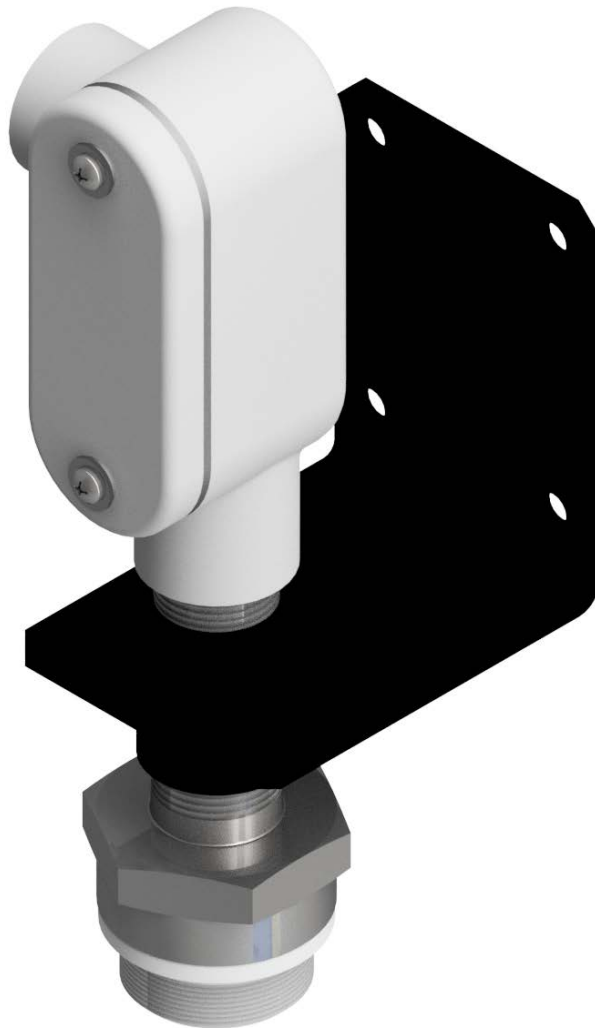


Remote Sensor Kits

Installation Manual

Document No. 360-0263-01
(Revision B)



SENSIDYNE[®]

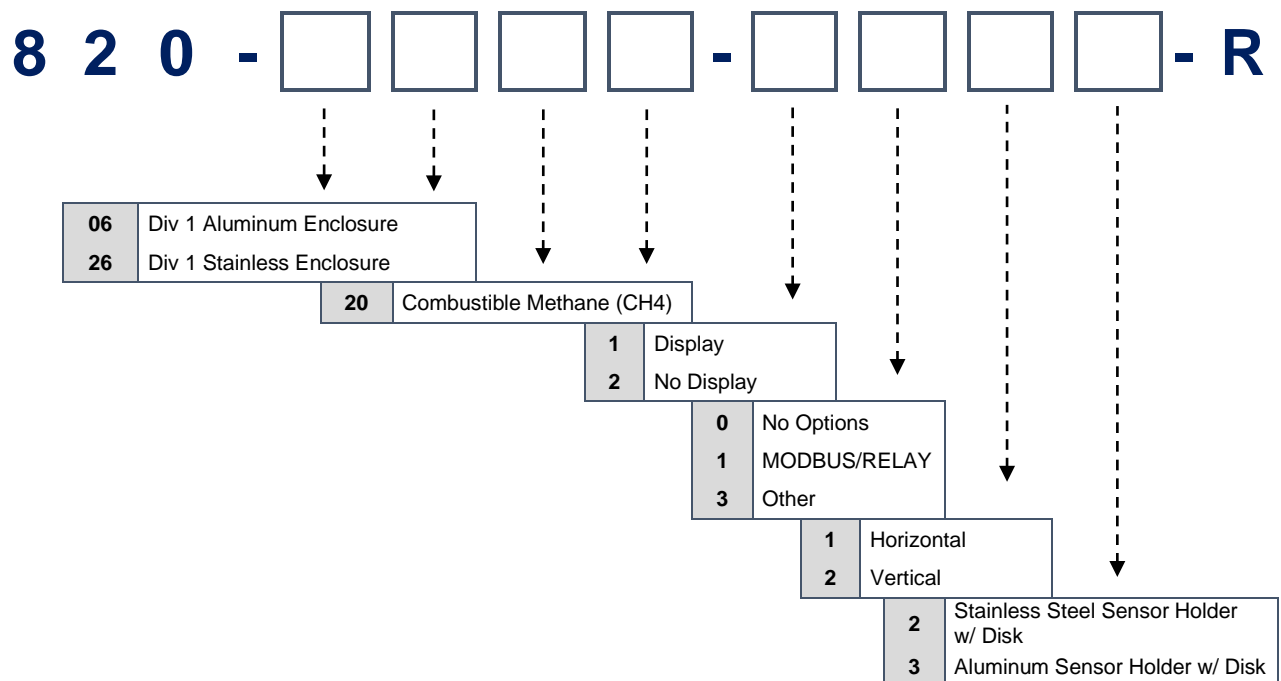
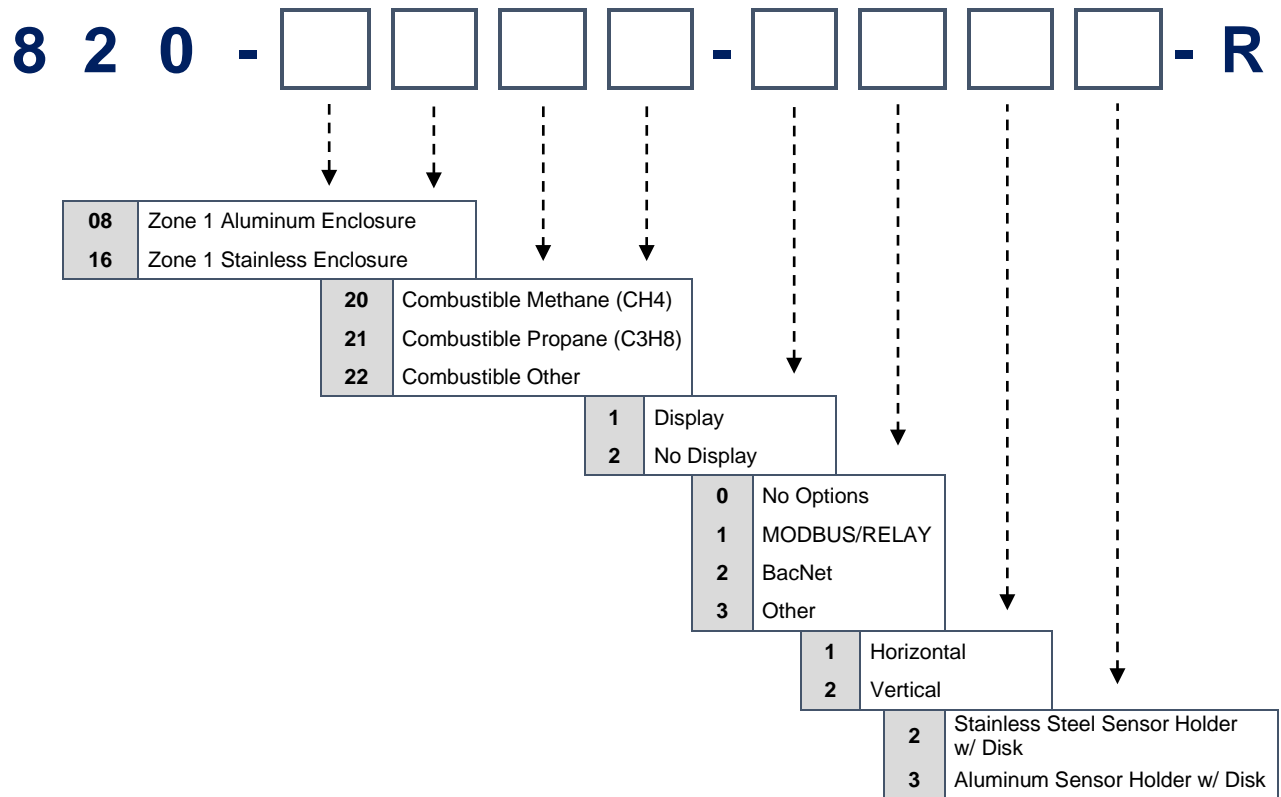
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▪ 821-0616-01-R SensAir Div1 Remote Sensor Kit

This section applies to **SensAir Div1 Combustible with Standard Sensor Interface** with the following part numbering convention:



Remote Sensor Kit (P/N 821-0616-01-R) contains the following items
(Note: References in brackets refer to letter/number references in Figure 1):

Ref No.....	Sensidyne P/N	Description
[A-5, A-7]	522-0003-01-R	Junction Condulet with two ¾ NPT openings
[A-2, A-4, A-8, A-11]	550-4003-01-R	Aluminum Condulet Nipple, ¾ NPT (Qty = 4)
(Not shown)	205-0081-02-R	Splice 2 pos (Qty = 6)
[A-9]	380-0021-01-R	Bracket Weld Assembly (Black Anodized) (Qty 1)

Conduit Seal Kit (Not shown) includes the following:	} Total of 4
7017432-R Seal – Conduit, female, ¾ NPT [A-3, A-10]	
7017229-R Kwiko Cement with Fiber Filler	

Cable Specification: 18AWG x 3 Conductor, Max length 100ft/30m.
Cable to be Customer Supplied. Alpha Wire 2423C or equivalent.

Installation

Refer to Figure 1 and install the Remote Sensor Kit as follows:

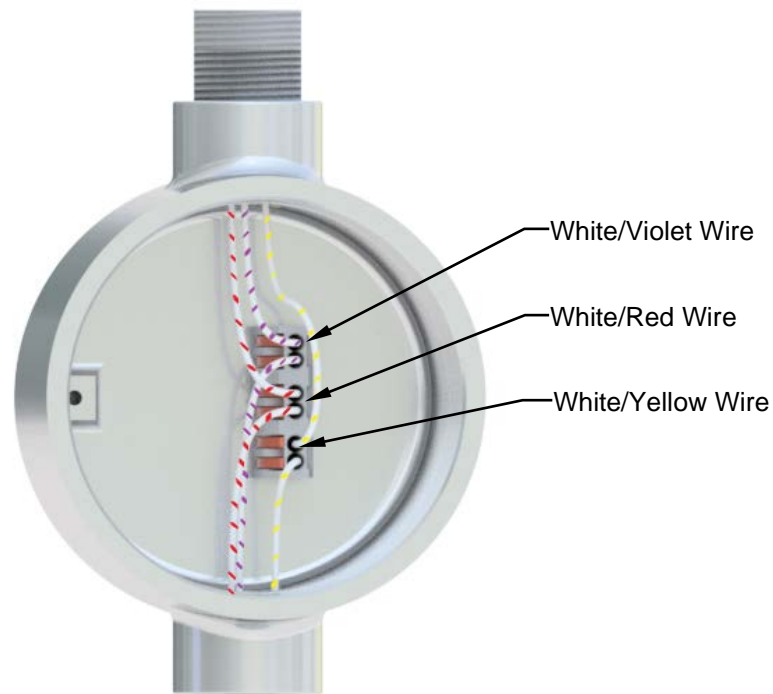
- 1) Fasten the Bracket [A-9] to the desired location. Sensor Interface Assembly must be mounted such that condensation and dust does not collect on the Sensor. Thread the wires from the Sensor Interface Assembly [A-12] through the Bracket [A-9]. Tighten to secure. (Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly).
- 2) Thread the wires from the Sensor Interface Assembly through the Condulet Nipple [A-11], the Conduit Seal [A-10], the second Condulet Nipple [A-8] and into the lower opening of the Junction Condulet [A-7]. Tighten the Nipples into Conduit Seal [A-10] and turn into the Bracket [A-9]. Tighten the Junction Condulet [A-7] into the Nipple [A-8]. (Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly).
- 3) Pack the supplied wadding into each end of the Conduit Seal to prevent the cement from leaking through.
- 4) Prepare the cement and pour it into the Conduit Seal. When the cement has set remove the wadding.
- 5) Thread the customer-supplied remote cable [A-6] into the Junction Condulet [A-7].
- 6) Wire the remote cable to the interface using 3 of the Splices provided.
Wire accordingly (W/V = White/Violet, W/R = White/Red, W/Y = White/Yellow). See image below.



Install the Condulet Gasket and Cover.

- 7) Route and secure the customer-supplied remote cable [A-6] to the Transmitter Location [A-1].
- 8) Thread the wires from the Transmitter through the Condulet Nipple [A-2], the Conduit Seal [A-3], and the second Condulet Nipple [A-4]. Tighten the Condulet Nipples into Conduit Seal [A-3] and turn into the Transmitter [A-1].
- 9) Pack the supplied wadding into each end of the Conduit Seal to prevent the cement from leaking through.
- 10) Prepare the cement and pour it into the Conduit Seal. When the cement has set remove the wadding.
- 11) Thread the wires from the Transmitter through the Junction Condulet [A-5] and turn onto the Nipple [A-4].

- 12) Wire the remote cable to the wires from the Transmitter [A-1] using 3 of the Splices provided. Wire accordingly (W/V = White/Violet, W/R = White/Red, W/Y = White/Yellow). See image below.



Install the Condulet Gasket and Cover.

- 13) You may mount and wire the transmitter to a power source at this time (leave transmitter unpowered).
- 14) Follow the instructions in User Manual to power up the transmitter.

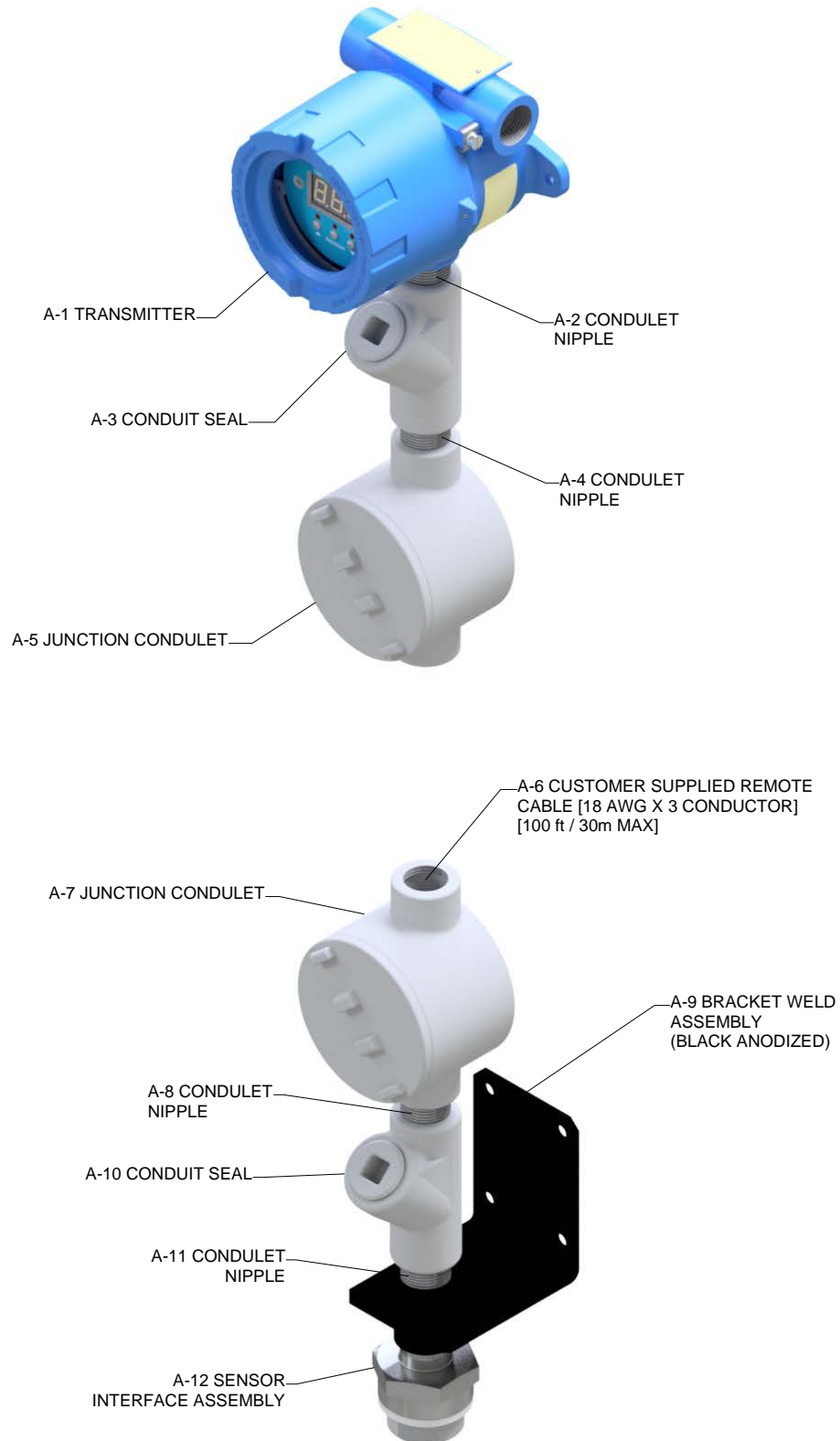


Figure 1
Remote Sensor Kit Installation
(SensAir DIV 1 Transmitters with Standard Sensor Interface)

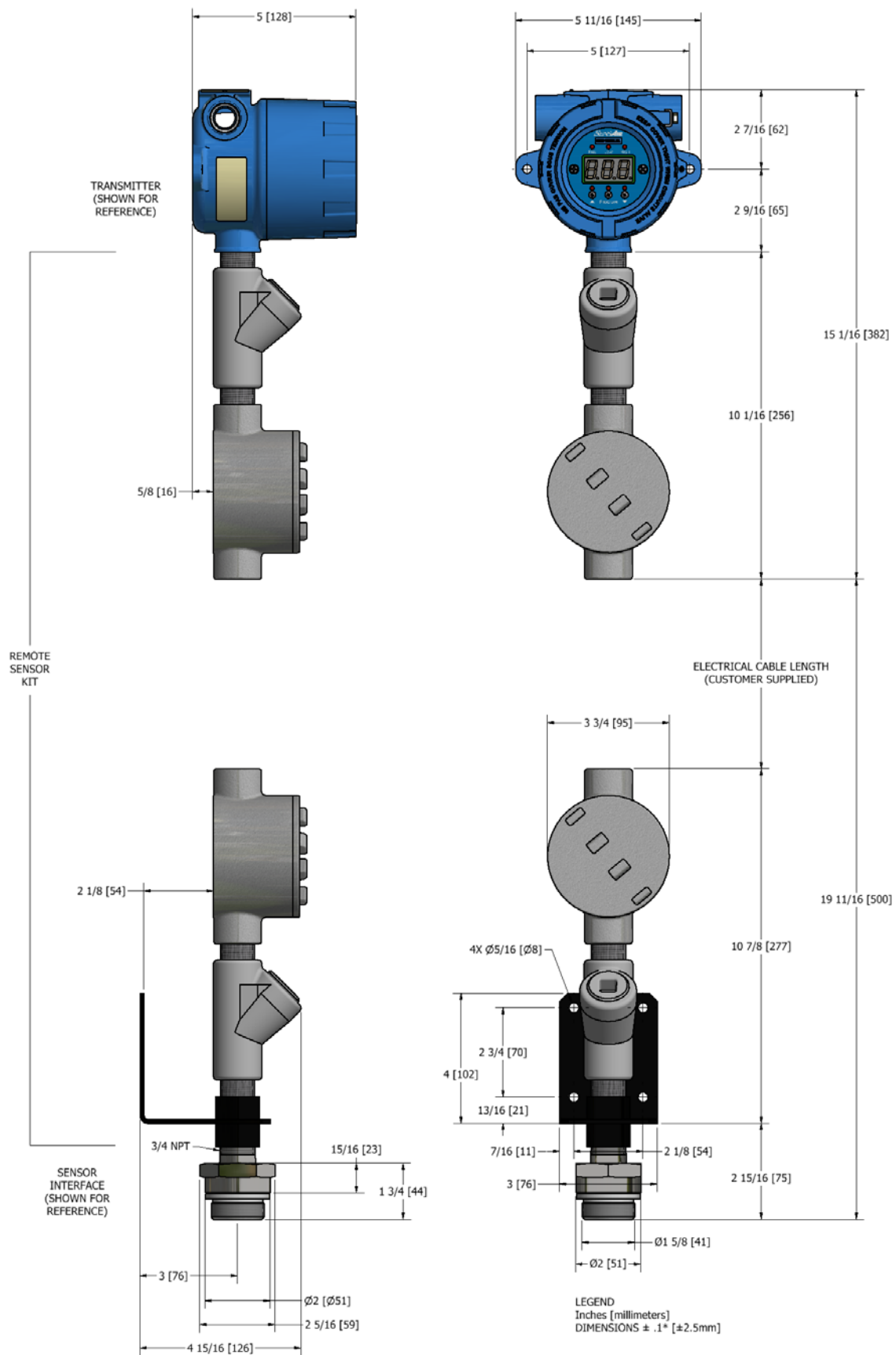
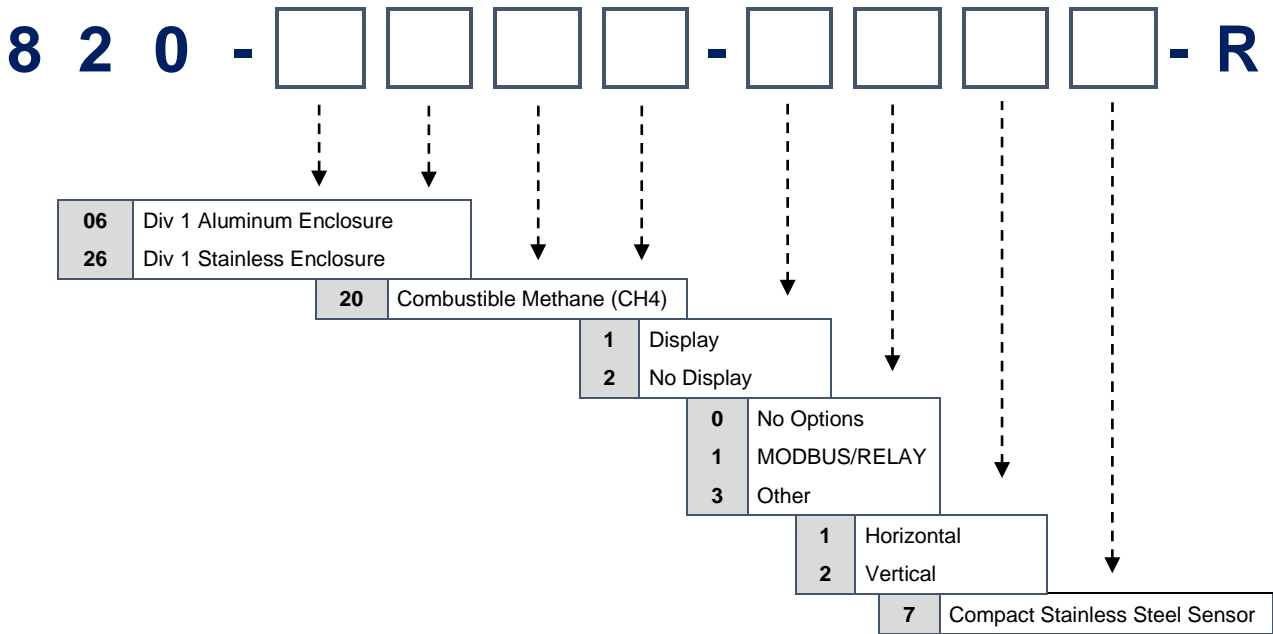


Figure 2
SensAir DIV 1 Transmitter Enclosure with Standard Sensor Interface
Remote Dimensions

▪ 821-0617-01-R SensAir Div1 Remote Sensor Kit

This section applies to SensAir Div1 Combustible with Compact Sensor Interface with the following part numbering convention:



Remote Sensor Kit (P/N 821-0617-01-R) contains the following items
(Note: References in brackets refer to letter/number references in Figure 3):

Ref No.....	Sensidyne P/N	Description
[A-5, A-7]	522-0003-01-R	Junction Condulet with two ¾ NPT openings
[A-2, A-4, A-8, A-11]	550-4003-01-R	Aluminum Condulet Nipple, ¾ NPT (Qty = 4)
(Not shown)	205-0081-02-R	Splice 2 pos (Qty = 6)
[A-9]	380-0021-01-R	Bracket Weld Assembly (Black Anodized) (Qty 1)

Conduit Seal Kit (Not shown) includes the following:

7017432-R	Seal – Conduit, female, ¾ NPT [A-3, A-10]	} Total of 4
7017229-R	Kwiko Cement with Fiber Filler	

Cable Specification: 18AWG x 3 Conductor, Max length 100ft/30m.
Cable to be Customer Supplied. Alpha Wire 2423C or equivalent.

Installation

Refer to Figure 3 and install the Remote Sensor Kit as follows:

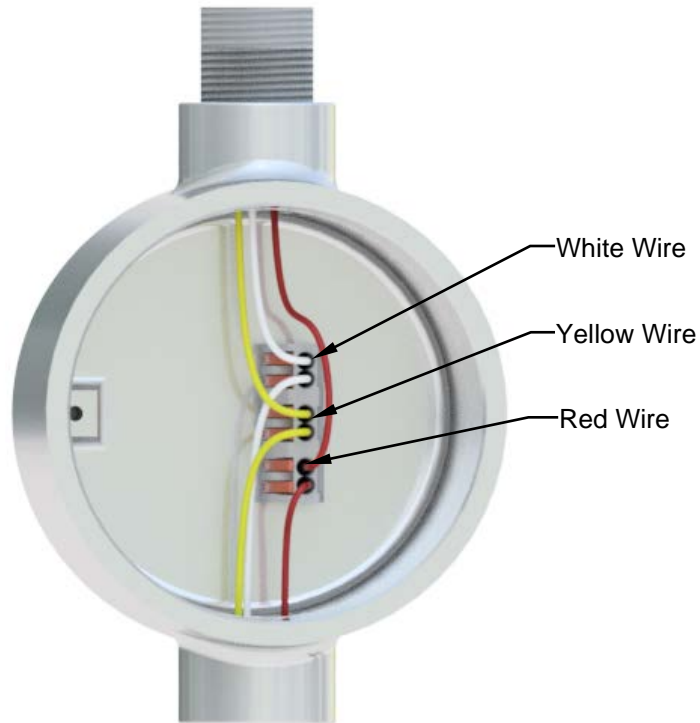
- 1) Fasten the Bracket [A-9] to the desired location. Sensor Interface Assembly must be mounted such that condensation and dust does not collect on the Sensor. Thread the wires from the Sensor Interface Assembly [A-12] through the Bracket [A-9]. Tighten to secure. (Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly).
- 2) Thread the wires from the Sensor Interface Assembly through the Condulet Nipple [A-11], the Conduit Seal [A-10], the second Condulet Nipple [A-8] and into the lower opening of the Junction Condulet [A-7]. Tighten the Nipples into Conduit Seal [A-10] and turn into the Bracket [A-9]. Tighten the Junction Condulet [A-7] into the Nipple [A-8]. (Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly).
- 3) Pack the supplied wadding into each end of the Conduit Seal to prevent the cement from leaking through.
- 4) Prepare the cement and pour it into the Conduit Seal. When the cement has set remove the wadding.
- 5) Thread the customer-supplied remote cable [A-6] into the Junction Condulet.
- 6) Wire the remote cable to the interface using 3 of the Splices provided.
Wire accordingly (W = White, Y = Yellow, R = Red). See image below.



Install the Condulet Gasket and Cover.

- 7) Route and secure the customer-supplied remote cable [A-6] to the Transmitter Location [A-1].
- 8) Thread the wires from the Transmitter through the Condulet Nipple [A-2], the Conduit Seal [A-3], and the second Condulet Nipple [A-4]. Tighten the Nipples into Conduit Seal [A-3] and turn into the Transmitter [A-1].
- 9) Pack the supplied wadding into each end of the Conduit Seal to prevent the cement from leaking through.
- 10) Prepare the cement and pour it into the Conduit Seal. When the cement has set remove the wadding.
- 11) Thread the wires from the Transmitter through the Junction Condulet [A-5] and turn onto the Nipple [A-4].

- 12) Wire the remote cable to the wires from the Transmitter [A-1] using 3 of the Splices provided. Wire accordingly (W = White, Y = Yellow, R = Red). See image below.



Install the Condulet Gasket and Cover.

- 13) You may mount and wire the transmitter to a power source at this time (leave transmitter unpowered).
- 14) Follow the instructions in User Manual to power up the transmitter.

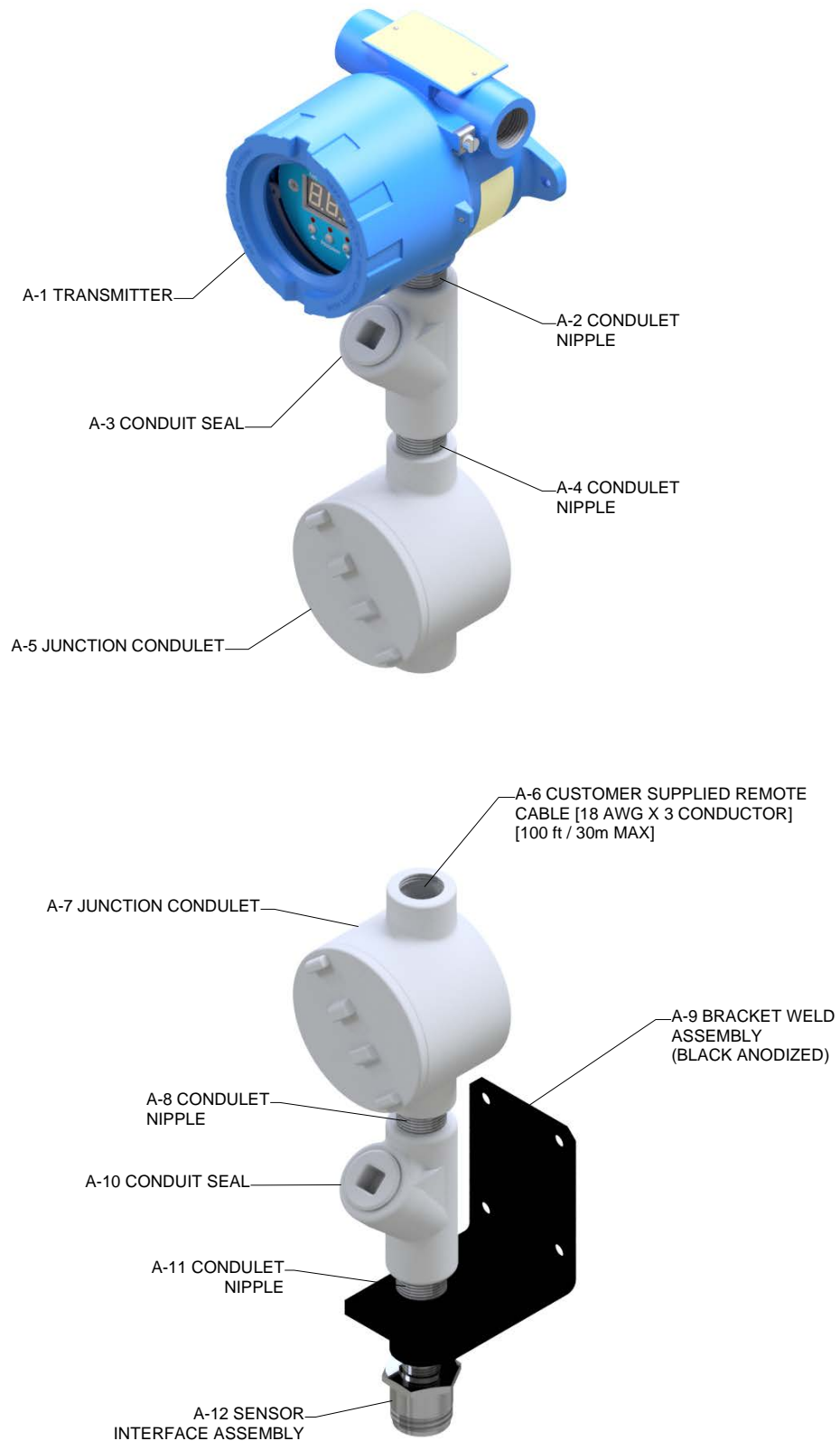


Figure 3
Remote Sensor Kit Installation
(SensAir DIV 1 Transmitters with Compact Sensor Interface)

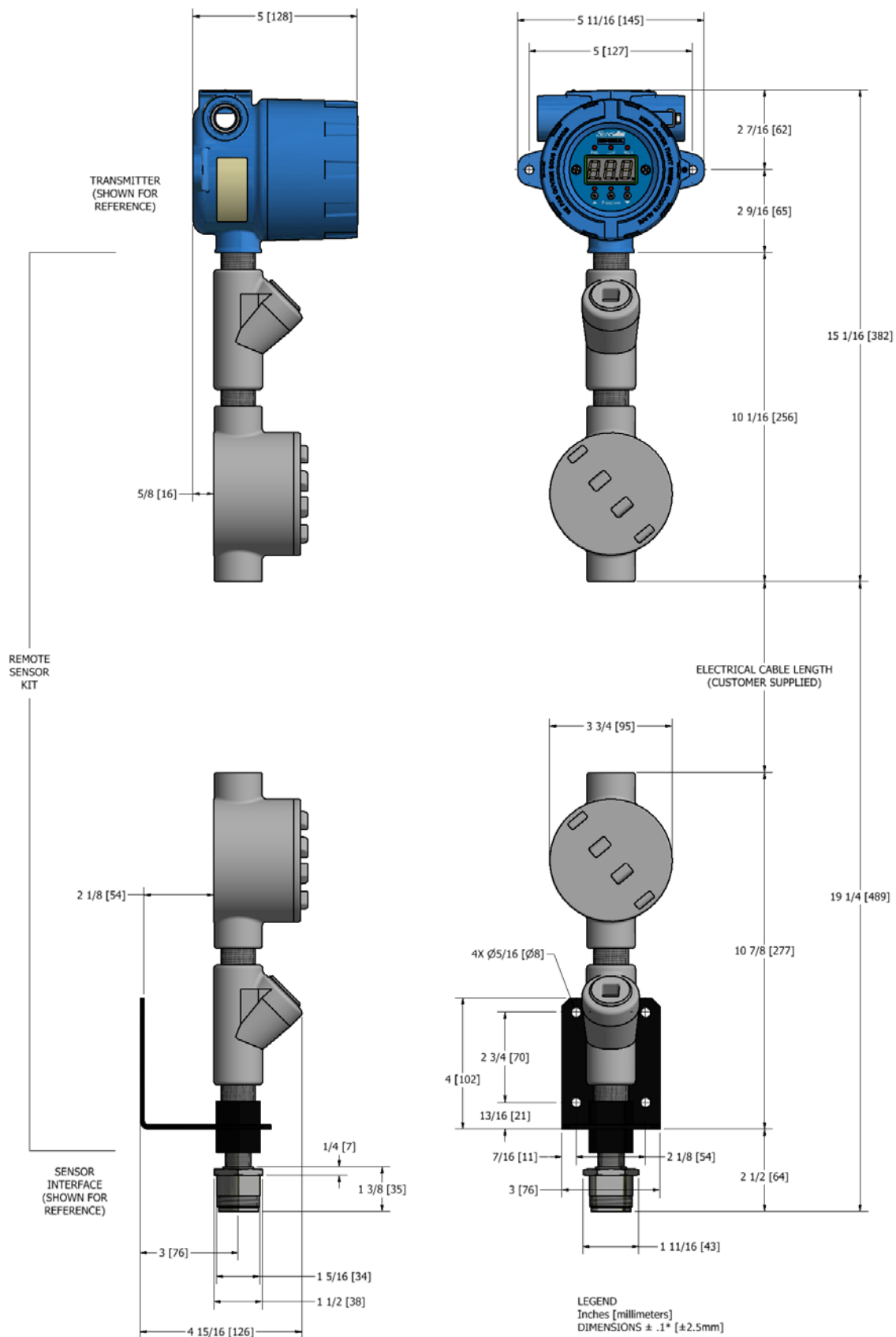
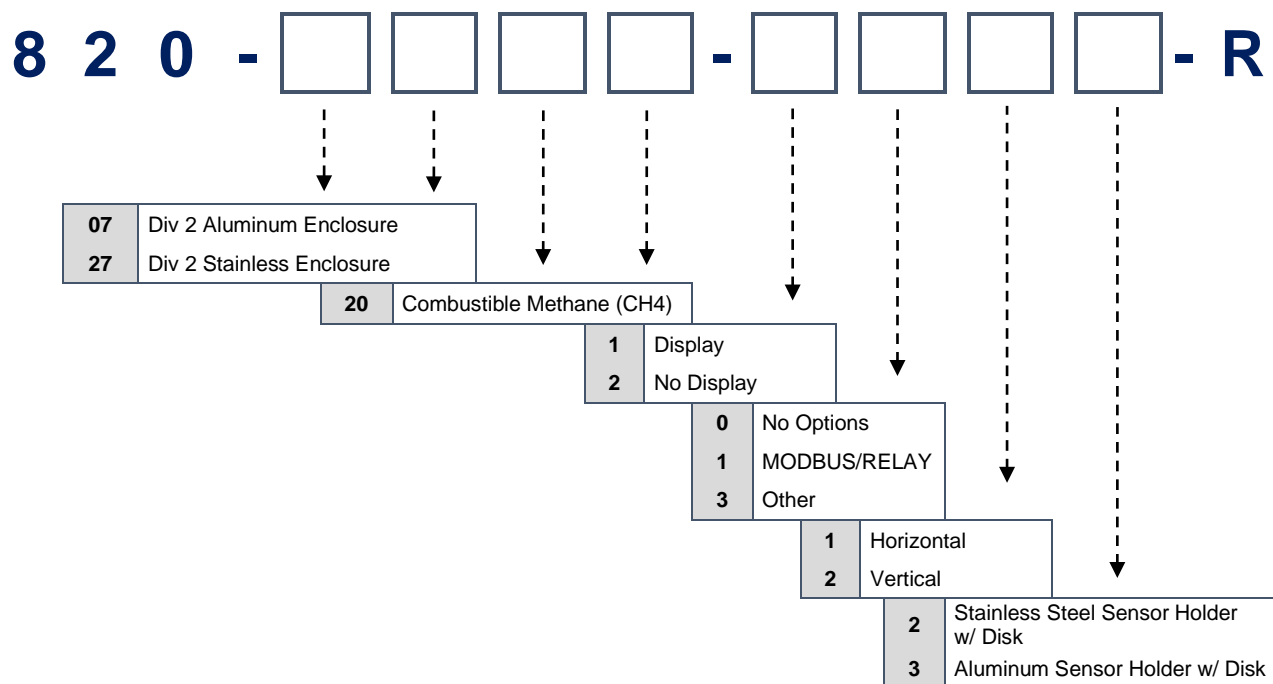
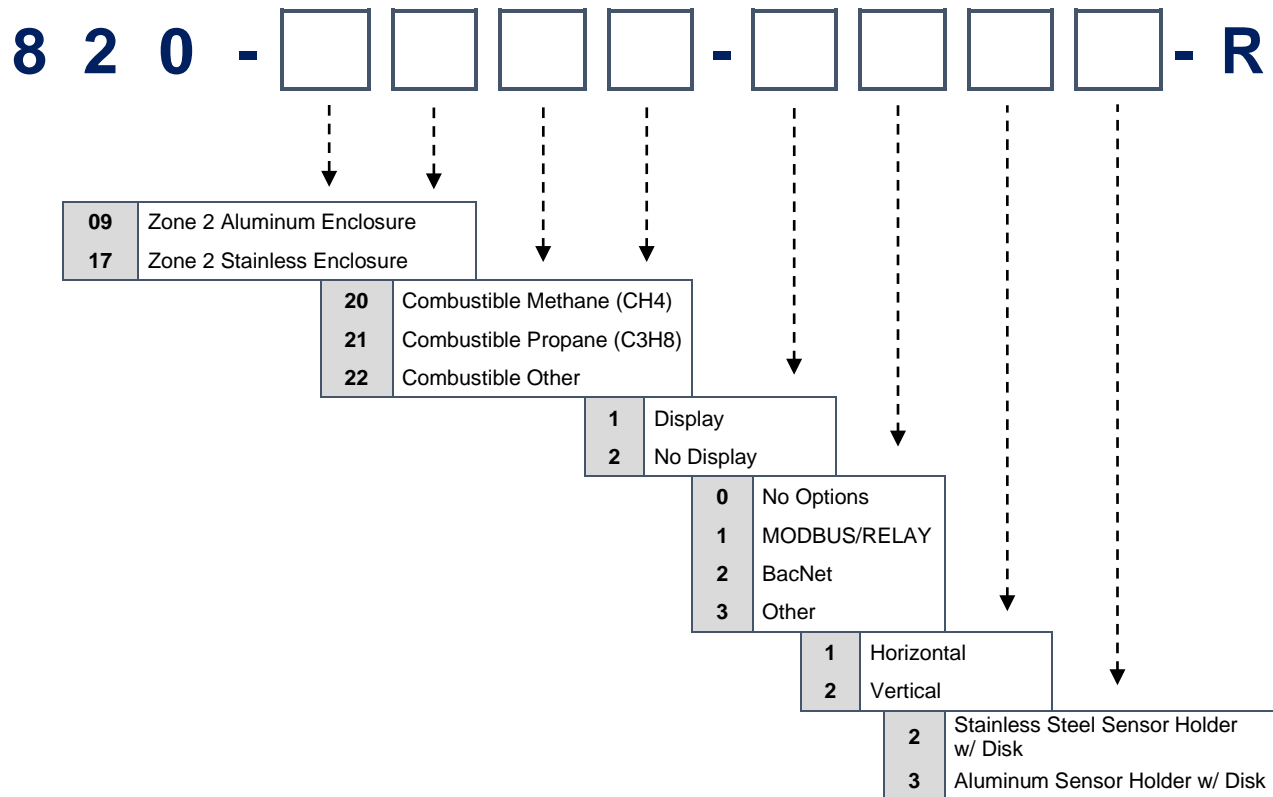


Figure 4
SensAir DIV 1 Transmitter Enclosure with Compact Sensor Interface
Remote Dimensions

▪ 821-0616-02-R SensAir Div2 Remote Sensor Kit

This section applies to **SensAir Div2 Combustible with Standard Sensor Interface** with the following part numbering convention:



Remote Sensor Kit (P/N 821-0616-02-R) contains the following items
(Note: References in brackets refer to letter/number references in Figure 5):

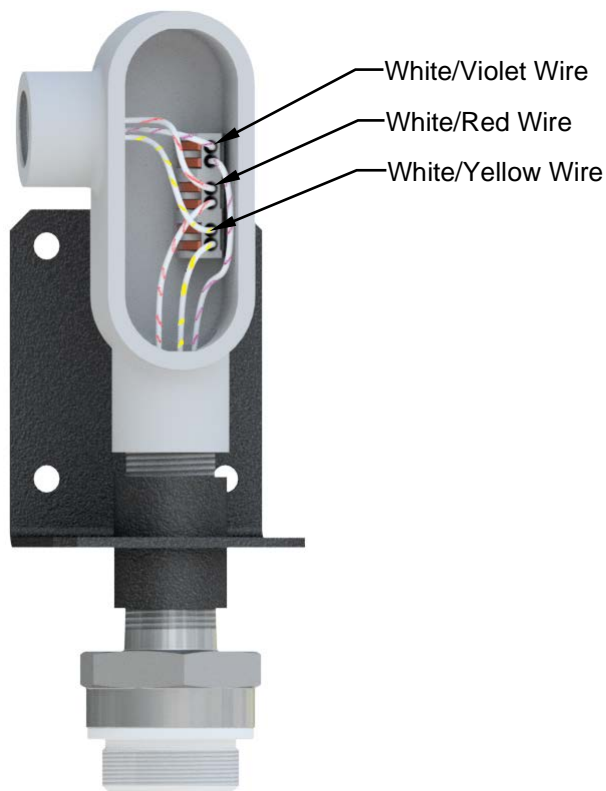
Ref No.....	Sensidyne P/N	Description
[A-5]	522-0002-01-R	Junction Condulet with two ¾ NPT openings
[A-5, A-7]	522-0002-02-R	Cover, Condulet (Qty = 2) (Shown Assembled)
[A-5, A-7]	522-0002-03-R	Gasket, Neoprene, (Qty = 2) (Shown Assembled)
[A-7]	522-0002-04-R	Junction Condulet with two 90° ¾ NPT openings
[A-2, A-8]	550-4003-01-R	Aluminum Condulet Nipple, ¾ NPT (Qty 2)
(Not shown)	205-0081-01-R	Splice 2 pos (Qty = 6)
[A-9]	380-0021-01-R	Bracket Weld Assembly (Black Anodized) (Qty 1)

Cable Specification: 18AWG x 3 Conductor, Max length 100ft/30m.
Cable to be Customer Supplied. Alpha Wire 2423C or equivalent.

Installation

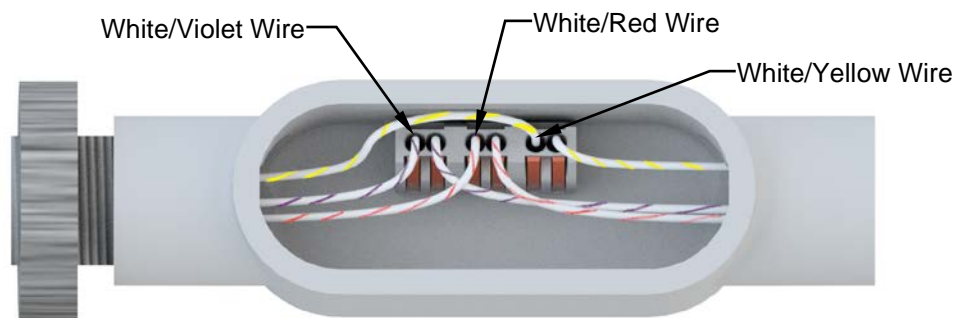
Refer to Figure 5 and install the Remote Sensor Kit as follows:

- 1) Fasten the Bracket [A-9] to the desired location. Sensor Interface Assembly must be mounted such that condensation and dust does not collect on the Sensor. Thread the wires from the Sensor Interface Assembly [A-10] through the Bracket [A-9] and Nipple [A-8], tighten to secure.
(Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly.)
- 2.) Thread the wires from the Sensor Interface Assembly [A-10] into the lower opening of the Junction Condulet [A-5]. Tighten the Junction Condulet [A-5] to the Nipple [A-8].
(Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly.)
- 3) Thread the customer-supplied remote cable [A-6] into the Junction Condulet.
- 4) Wire the remote cable to the interface using 3 of the Splices provided.
Wire accordingly (W/V = White/Violet, W/R = White/Red, W/Y = White/Yellow). See image below.



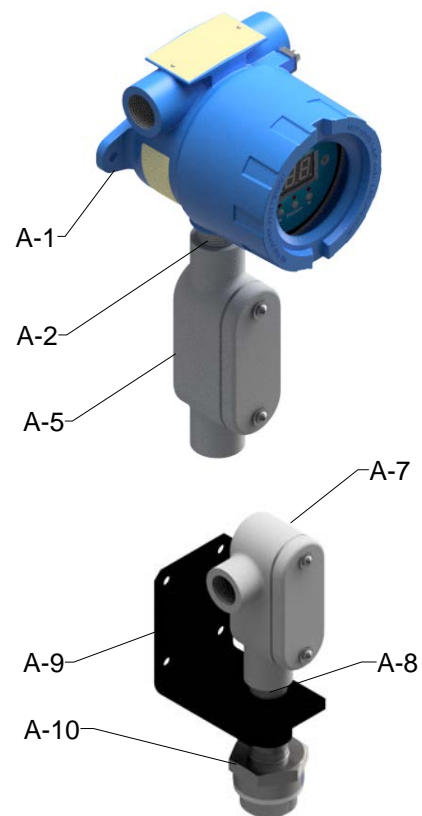
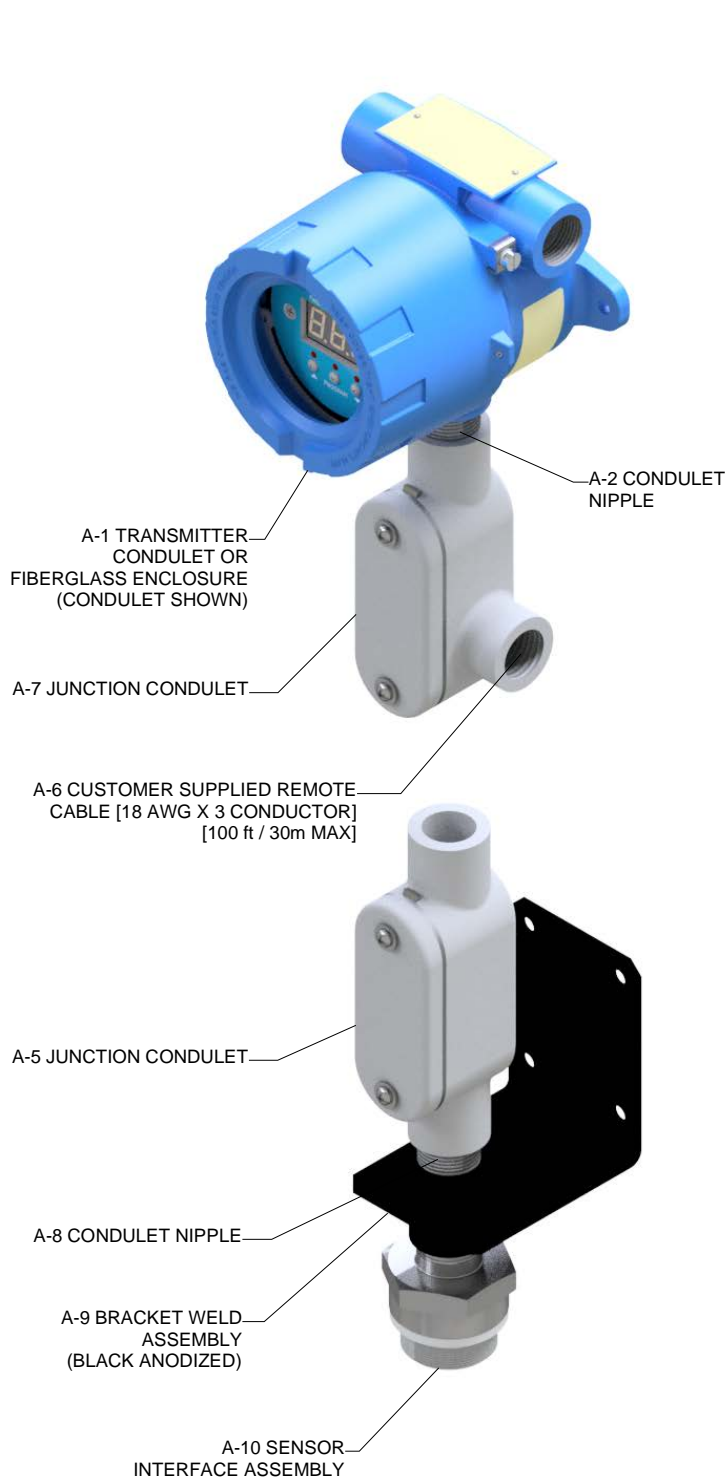
Install the Condulet Gasket and Cover.

- 5) Route and secure the customer-supplied remote cable [A-6] to the Transmitter Location [A-1].
- 6) Thread the wires from the Transmitter [A-1] through the Condulet Nipple [A-2] and install nipple into the Transmitter.
- 7) Thread the wires from the Transmitter through the Junction Condulet [A-7] and turn onto the Nipple.
- 8) Install the remote cable into the Junction Condulet [A-7].
- 9) Wire the remote cable to the wires from the Transmitter [A-1] using 3 of the Splices provided. Wire accordingly (W/V = White/Violet, W/R = White/Red, W/Y = White/Yellow). See image below.



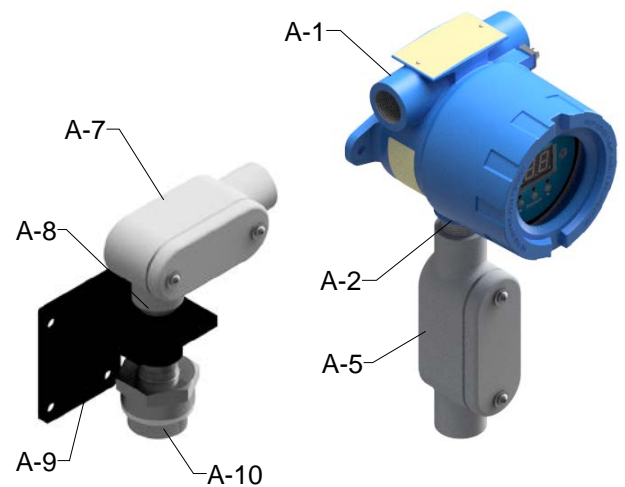
Install the Condulet Gasket and Cover.

- 10) You may mount and wire the transmitter to a power source at this time (leave transmitter unpowered).
- 11) Follow the instructions in User Manual to power up the transmitter.



Alternative 1

Interchange Conduit Bodies A-5 and A-7



Alternative 2 Ceiling Mount

Invert Mounting Bracket A-9, Interchange Conduit Bodies A-5 and A-7

Figure 5
Remote Sensor Kit Installation
(SensAir DIV 2 Transmitters with Standard Sensor Interface)

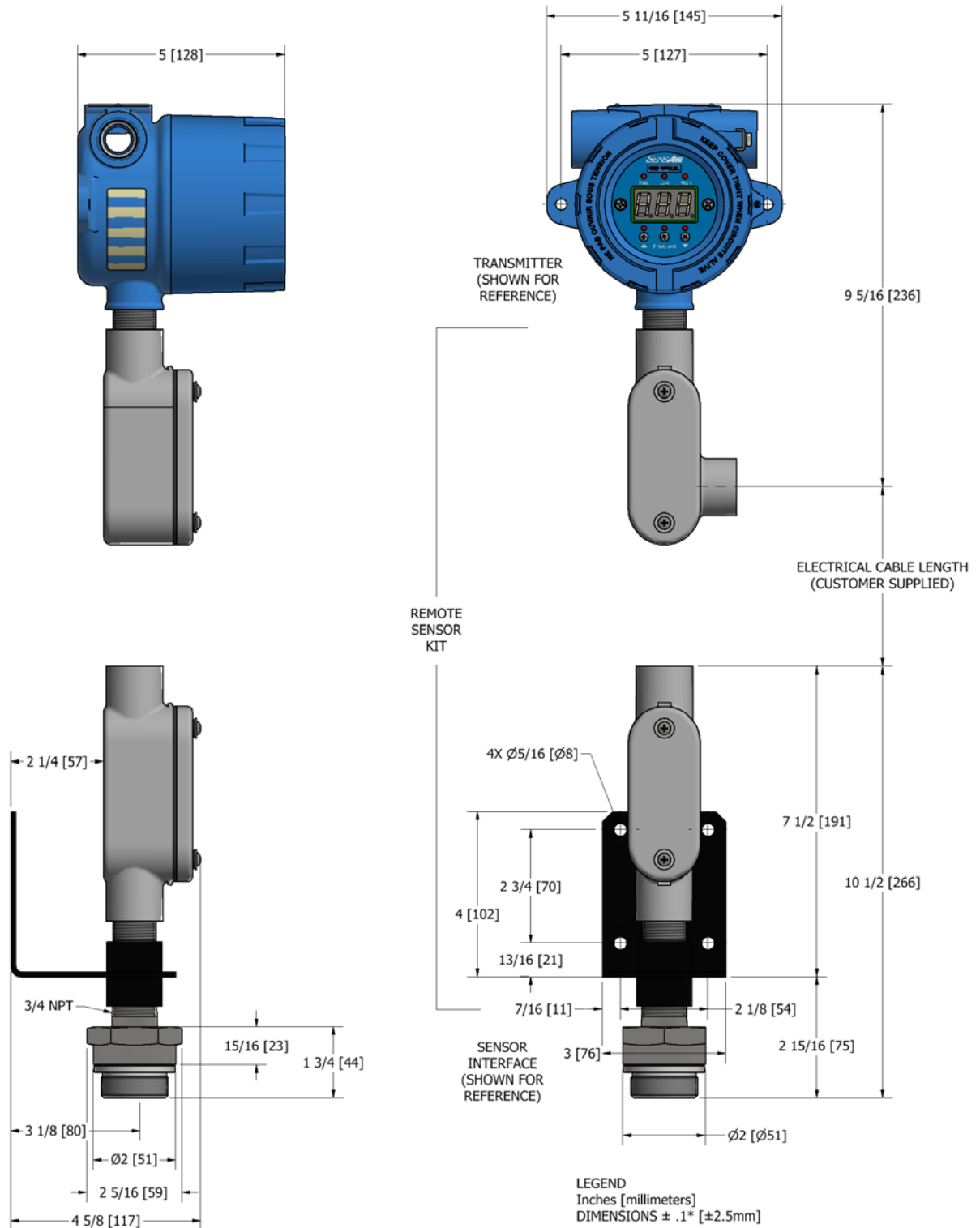
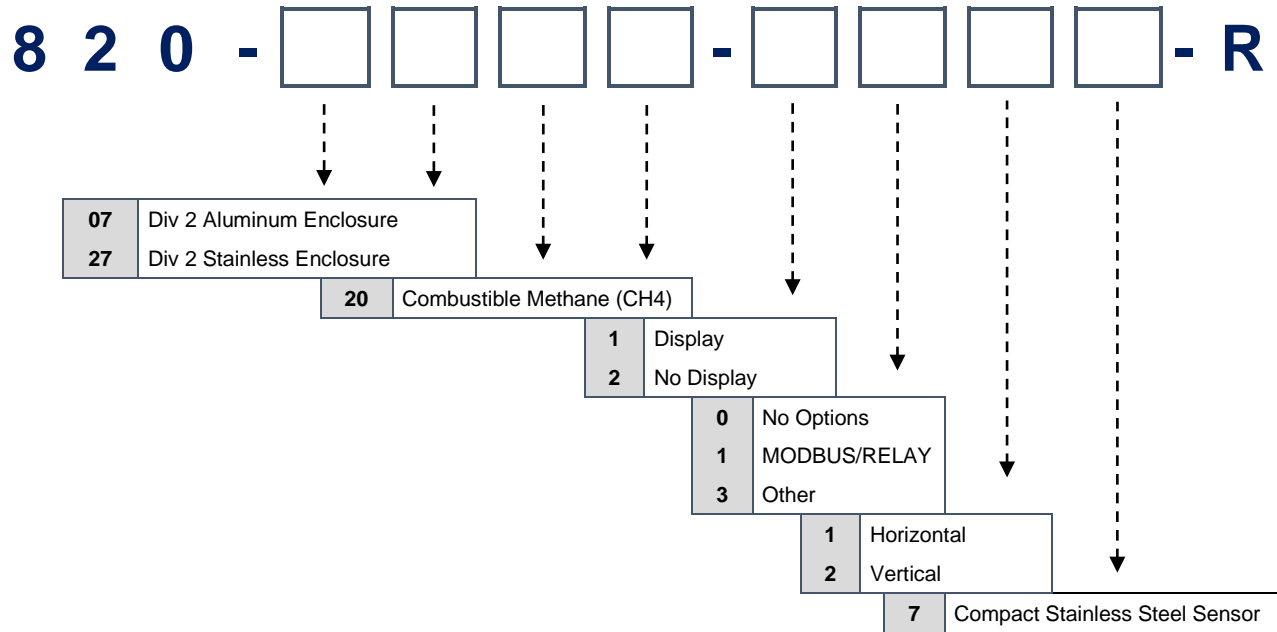


Figure 6
SensAir DIV 2 Transmitter Enclosure with Standard Sensor Interface
Remote Dimensions

▪ 821-0617-02-R SensAir Div2 Remote Sensor Kit

This section applies to SensAir Div2 Combustible with Compact Sensor Interface with the following part numbering convention:



Remote Sensor Kit (P/N 821-0616-02-R) contains the following items
(Note: References in brackets refer to letter/number references in Figure 7):

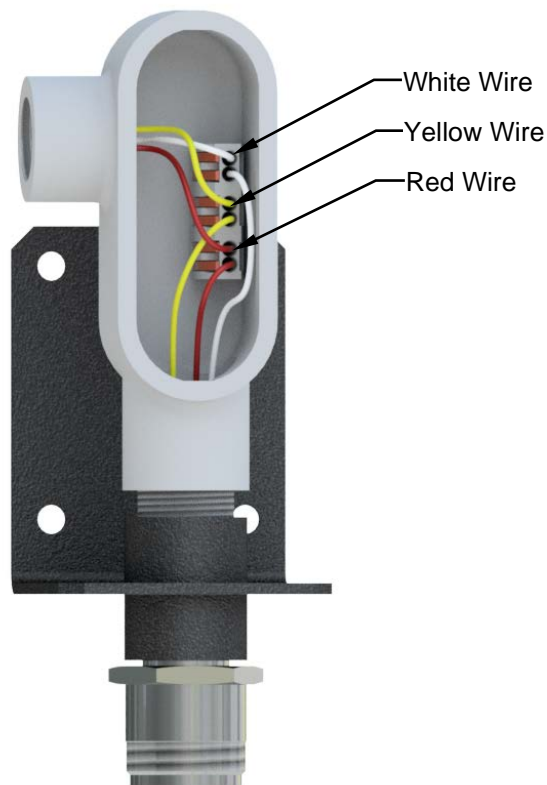
Ref No.....	Sensidyne P/N	Description
[A-5]	522-0002-01-R	Junction Condulet with two $\frac{3}{4}$ NPT openings
[A-5, A-7]	522-0002-02-R	Cover, Condulet (Qty = 2) (Shown Assembled)
[A-5, A-7]	522-0002-03-R	Gasket, Neoprene, (Qty = 2) (Shown Assembled)
[A-7]	522-0002-04-R	Junction Condulet with two 90° $\frac{3}{4}$ NPT openings
[A-2, A-8]	550-4003-01-R	Aluminum Condulet Nipple, $\frac{3}{4}$ NPT (Qty 2)
(Not shown)	205-0081-01-R	Splice 2 pos (Qty = 6)
[A-9]	380-0021-01-R	Bracket Weld Assembly (Black Anodized) (Qty 1)

Cable Specification: 18AWG x 3 Conductor, Max length 100ft/30m.
Cable to be Customer Supplied. Alpha Wire 2423C or equivalent.

Installation

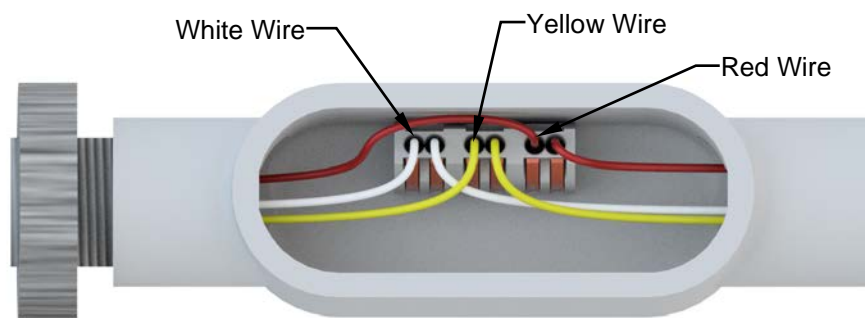
Refer to Figure 7 and install the Remote Sensor Kit as follows:

- 1) Fasten the Bracket [A-9] to the desired location. Sensor Interface Assembly must be mounted such that condensation and dust does not collect on the Sensor. Thread the wires from the Sensor Interface Assembly [A-10] through the Bracket [A-9] and Nipple [A-8], tighten to secure.
(Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly).
- 2.) Thread the wires from the Sensor Interface Assembly [A-8] into the lower opening of the Junction Condulet [A-5]. Tighten the Junction Condulet [A-5] to the Nipple [A-8].
(Note: If you are using tools to tighten the Sensor Interface Assembly make certain you use them ONLY on the hex nut at the top of the Sensor Interface Assembly.)
- 3) Thread the customer-supplied remote cable [A-6] into the Junction Condulet.
- 4) Wire the remote cable to the interface using 3 of the Splices provided.
Wire accordingly (W = White, Y = Yellow, R = Red). See image below.



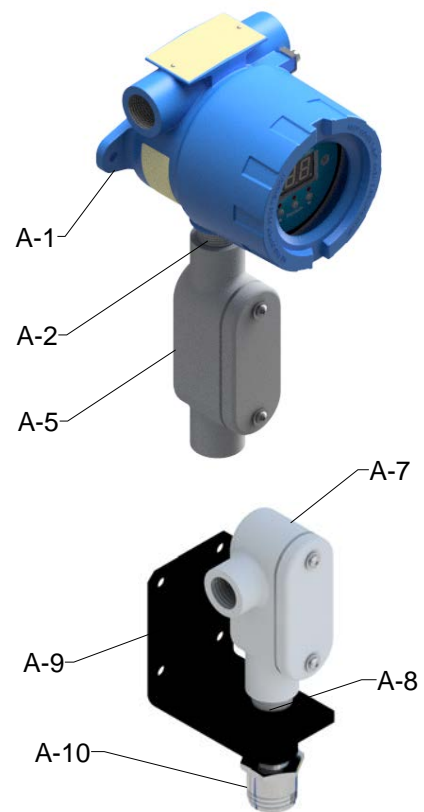
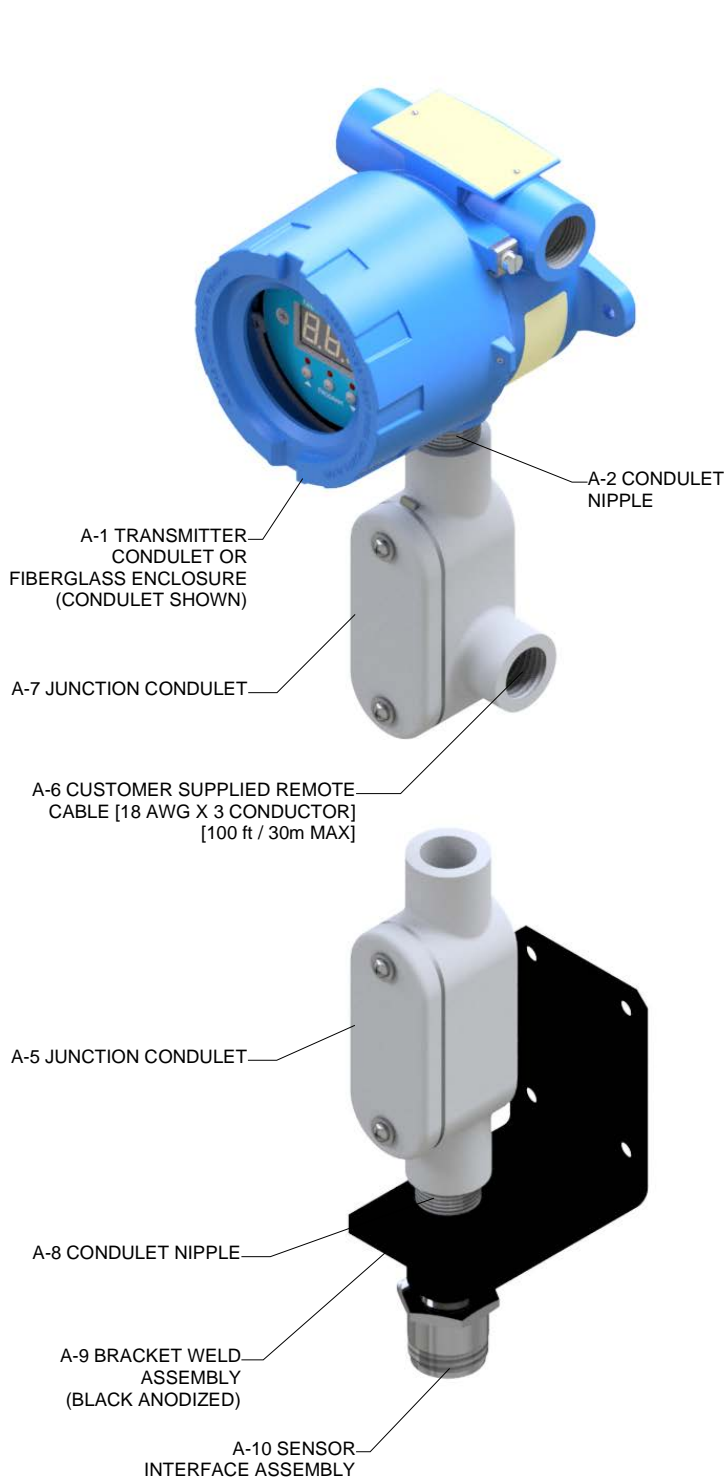
Install the Condulet Gasket and Cover.

- 5) Route and secure the customer-supplied remote cable [A-6] to the Transmitter Location [A-1].
- 6) Thread the wires from the Transmitter [A-1] through the Condulet Nipple [A-2] and install nipple into the Transmitter.
- 7) Thread the wires from the Transmitter through the Junction Condulet [A-7] and turn onto the Nipple
- 8) Install the remote cable into the Junction Condulet [A-7].
- 9) Wire the remote cable to the wires from the Transmitter [A-1] using 3 of the Splices provided. Wire accordingly (W = White, Y = Yellow, R = Red). See image below.



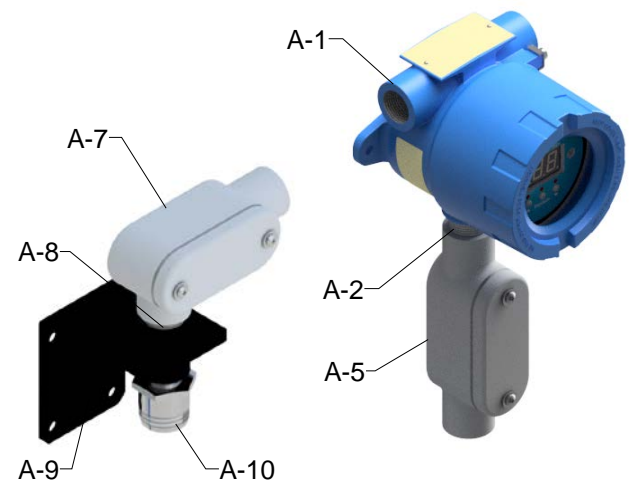
Install the Condulet Gasket and Cover.

- 10) You may mount and wire the transmitter to a power source at this time (leave transmitter unpowered).
- 11) Follow the instructions in User Manual to power up the transmitter.



Alternative 1

Interchange Conduit Bodies A-5 and A-7



Alternative 2 Ceiling Mount

Invert Mounting Bracket A-9, Interchange Conduit Bodies A-5 and A-7

Figure 7
Remote Sensor Kit Installation
(SensAir DIV 2 Transmitters with Compact Sensor Interface)

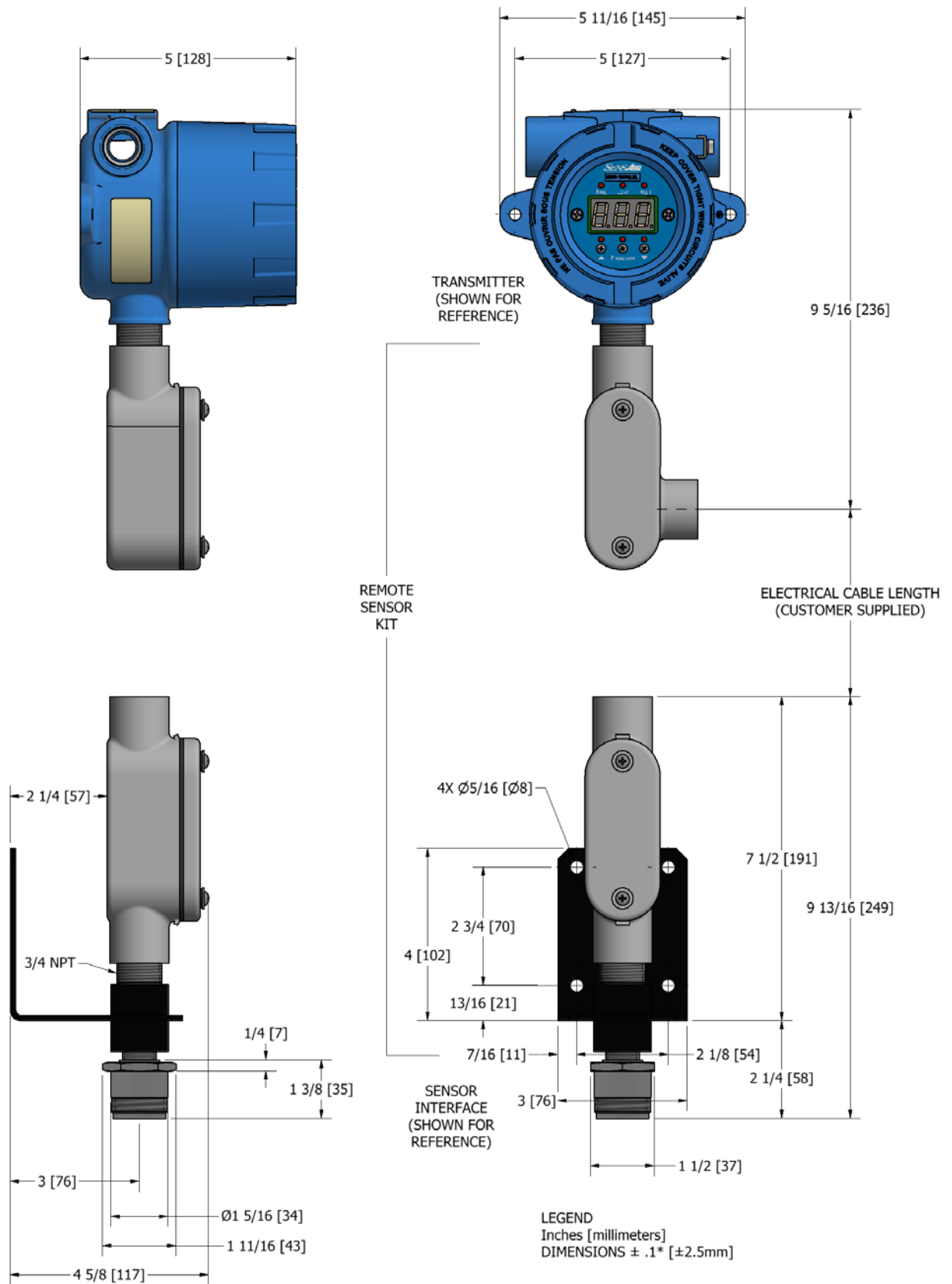


Figure 8
SensAir DIV 2 Transmitter Enclosure with Compact Sensor Interface
Remote Dimensions



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