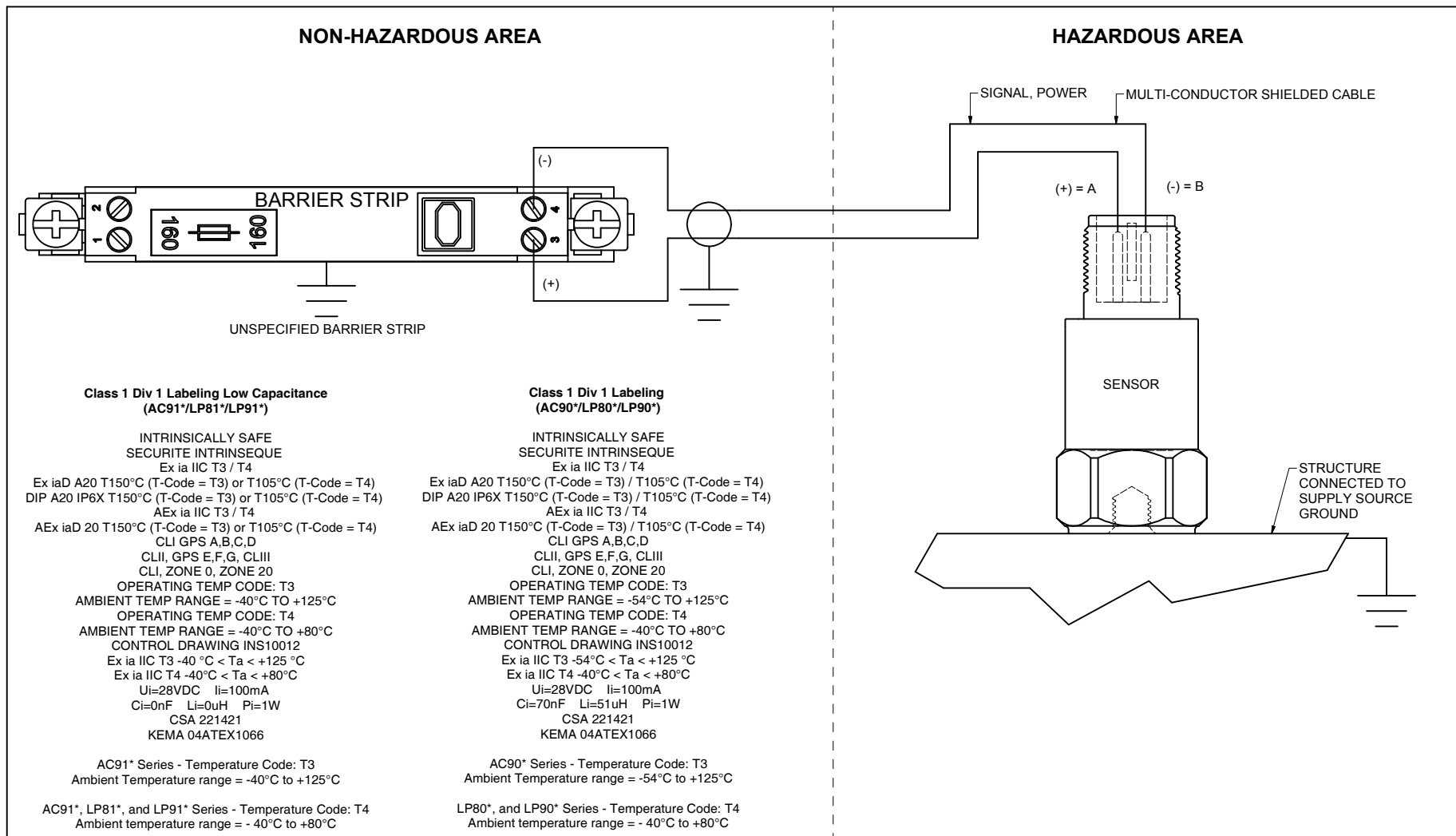


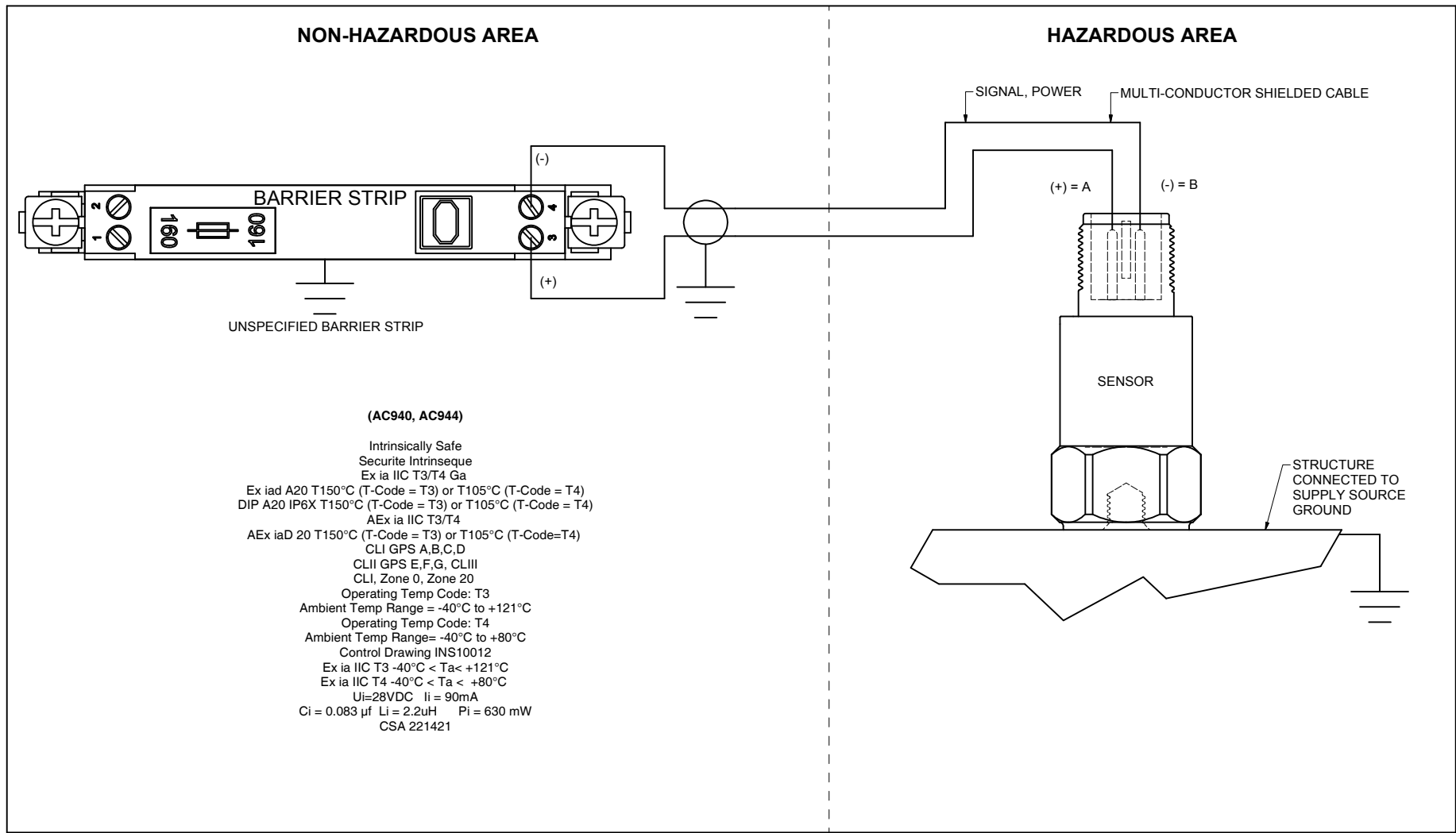


NOTES:

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C	ADD TA/TRIAX VARIATIONS	-	DMG	CRW	5/1/2015	-	-
B	UPDATE TO ADD LOW CAPACITANCE/DUST APPROVAL	-	DMG	SAS	12/21/2009	-	-
A	UPDATE TO LP TEMP CODE CHANGE, ZONE DESIGNATION ADDED	-	JDB	SAS	4/27/2007	-	-
REV	DESCRIPTION	ECO#	DESIGNER	ENG APPROVED	DATE	MFG APPROVED	DATE

 CONNECTION TECHNOLOGY CENTER, INC	MATERIAL -	ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE SPECIFIED
		TOLERANCES (UNLESS SPECIFIED) XXX ± 0.005 XX ± 0.01 X ± 0.1 ANGLE ± 2° BREAK ALL SHARP EDGES .010 MAX
		63 
PART #: INS10012		SHEET 1 / 8
DESCRIPTION: INTRINSIC SAFE SENSOR CONTROL DRAWING		NOT DRAWN TO SCALE



(AC940, AC944)

Intrinsically Safe
Securite Intrinseque
Ex ia IIC T3/T4 Ga

Ex iad A20 T150°C (T-Code = T3) or T105°C (T-Code = T4)
DIP A20 IP6X T150°C (T-Code = T3) or T105°C (T-Code = T4)
AEx ia IIC T3/T4

AEx iaD 20 T150°C (T-Code = T3) or T105°C (T-Code=T4)
CLi GPS A,B,C,D
CLII GPS E,F,G, CLIII
CLi, Zone 0, Zone 20

Operating Temp Code: T3
Ambient Temp Range = -40°C to +121°C
Operating Temp Code: T4
Ambient Temp Range= -40°C to +80°C
Control Drawing INS10012
Ex ia IIC T3 -40°C < Ta < +121°C
Ex ia IIC T4 -40°C < Ta < +80°C
Ui=28VDC li = 90mA
Ci = 0.083 µf Li = 2.2uH Pi = 630 mW
CSA 221421

NOTES:
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A	UPDATE TO LP TEMP CODE CHANGE, ZONE DESIGNATION ADDED	-	JDB	SAS	4/27/2007	-	-
REV	DESCRIPTION	ECO#	DESIGNER	ENG APPROVED	DATE	MFG APPROVED	DATE



MATERIAL	ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE SPECIFIED TOLERANCES (UNLESS SPECIFIED) XXX ± 0.005 XX ± 0.01 X ± 0.1 ANGLE ± 2° BREAK ALL SHARP EDGES .010 MAX
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PART #:	INS10012	SHEET
DESCRIPTION:	INTRINSIC SAFE SENSOR CONTROL DRAWING	2 / 8
		NOT DRAWN TO SCALE

D

C

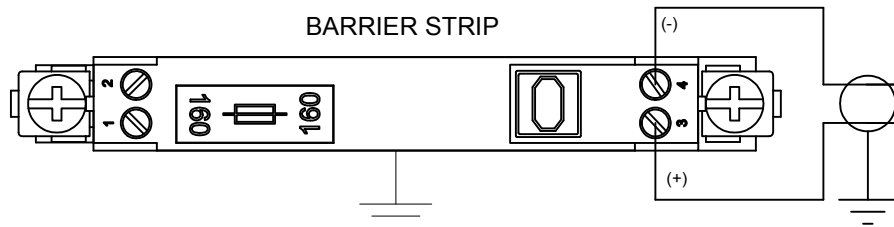
D

B

A

NON-HAZARDOUS AREA

BARRIER STRIP



UNSPECIFIED BARRIER STRIP

Class 1 Div 1 Labeling Low Capacitance
(AC91*/LP81*/LP91*)INTRINSICALLY SAFE
SECURITE INTRINSEQUE

Ex ia IIC T3 / T4

Ex iaD A20 T150°C (T-Code = T3) or T105°C (T-Code = T4)
DIP A20 IP6X T150°C (T-Code = T3) or T105°C (T-Code = T4)

AEx ia IIC T3 / T4

AEx iaD 20 T150°C (T-Code = T3) or T105°C (T-Code = T4)

CL I GPS A,B,C,D

CL II, GPS E,F,G, CL III

CL I, ZONE 0, ZONE 20

OPERATING TEMP CODE: T3

AMBIENT TEMP RANGE = -40°C TO +125°C

OPERATING TEMP CODE: T4

AMBIENT TEMP RANGE = -40°C TO +80°C

CONTROL DRAWING INS10012

Ex ia IIC T3 -40°C < Ta < +125°C

Ex ia IIC T4 -40°C < Ta < +80°C

Ui=28VDC Ii=100mA

Ci=0nF Li=0uH Pi=1W

CSA 221421

KEMA 04ATEX1066

AC91* Series - Temperature Code: T3

Ambient Temperature range = -40°C to +125°C

AC91*, LP81*, and LP91* Series - Temperature Code: T4

Ambient temperature range = -40°C to +80°C

Class 1 Div 1 Labeling
(AC90*/LP80*/LP90*)INTRINSICALLY SAFE
SECURITE INTRINSEQUE

Ex ia IIC T3 / T4

Ex iaD A20 T150°C (T-Code = T3) / T105°C (T-Code = T4)
DIP A20 IP6X T150°C (T-Code = T3) / T105°C (T-Code = T4)

AEx ia IIC T3 / T4

AEx iaD 20 T150°C (T-Code = T3) / T105°C (T-Code = T4)

CL I GPS A,B,C,D

CL II, GPS E,F,G, CL III

CL I, ZONE 0, ZONE 20

OPERATING TEMP CODE: T3

AMBIENT TEMP RANGE = -54°C TO +125°C

OPERATING TEMP CODE: T4

AMBIENT TEMP RANGE = -40°C TO +80°C

CONTROL DRAWING INS10012

Ex ia IIC T3 -54°C < Ta < +125°C

Ex ia IIC T4 -40°C < Ta < +80°C

Ui=28VDC Ii=100mA

Ci=70nF Li=5uH Pi=1W

CSA 221421

KEMA 04ATEX1066

AC90* Series - Temperature Code: T3

Ambient Temperature range = -54°C to +125°C

LP80*, and LP90* Series - Temperature Code: T4

Ambient temperature range = -40°C to +80°C

HAZARDOUS AREA

SIGNAL, POWER

MULTI-CONDUCTOR SHIELDED CABLE

SENSOR

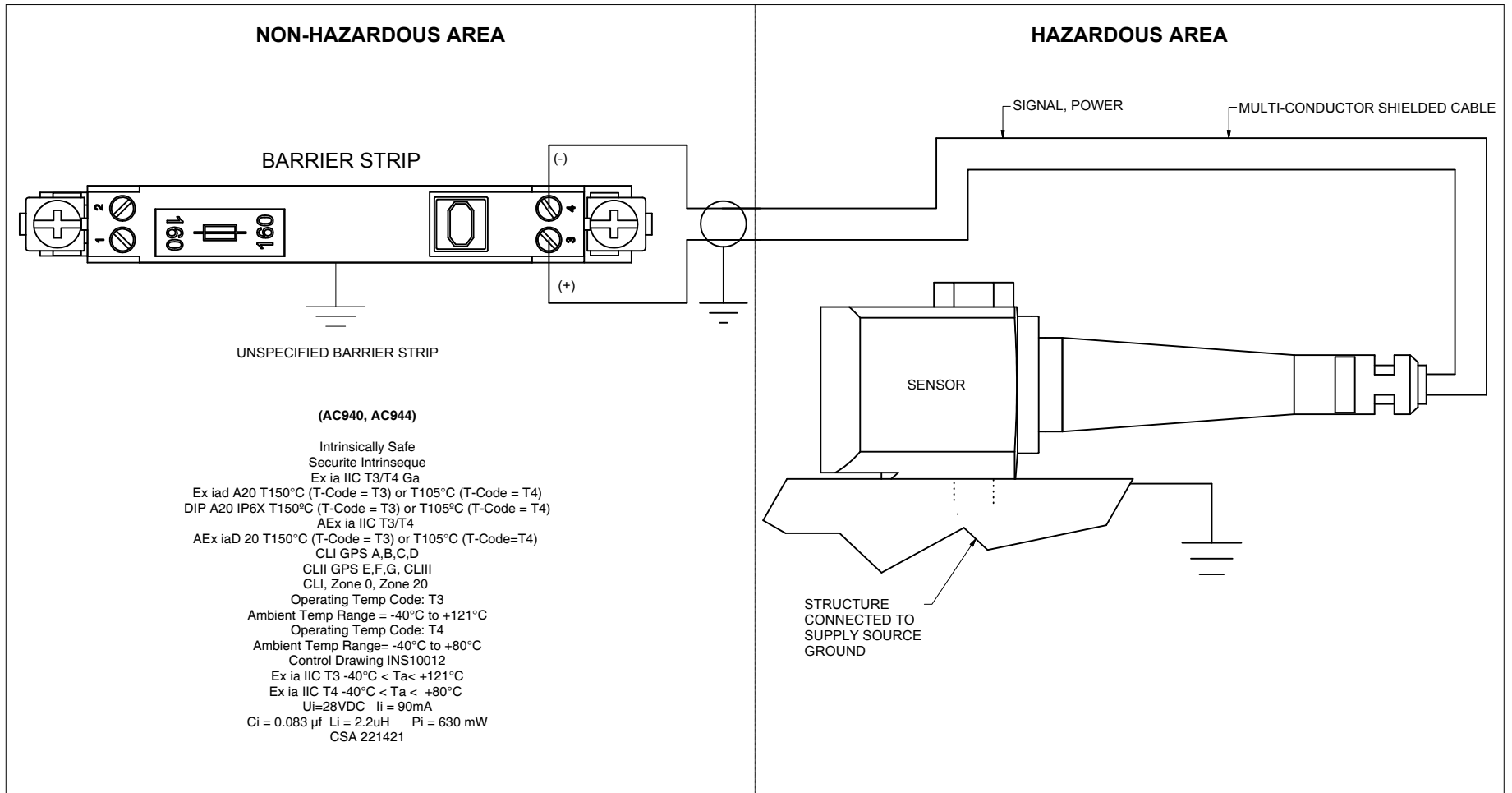
STRUCTURE
CONNECTED TO
SUPPLY SOURCE
GROUND

NOTES:

- DO NOT PARALLEL ASSOCIATE APPARATUS UNLESS PERMITTED BY ASSOCIATED APPARATUS APPROVAL
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- [(Ccable + Ci < Ca) & (Lcable + Li < La)]

C	ADD TA/TRIAX VARIATIONS	-	DMG	CRW	5/1/2015	-	-
B	UPDATE TO ADD LOW CAPACITANCE/DUST APPROVAL	-	DMG	SAS	12/21/2009	-	-
A	UPDATE TO LP TEMP CODE CHANGE, ZONE DESIGNATION ADDED	-	JDB	SAS	4/27/2007	-	-
REV	DESCRIPTION	ECO#	DESIGNER	ENG APPROVED	DATE	MFG APPROVED	DATE

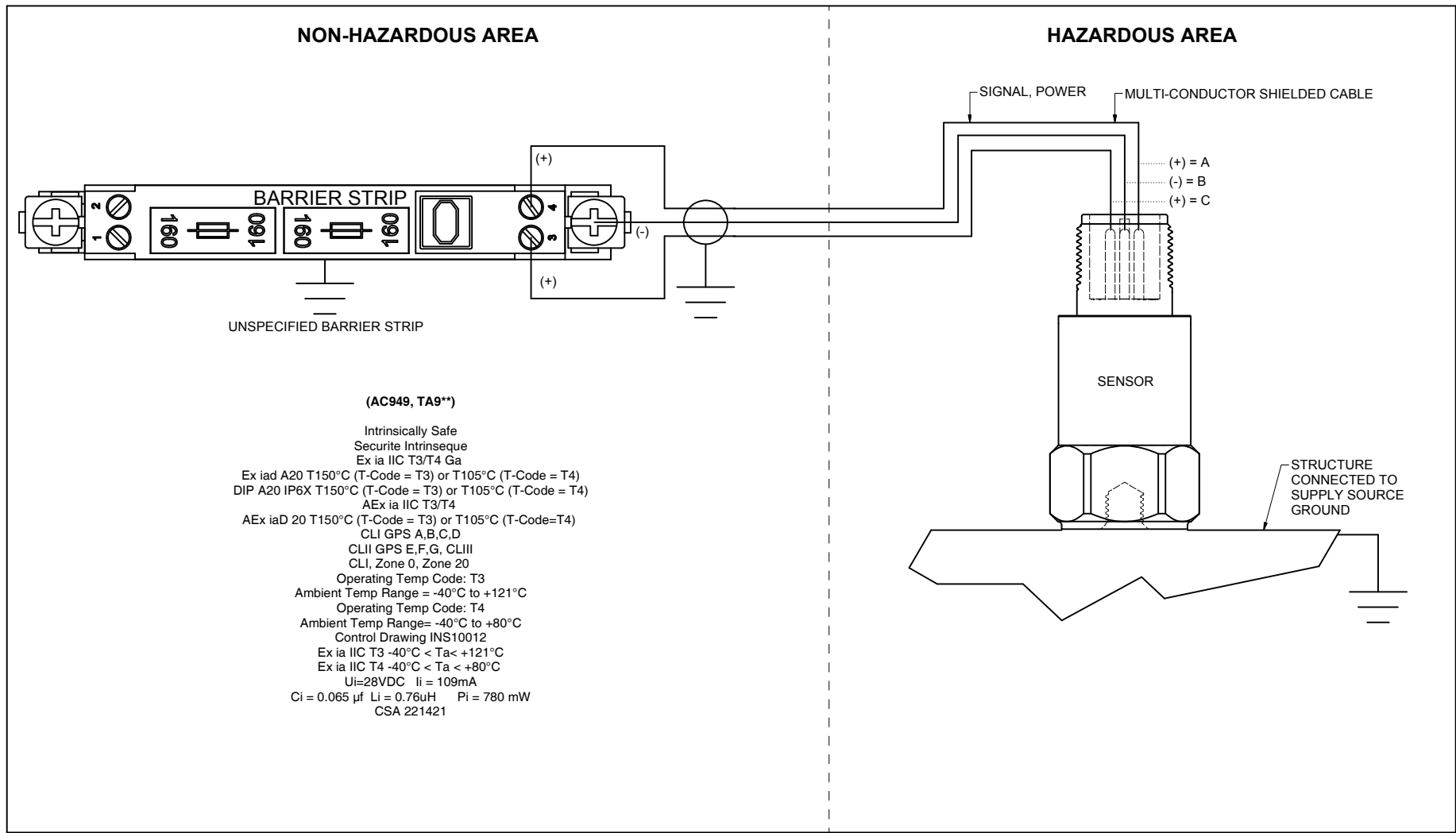
 CONNECTION TECHNOLOGY CENTER, INC	MATERIAL -	ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE SPECIFIED	
		TOLERANCES (UNLESS SPECIFIED)	
		XXX ± 0.005 XX ± 0.01 X ± 0.1 ANGLE ± 2°	63 
		BREAK ALL SHARP EDGES .010 MAX	
PART #:		SHEET	
INS10012		3 / 8	
DESCRIPTION:		NOT DRAWN TO SCALE	
INTRINSIC SAFE SENSOR CONTROL DRAWING			



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		TOLERANCES (UNLESS SPECIFIED) XXX ± 0.005 XX ± 0.01 X ± 0.1 ANGLE ± 2° BREAK ALL SHARP EDGES .010 MAX
PART #: INS10012	DESCRIPTION: INTRINSIC SAFE SENSOR CONTROL DRAWING	SHEET 4 / 8
		NOT DRAWN TO SCALE



(AC949, TA9**)

Intrinsically Safe
Securite Intrinseque
Ex ia IIC T3/T4 Ga

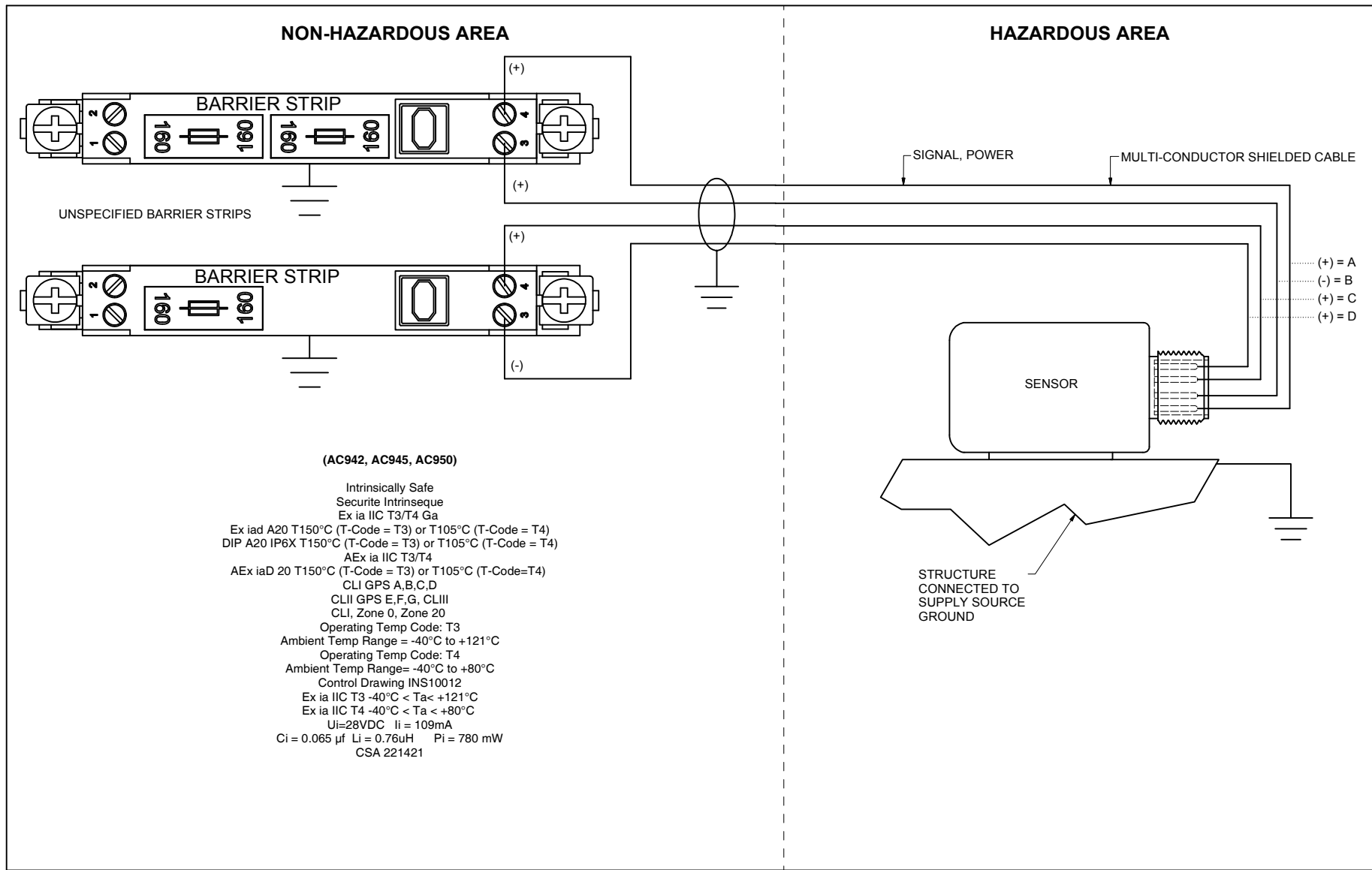
Ex iad A20 T150°C (T-Code = T3) or T105°C (T-Code = T4)
DIP A20 IP6X T150°C (T-Code = T3) or T105°C (T-Code = T4)
AEx ia IIC T3/T4
AEx iaD 20 T150°C (T-Code = T3) or T105°C (T-Code=T4)

CLII GPS A,B,C,D
CLII GPS E,F,G, CLIII
CLI, Zone 0, Zone 20
Operating Temp Code: T3
Ambient Temp Range = -40°C to +121°C
Operating Temp Code: T4
Ambient Temp Range= -40°C to +80°C
Control Drawing INS10012
Ex ia IIC T3 -40°C < Ta < +121°C
Ex ia IIC T4 -40°C < Ta < +80°C
Ui=28VDC li = 109mA
Ci = 0.065 µf Li = 0.76uH Pi = 780 mW
CSA 221421

NOTES:
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PART #:	INS10012	SHEET 5 / 8
DESCRIPTION:		INTRINSIC SAFE SENSOR CONTROL DRAWING
		NOT DRAWN TO SCALE



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REV	DESCRIPTION	ECO#	DESIGNER	ENG APPROVED	DATE	MFG APPROVED	DATE

 CONNECTION TECHNOLOGY CENTER, INC	MATERIAL - <
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NOTES:

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UNLESS OTHERWISE SPECIFIED

TOLERANCES (UNLESS SPECIFIED)

XXX	± 0.005
XX	± 0.01
X	± 0.1
ANGLE	± 2°

BREAK ALL SHARP EDGES
.010 MAX

63