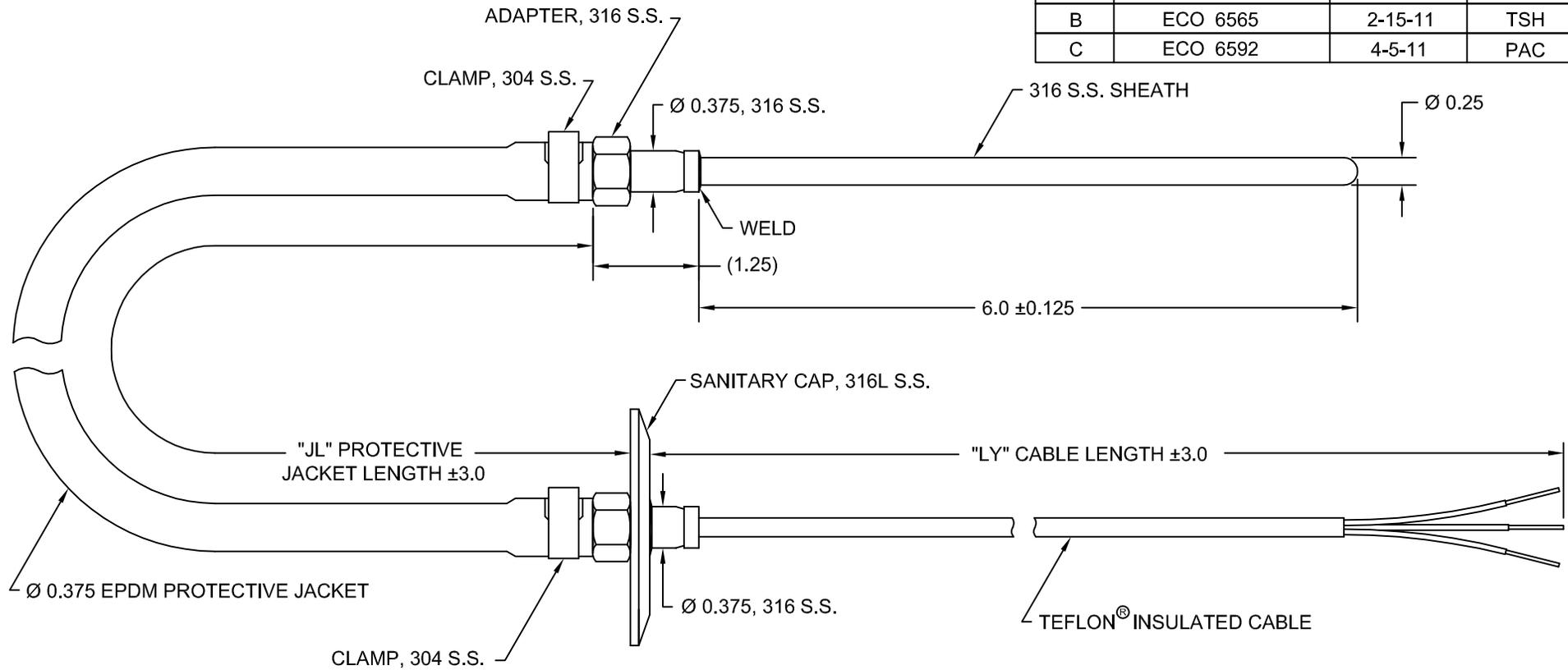
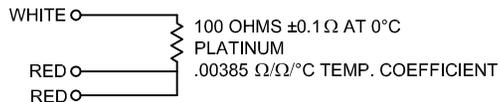


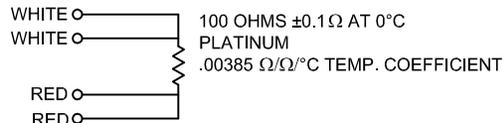
SYM	ECO NUMBER	DATE	APPD
A	ECO 6544	1-21-11	RJT
B	ECO 6565	2-15-11	TSH
C	ECO 6592	4-5-11	PAC



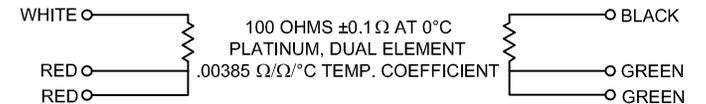
ELEMENT/LEAD WIRE CONFIGURATION: (A SINGLE THREE WIRE)



ELEMENT/LEAD WIRE CONFIGURATION: (B SINGLE FOUR WIRE)



ELEMENT/LEAD WIRE CONFIGURATION: (C DUAL THREE WIRE)



NOTES:

- SEE SHEET #2 FOR ORDERING INFORMATION.
SEE SHEET #3 FOR PERFORMANCE INFORMATION
- TEMPERATURE RANGE = -50 TO 200°C

**-TOLERANCES-
UNLESS OTHERWISE SPECIFIED**

ALL DIMENSION IN INCHES

FRACTIONS = ±1/16
ONE PLACE .X = ±.050
TWO PLACE .XX = ±.010
THREE PLACE .XXX = ±.005

ALL ANGLES ARE ± 0°30'

SHEATH AND LEAD LENGTHS
PER BURNS P/N 17026

UNLESS OTHERWISE NOTED:
ALL SURFACES 125 ✓
ALL FINISHES IN MICRO INCHES



BURNS ENGINEERING

SCALE	N.T.S.	
DFTM	TSH	1-21-11
CHKD	PAC	1-21-11
APPD	RJT	1-21-11

MOUNTING AND OUTLINE DRAWING,
SANITARY AUTOCLAVE HEAVY DUTY
RTD ASSEMBLY

DIMENSIONS IN INCHES

SHEET	SIZE	DRAWING NUMBER	REV
1 OF 3	A	SAH	C

ORDERING INFORMATION:

SAH	Sanitary Autoclave Heavy Duty					
	Accuracy options					
	-10	Standard RTD +/-0.10% of resistance at degrees C				
		Element / Wire configuration and sensor diameter				
	A	*Three wire single element				
	B	Four wire single element				
	C	**Three wire dual element				
		"JL" Protective jacketing length (12 inch increments) 72.0 inch minimum length				
	120	120 inch Protective jacket length				
	180	180 inch Protective jacket length				
	240	240 inch Protective jacket length				
	300	300 inch Protective jacket length				
		Specify length in inches, 12 inch increment				
		"LY" Cable length beyond protective jacketing (12 inch increments) 12.0 minimum length				
	-120	120.0 inch cable length				
	-180	180.0 inch cable length				
	-240	240.0 inch cable length				
	-300	300.0 inch cable length				
		Specify Cable length in inches (12 inch increments)				
		Cap Size				
	-15	1.5 inch				
	-20	2.0 inch				
	-25	2.5 inch				
	-30	3.0 inch				
	-40	4.0 inch				
SAH	-10	B	180	-180	-25	SAH-10B180-180-25 Typical Part Number

Note: For all THREE WIRE probes in the following configurations the specified cable length must be maintained i.e. the cable cannot be cut to a shorter length without adversely affecting the accuracy of the probe.

*Single element, 0.10% accuracy probes with cable lengths 320 inches (26.6 ft) and longer

**Dual element, 0.10% accuracy probes all cable lengths



BURNS
ENGINEERING

SHEET 2
OF 3

SIZE
A

DRAWING NUMBER
SAH

REV
C

PERFORMANCE SPECIFICATIONS:

- NOMINAL ICE POINT RESISTANCE (R0): 100.00 Ω
- R0 INTERCHANGEABILITY: $R0 \pm 0.10 \Omega$
- TYPICAL ALPHA VALUE: 0.0038500 $\Omega/\Omega/^\circ\text{C}$
- TEMPERATURE RATING: -50 $^\circ\text{C}$ TO 200 $^\circ\text{C}$
- ELEMENT CONFIGURATION: SINGLE OR DUAL
- LONG-TERM STABILITY: $\pm 0.26 \text{ }^\circ\text{C}$ (0.10 Ω) MAXIMUM SHIFT AT 0 $^\circ\text{C}$ AFTER 1000 HOURS AT 200 $^\circ\text{C}$
- LONG-TERM REPEATABILITY: $\pm 0.10 \text{ }^\circ\text{C}$ (0.04 Ω) MAXIMUM SHIFT AT 0 $^\circ\text{C}$ AFTER 10 CYCLES BETWEEN -50 $^\circ\text{C}$ AND 200 $^\circ\text{C}$
- SHORT-TERM REPEATABILITY AND HYSTERESIS: $\pm 0.025 \text{ }^\circ\text{C}$ (0.01 Ω) MAXIMUM CHANGE AT 0 $^\circ\text{C}$ OVER ANY 5 CONSECUTIVE THERMAL CYCLES FROM 0 $^\circ\text{C}$ TO 135 $^\circ\text{C}$
- RATED PRESSURE: 1 psia TO 35 psia
- TRANSITION FITTING AND CABLE LIMITS: -50 $^\circ\text{C}$ TO 200 $^\circ\text{C}$ CONTINUOUS EXPOSURE
- INSULATION RESISTANCE: 100 M Ω MINIMUM AT 100 VDC AT ROOM TEMPERATURE



BURNS
ENGINEERING

SHEET 3
OF 3

SIZE
A

DRAWING NUMBER
SAH

REV
C