellant’s contract and would be purchased and installed by the VA.” Mare requested a determination by the Board that the acquisition and installation of head-end equipment was not part of [Mare’s] contract.” Notice of Appeal at 2-7.

At the May 2017 hearing, Mare testified that it decided to move forward with the procurement and installation of the head-end equipment and seek reimbursement for those costs. Mare noted that the drawings did not show any head-end equipment, but instead referenced “government-provided CCTV equipment.” As a result, Mare did not include head-end equipment in its bid. Mare’s interpretation of the contract requirements for video surveillance was reflected in the submittal provided to the AE and the VA, which Mare said was accepted as consistent with the design. Transcript at 52, 61-64, 140-47.

During the hearing, Mare introduced a government cost estimate for the Erie parking garage project, dated May 14, 2013, which was produced by a professional cost estimator under a subcontract with the AE to help determine the independent government cost estimate. Section 17 of the estimate was entitled “Technology,” and was divided into three sub-sections, the third of which was “Security Systems.” Four line items were captured under the security systems sub-section, one of which was “Security CCTV.” Data used to compile the security CCTV estimate included the quantity and unit, as well as the labor and material costs. The quantity listed was “17,” and the unit was “each.” “Labor MH” was “6.0” and “Labor EXT” was 102. The cost of one material unit was listed as “\$1000,” and the Material EXT was “\$17,000.” The total estimate for the security CCTV line item was “\$28,016.” The security CCTV consumed a single line on the estimate. No other costs related to video surveillance were reflected in the document. Hearing Exhibit 5 at 18.

On cross examination, appellant’s counsel asked the CO, “Is there any indication [in this document] that the contractor is to supply head-end equipment?” The CO responded, “At this point in time I can’t tell you, because head-end equipment is a generic word . . . reading this—I am not an IT expert. You would have to have an expert IT person say, that is what you’re calling head-end equipment.” Transcript at 430-31. Nevertheless, the CO testified that head-end equipment was a contractual item that was to be located in the security office inside the main entrance to the hospital, not in the parking garage. He stated that no questions were received from interested bidders regarding government-furnished equipment and confirmed that this project did not contain any equipment furnished by the Government. The CO added that the VA rarely furnishes equipment for its projects. Transcript at 430-43.

The COR testified that after the cameras and emergency phones were installed in the garage, “there was no connectivity from [the VA] system, as it existed . . . to the new camera system . . . they could not talk to each other so to speak. So the system was basically not a working system at the time.” When asked whether the AE—the designer of the project—caught this issue during any of the construction meetings where the issue of head-end equipment was discussed, the COR responded that it should have but did not. Although the COR admitted that the VA’s solicitation for the garage project contained drawings for the CLC, he noted that the specifications required that the security system be installed and tested

“to ensure all components are fully compatible and can be integrated with all associated subsystems, whether the security system is stand-alone or part of a complete information technology, IT, computer network.” Transcript at 229-45.

III. The Monetary Claim for the Head-End Equipment – CBCA 6037

On February 9, 2018, Mare submitted a claim for \$37,080 to the CO for its purchase of the head-end equipment. The CO denied the claim on February 15, 2018, and Mare appealed to the Board on February 16, 2018. The appeal was docketed as CBCA 6037 and consolidated with CBCA 5540 and 5541.⁹ In addition to the documents attached to the Notice of Appeal, the parties requested that the Board designate the appeal file previously submitted in support of both CBCA 5540 and 5541 as the appeal file for the new appeal. The parties also requested that the Board incorporate the hearing transcript from those appeals into the record for CBCA 6037.

Discussion

I. Jurisdiction

The Board’s jurisdiction to hear contract disputes derives from the Contract Disputes Act (CDA), 41 U.S.C. §§ 7101-7109 (2012). As a prerequisite to the Board’s review, the contractor must have submitted a “claim” to an agency contracting officer. *Id.* § 7103(a)(1), 7104(a). The CDA does not define the term “claim,” so we look to the regulation implementing the CDA—the Federal Acquisition Regulation (FAR)—to define it. *Todd Construction, L.P. v. United States*, 656 F.3d 1306,1311 (Fed. Cir. 2011) (citing *H.L. Smith, Inc. v Dalton*, 49 F.3d 1563, 1564-65 (Fed. Cir. 1995)). The FAR defines a “claim” as “a written demand or written assertion by one of the contracting parties seeking, as a matter of right, the payment of money in a sum certain, the adjustment or interpretation of contract terms, or other relief arising under or relating to [a] contract.” 48 CFR 2.101(b)(2) (2016) (FAR 2.101). When these prerequisites are met, “the CDA provides that a contractor may appeal a contracting officer's decision to an agency board of contract appeals ‘within 90 days

⁹ In a teleconference with the parties, the Board expressed concern about its jurisdiction over CBCA 5541. In its November 2016 appeal to the Board, Mare requested an interpretation of the contract’s terms—not monetary relief. At the hearing, the Board learned that Mare, in fact, had gone ahead and procured and installed the head-end equipment, and was now seeking reimbursement for that work, yet a claim for a “sum certain” had not been submitted to the CO. The Board provided the parties with an opportunity to address the issue and remedy its jurisdictional concerns.

from the date of receipt of [that] decision.’” 41 U.S.C. § 7104(a); *Coburn Contractors LLC v. Department of Veterans Affairs*, CBCA 5033, 15-1 BCA ¶ 36,177, at 176,522.

The first two appeals (CBCA 5540 and CBCA 5541) involved written requests to the contracting officer for final decisions on the interpretation of contract terms—namely, whether the contract required Mare to install expansion couplings on the conduit (CBCA 5540) and whether Mare was required to purchase head-end equipment as part of the video surveillance system (CBCA 5541). The contracting officer issued final decisions on both issues, which Mare disagreed with and timely appealed to the Board.

In its appeals, Mare sought declaratory relief—not monetary relief—from the Board. At that time, the Board’s jurisdiction was proper, as both appeals involved live performance disputes that could be resolved by declaration of the Board. See *Kiewit-Turner, a Joint Venture v. Department of Veterans Affairs*, CBCA 3450, 14-1 BCA ¶ 35,705 at 174,846 (citing *Alliant’s* three-part test in evaluating whether declaratory relief is appropriate in a particular case: “(1) whether the claim involves a live dispute between the parties, (2) whether a declaration will resolve that dispute, and (3) whether the legal remedies available to the parties would be adequate to protect the parties’ interests.”). At the hearing, however, the Board learned that, in addition to seeking declaratory relief, Mare had procured and installed the head-end equipment and was now seeking reimbursement for those costs.

Requests for interpretation of a contract’s terms are *non-monetary* claims and, as such, do not require a sum certain. *Alliant Techsystems v. United States*, 178 F.3d 1260, at 1266-67 (Fed. Cir. 1999). With monetary claims, on the other hand, “the absence of a sum certain is fatal to jurisdiction under the CDA.” *Northrop Grumman Computing Sys., Inc. v. United States*, 709 F.3d 1107, 1112 (Fed. Cir. 2013). For reasons detailed above (see footnote 9), Mare submitted a monetary claim to the CO on February 9, 2018, in the amount of \$37,080 for the costs of purchasing the head-end equipment—costs that Mare maintained were wrongly imposed on it by the VA. The contracting officer denied the claim on February 15, 2018, and Mare timely appealed the decision to the Board the following day. The appeal was docketed as CBCA 6037 and was consolidated with the first two appeals.

Under the test articulated in *Kiewit-Turner*, we have no concerns about our jurisdiction to issue declaratory relief in CBCA 5540. We also find the Board’s jurisdiction over CBCA 6037 to be proper, as it meets all of the requirements of the CDA. Although we originally had jurisdiction over the non-monetary video equipment claim (CBCA 5541), we dismiss that non-monetary claim since the issues raised therein have been subsumed within the monetary claim for video equipment that is pending before us in CBCA 6037. See *Freedom NY, Inc.*, ASBCA 52438, 00-1 BCA ¶ 30,873, at 152,432 (dismissing duplicative appeal); *Applied Cos.*, ASBCA 39935, et al., 94-2 BCA ¶ 26,906, at 133,984 (“Since [this

appeal] involves the identical claim that is the subject of [another pending appeal], we dismiss [this appeal] as duplicative and unnecessary in view of our denial of the Government's motion to dismiss [the other pending appeal].”).

II. Basic Principles of Contract Interpretation

These appeals present questions of contract interpretation, which begin with an examination of the plain language of the contract. *LAI Services, Inc. v. Gates*, 573 F.3d 1306, 1314 (Fed. Cir. 2009) (citing *M.A. Mortenson Co. v. Brownlee*, 363 F.3d 1203, 1206 (Fed. Cir. 2004)). If the plain language of the contract is unambiguous on its face, the inquiry ends, and the contract's plain language controls. *Hunt Construction Group, Inc. v. United States*, 281 F.3d 1369, 1373 (Fed. Cir. 2002). Furthermore, a contract must be read as a whole, giving reasonable meaning to all its parts, so as not to render any portion meaningless, or to interpret any provision so as to create a conflict with other provisions of the contract. *Jane Mobley Associates Inc. v. General Services Administration*, CBCA 2878, 16-1 BCA ¶ 36,285, at 176,954 (citing *Champion Business Services v. General Services Administration*, CBCA 1735, et al., 10-2 BCA ¶ 34,539, at 170,345).

III. The Specification for Expansion Couplings — CBCA 5540

Contract specification 26 05 33, paragraph 3.9, required Mare to install expansion couplings in three distinct situations: 1) where conduit crossed an expansion joint in the parking structure, 2) where they were shown in the drawings, and 3) as required by the NEC. Mare reviewed these specifications and determined that expansion couplings were not required in the Erie garage, so none were installed. When several conduit runs subsequently buckled, the VA determined that changes in temperature caused the conduit to expand and contract, that Mare had an obligation to install expansion couplings, and that its failure to do so caused the conduit to buckle. We disagree. Multiple witnesses testified that none of the conduit crossed any expansion joints,¹⁰ and all witnesses agreed that the drawings did not show any expansion couplings.

According to the contract, the only other basis for requiring expansion couplings was compliance with the NEC. Mare's expert witnesses, Mr. Wunderly and Mr. Churches,

¹⁰ One witness testified that at least one run of conduit crossed an expansion joint near the stairwell and IT closet, but admitted that no buckling had occurred on that run. Other witnesses disagreed that any conduit crossed the expansion joints in this area. To the extent that any conduit originating from the stairwell area did, in fact, cross an expansion joint, installation of that conduit must comply with the plain language of the specifications.

provided definitive testimony on this issue. Mr. Wunderly's experience as an electrical engineer and member of the Board of Standards and Appeals for the city of Pittsburgh made him particularly persuasive on the question of whether the NEC required the installation of expansion couplings due to thermal expansion and contraction. He reviewed the contract documents and visited the job site, where he personally observed the buckled conduit. Based on his review and substantial experience with NEC compliance matters, Mr. Wunderly testified that neither the contract documents nor the NEC required the installation of expansion couplings on this project. He also dismissed the theory that thermal expansion was the cause of the buckling since warped conduit runs were found next to straight ones and because "the coefficients in expansion for steel and common building materials are so similar." He further pointed out that the conduit was not exposed to the direct heat of the sun because it was on the ceiling of the first floor, a fact that he found compelling based on the industry standard for installing expansion couplings.

Mr. Churches' credentials as a structural engineer and his particular expertise with more than 250 parking structures provided relevant insight into the cause of the buckling and suggested a simple fix with little to no cost to either party. Mr. Churches' explanation that the cause of the bowing was the result of the concrete slab shortening about two-and-a-half inches was persuasive, as it effectively ruled out the VA's explanation that the bowing was caused by thermal expansion. Furthermore, Mr. Churches did not agree that expansion couplings were required in this garage, or should have been required. Mr. Churches' opinion that the design should have accounted for the shortening of the slab absolved Mare of any liability for the buckling.

Both Mr. Wunderly and Mr. Churches are recognized experts in their fields and were highly qualified to render opinions on whether the contract specifications required expansion couplings, as well as the cause of the buckling. We find the testimony of both experts to be persuasive in determining that the specifications of the contract, which required compliance with the NEC, did not mandate the installation of expansion couplings.

The VA provided no expert testimony to rebut Mr. Wunderly or Mr. Churches. No one from the VA's AE firm testified about the specifications it drafted, or about the drawing it produced as a solution to the buckling after the dispute arose—which depicted more than fifty expansion couplings installed on the conduit. Furthermore, the VA's primary witness—the CCR—testified that he thought the number of expansion couplings shown on the drawing was excessive. That view was consistent with Mare's superintendent's comment that requiring fifty expansion couplings was "unusual." Furthermore, even if it is not customary to show expansion couplings on a drawing, the designer's failure to raise the issue during installation undermines its after-the-fact position.

With regard to the specification requiring compliance with the NEC, the VA presented some testimony regarding the impact of temperature changes on the conduit. The witness, an experienced electrician, admitted that he was not an expert on the thermal issue but trusted “what he personally observed on a daily basis.” The witness shared his observations and experience working in the region, as well as facts about this particular project and the buckled conduit, which he personally witnessed. However, the witness also rendered opinions regarding thermal expansion and contraction of the structure and its impact on the conduit, a subject that in our view was better suited to the purview of experts.

Although not binding upon the Board, the Board looks to the federal rules for guidance and instruction in order to issue orders and make just rulings. *See* Board Rule 1(d) (48 CFR 6101.1(d) (2016)); *Regency Construction v. Department of Agriculture*, CBCA 3246, 17-1 BCA ¶ 36,884, at 179,772. In assessing the evidentiary value of lay opinions, we are instructed by Federal Rule of Evidence (FRE) 701, which limits the opinion of lay witnesses to those opinions or inferences which are (a) rationally based on the perception of the witness, (b) helpful to a clear understanding of the witness’ testimony or the determination of a fact in issue, and (c) not based on scientific, technical, or other specialized knowledge within the scope of FRE 702, which governs testimony by experts.

Despite the prohibition articulated in FRE 701(c), some courts have found lay opinion testimony permissible where the witness’ conclusions are based on common knowledge or experience. *DataMill, Inc. v. United States*, 91 Fed. Cl. 722, 736 (2010) (“[w]hile the ordinary rule confines the testimony of a lay witness to concrete facts within his knowledge or observation, the [c]ourt may rightly exercise a certain amount of latitude in permitting a witness to state his conclusions based upon common knowledge or experience.”) (quoting Fed. R. Evid. 701). Here, the VA’s witness (the CCR) testified to facts related to both appeals, but also presented opinion testimony that fell within the scope of FRE 701(c): the issue of thermal differential expansion. While Mare did not object to this aspect of the CCR’s testimony, we find the testimony of Mr. Wunderly and Mr. Churches, experts in their respective fields, to be more persuasive.

The specification regarding the installation of expansion couplings was clear in the contract: they were to be installed where they crossed an expansion joint, or where they were shown on the drawings, or where the NEC otherwise required them. We find that the drawings showed no expansion fittings and the NEC did not require them to compensate for thermal expansion. To the extent that no conduit, as installed, crossed an expansion joint, we find Mare’s interpretation of the specifications for expansion couplings to be consistent with the terms of the contract.

IV. The Contract Required Mare to Provide Head-End Equipment — CBCA 6037

Testimony established that head-end equipment consisted of controlling equipment, monitoring equipment, recording equipment, and an encoding and/or decoding device. Mare contends that the contract required the VA to supply head-end equipment. We reject Mare's position.

First, the plain language of the contract required Mare to purchase and install head-end equipment as part of the video surveillance system. Specification 28 23 00 required Mare to “[p]rovide and install a complete Video Surveillance System.” Under the contract, “provided” means “provide complete in place,” or “furnished and installed.” See FAR clause 52.236-21(c), Specifications and Drawings for Construction. Under “Equipment Items,” the specification stated, “[i]f using a camera as part of a CCTV network, a video encoder shall be used.” A second reference to “equipment requirements for configurations using a CCTV System network as the primary means of monitoring, operating, and recording cameras” included the following: a system server, computer workstation, recording device, encoder/decoder, monitor, hub/switch, router, and an encryptor. The specification further stated, “If analog equipment is used as part of the system, then either an encoder or decoder will be utilized to convert the analog signal to a digital one.” In reviewing these specifications and the contract as a whole, there can be no dispute that head-end equipment was required to be provided and installed by Mare. Mare's arguments to the contrary are not persuasive.

Mare's primary argument that it was not responsible for purchasing the head-end equipment is that the contract drawings show that the opposite was true. Mare pointed to keynote references on drawing TE-501 stating, “[s]pace allocated for government-provided CCTV equipment.” Mare also cited to drawing TE-601 in arguing that the project designer intended for the video surveillance system to tie into the hospital's local area network—not to any head-end equipment. On the other hand, the VA testified that the contract did not include any government-furnished equipment, despite the keynote references on the drawings. In an effort to explain the references, the VA admitted that the drawings were intended for use in the CLC project.

While vexing, these facts do not excuse Mare's obligations to comply with the specifications, which—according to the contract—govern when a conflict exists between the drawings and the specifications. The inclusion of drawings for the CLC project in the solicitation for the garage should have come as no surprise to Mare. Multiple bidders noticed and raised the issue during the question and answer period following the release of the garage solicitation. Those questions and answers were shared with *all* bidders. Mare, as a prospective bidder, was on notice that the drawings contained references to the CLC, and any

assumptions it made based on those drawings—to include references to government-furnished equipment—it made at its own risk.

Furthermore, if Mare had concerns about ambiguities in the contract, it had a duty to inquire about them at the time of bidding, *not* after award. *A-Son's Construction, Inc. v. Department of Housing & Urban Development*, CBCA 3491, 15-1 BCA ¶ 36,184, at 176,539 (“The patent ambiguity doctrine is typically applied to preclude a contractor who recognized or should have recognized an ambiguity in a solicitation, but who failed to seek clarification of the ambiguity before bidding, from later relying upon its own unilateral interpretation of the ambiguous provision.”) (quoting *Triax Pacific, Inc. v. West*, 130 F.3d 1469, 1474-75 (Fed. Cir. 1997)).

Mare’s second argument was that it did, in fact, provide the VA with a complete video surveillance system as required. In response to the VA’s contention that Mare was to provide a “complete system,” Mare posited that a complete system consisted of the government-provided CCTV equipment, together with the contractor-provided equipment. We have previously decided this issue. In *F.A. Wilhelm Construction v. Department of Veterans Affairs*, CBCA 719, 09-2 BCA ¶ 34,228, at 169,179, a note on a drawing stated that the VA would furnish system components, and the contractor would install those components along with equipment from its subcontractor, and that together, the components and equipment would constitute a final operable system. The specifications, on the other hand, required the successful contractor to “furnish, install, and test a complete and operable System, and that the System shall include, at a minimum, the listed equipment.” The Board found in *F.A. Wilhelm* that a conflict existed between the specifications and drawings, and since the contract stated a preference for the specifications over the drawings in such circumstances, the language of the specifications controlled. In examining the language of the specifications, the Board decided it clearly placed the burden of providing “a complete and operable system” on the contractor, as the system did not operate without the components. The Board also found that insofar as an ambiguity existed, the contractor had an obligation to raise the issue with the VA before submitting its bid. In failing to do so, the Board found that the contractor assumed the risk of its own interpretation and would not be reimbursed for the components. This is precisely the case here.

We also note that Contract Clause VAAR 852.236-91(d) clarified the VA’s interpretation of a requirement for a complete system. It cautions and informs bidders that:

In some instances it may have been impractical to detail all items in specifications or on drawings . . . In such instances the contractor will be required to furnish all labor, materials, drawings, services and connections necessary to produce systems or equipment which are completely installed,

functional, and ready for operation by facility personnel in accordance with their intended use.

This clause removes any doubt about Mare's obligations under the contract. Several witnesses from both parties testified that without the head-end equipment, the system did not function. Mare's interpretation (that government-provided equipment, together with contractor-supplied equipment, results in a complete system) is simply that: Mare's interpretation, and one that—if adopted—would render other parts of the contract meaningless, a construction that the Board must avoid. See *Hol-Gar Manufacturing Corp. v. United States*, 351 F.2d 972, 979 (Ct. Cl. 1965) (“[A]n interpretation which gives a reasonable meaning to all parts of an instrument will be preferred to one which leaves a portion of it useless, inexplicable, inoperative, void, insignificant, meaningless or superfluous; nor should any provision be construed as being in conflict with another unless no other reasonable interpretation is possible.”).

Mare's final argument in support of its claim for the costs of procuring the head-end equipment was that the VA's actions during performance were consistent with Mare's interpretation of the contract. Mare pointed to the many RFIs it submitted as well as numerous emails between the parties in support of its position that the VA was responsible for providing the head-end equipment. The record does contain multiple communications between the parties where, for several months, the VA pursued quotes for the head-end equipment after informing Mare that it would. Absent a formal modification to the contract, however, these actions did not change the specifications, and therefore, do not inform our analysis. *Consolidated Marketing Network, DOTCAB 1680, et al.*, 86-3 BCA ¶ 19,181, at 97,014 (“We recognize that the conduct of parties during progress of a contract's performance is persuasive evidence of the parties' interpretation of that contract's terms. However, any errors of interpretation by either party to a contract [are] not binding upon a tribunal We must look towards the actual terms of the parties' agreement, especially when, as here, the agreement itself is not ambiguous in its language.”).

In spite of the VA's numerous missteps in addressing this issue, including its two-month inquiry into procuring the head-end equipment at government expense, we cannot subscribe to Mare's interpretation of the contract on this issue, as it contradicts the plain language of the contract. Even the VA's cost estimate, which only included cameras, does not overcome the plain language of the specifications, as it was not included in the solicitation and was merely an estimate used to establish a reasonable cost for performing the work under the contract. The Board will not look to extrinsic evidence, such as pre-solicitation estimates or pre-dispute actions of the parties, when the contract contains no ambiguities concerning the parties' respective obligations thereunder. The contract's terms required Mare to provide a complete, functional video surveillance system that was ready for

operation. Since head-end equipment was necessary to fulfill that requirement, Mare was required to furnish and install it under the terms of the contract.

Decision

CBCA 5540 is **GRANTED**. Mare's interpretation that the drawings and the NEC did not require the installation of expansion couplings on the conduit was correct. To the extent that no conduit crossed any expansion joints, the contract did not require the installation of expansion couplings.

CBCA 5541 is **DISMISSED**. The issues in CBCA 5541 were subsumed within CBCA 6037.

CBCA 6037 is **DENIED**. The contract required Mare to furnish and install head-end equipment to provide a complete, fully functional video surveillance system that operated consistent with its intended use.

Kathleen J. O'Rourke
KATHLEEN J. O'ROURKE
Board Judge

We concur:

Jonathan D. Zischkau
JONATHAN D. ZISCHKAU
Board Judge

Beverly M. Russell
BEVERLY M. RUSSELL
Board Judge