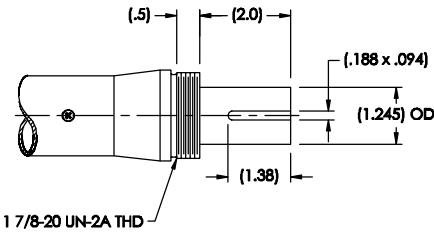
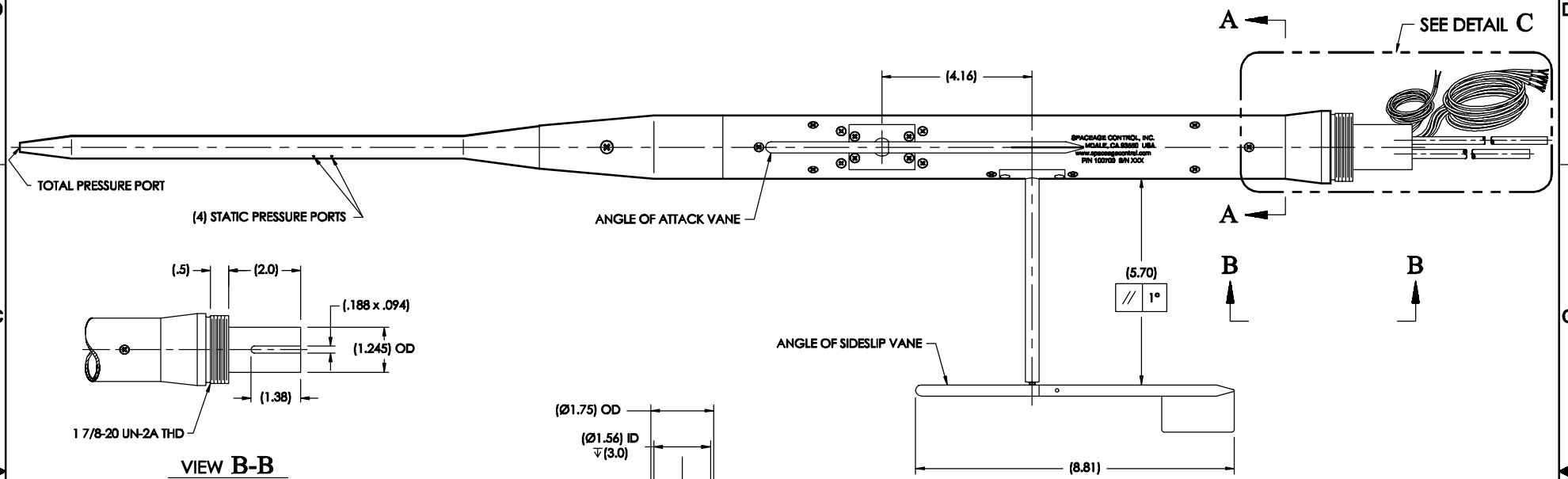


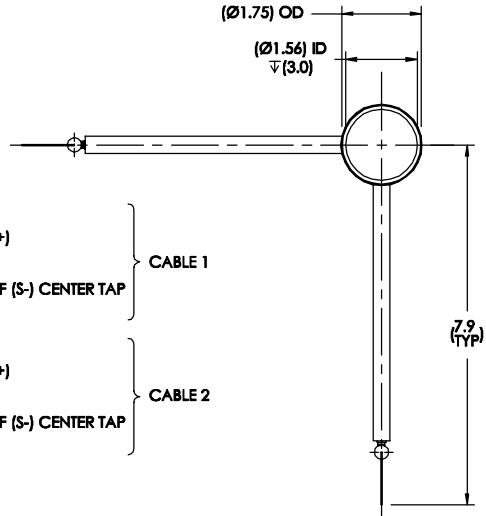
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REVISIONS			
REV.	DESCRIPTION	DATE	APPROVED
E	PER ECO #0652	10-26-00	S/L.L.
F	PER ECO #0860	2-27-02	S/SIMPSON

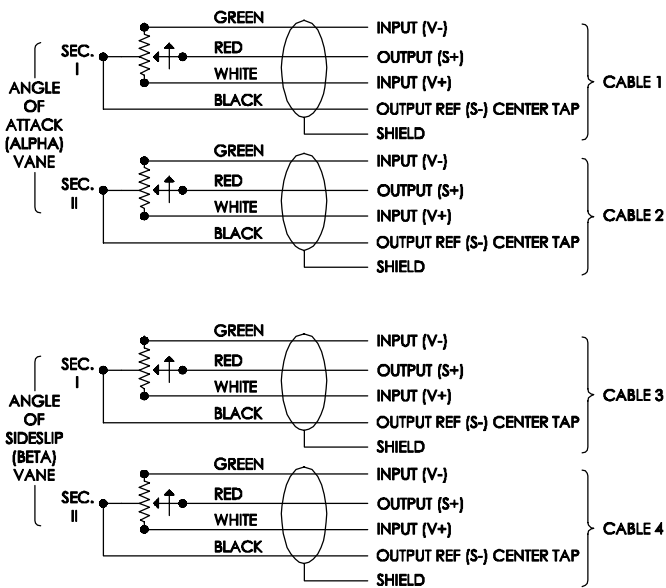
CAD MAINTAINED, CHANGES SHALL BE INCORPORATED BY THE DESIGN ACTIVITY



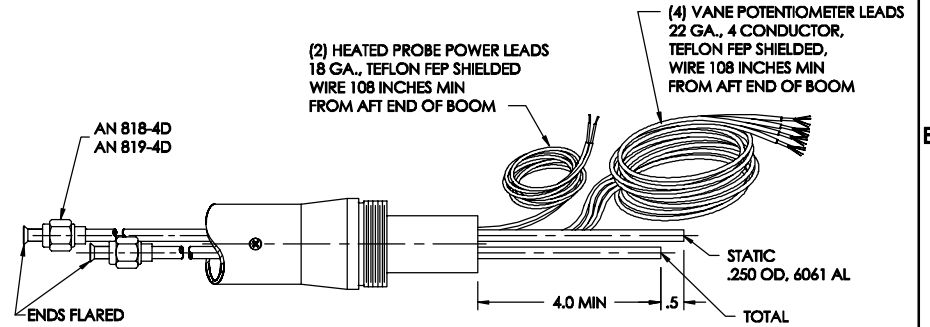
VIEW B-B



VIEW A-A



ELECTRICAL SCHEMATIC



DETAIL C

APPROVED
MASTER
DWG FILE
DO NOT MODIFY
WITHOUT PRIOR APPROVAL
DATE: 3-5-02 DWG

1		100700		STRAIGHT-NOSE AIR DATA BOOM, HEATED		~	
QTY REQD	CAGE CODE	BYM	PART OR IDENTIFYING NO.	NONNOMENCLATURE OR DESCRIPTION	MATERIAL SPECIFICATION	REV	ITEM NO.
UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES TOLERANCES ARE: DECIMALS .XX ± 0.03 FRACTIONS X/XX ± 0.01 HOLE DIA ± 0.005 DO NOT SCALE DRAWING				CONTRACT NO. APPROVALS S/D O'MAHONEY 9/30/99 CHECKED S/L McDANIEL 9/30/99 ENGR S/L GATES 9/30/99 DESIGN ACTIVITY		SpaceAge Control, Inc. STRAIGHT-NOSE AIR DATA BOOM, HEATED CAGE CODE 34851 DWG NO. 100700 SCALE 1:2 SHEET 1 OF 2	
NEXT AMBY USED ON APPLICATION				DATE 9/30/99		REV. F	

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REVISIONS			
REV.	DESCRIPTION	DATE	APPROVED
CAD MAINTAINED. CHANGES SHALL BE INCORPORATED BY THE DESIGN ACTIVITY			

NOTES

1. VANE POTENTIOMETER SPECIFICATIONS (MEASURE ANGLE OF ATTACK (AOA (ALPHA)) AND ANGLE OF SIDESLIP (AOS (BETA)))
 - 1.1. TYPE: DUAL CONDUCTIVE PLASTIC
 - 1.2. RESISTANCE: 5K OHMS
 - 1.3. RESISTANCE TOLERANCE: ±10%
 - 1.4. LINEARITY: ±.5%
 - 1.5. RESOLUTION: INFINITE SIGNAL OUTPUT
 - 1.6. ELECTRICAL TRAVEL: ±170° (±5°) FROM CENTER TAP
 - 1.7. POWER RATING (70° C): 1.0 WATT
 - 1.8. MECHANICAL TRAVEL: 360° CONTINUOUS
 - 1.9. MECHANICAL LIFE: 20+ MILLION SHAFT REVOLUTIONS
 - 1.10. OPERATING TEMPERATURE RANGE: -55° TO +125° C
 - 1.11. OTHER SPECIFICATIONS: PER MIL-R-39023
2. HEATED PROBE SPECIFICATIONS (MEASURES TOTAL AND STATIC PRESSURE)
 - 2.1. INPUT POWER: 28 VDC OR 28 VOLTS, 400 CYCLE AC
 - 2.2. OPERATING TEMPERATURE RANGE: -65° TO +540° C
 - 2.3. MACH NUMBER: 0 TO 3
 - 2.4. OTHER SPECIFICATIONS: PER MIL-P-25632B
3. MAINTENANCE REQUIREMENTS
 - 3.1. PROTECTIVE ACCESSORIES SUCH AS TOTAL HEAD PROBE COVER AND VANE COVER SHOULD BE INSTALLED WHENEVER THE AIR DATA BOOM IS NOT IN USE. THESE ACCESSORIES WILL PROTECT THE PRODUCT FROM DAMAGE AS WELL AS KEEP IT CLEAN.
 - 3.2. PRESSURE OR LEAK TESTING OF THE PRESSURE SYSTEM SHOULD BE CONDUCTED ANNUALLY.
 - 3.3. BEFORE EACH FLIGHT, CHECK THE NOSE TIP FOR DAMAGE THAT MAY CAUSE MEASUREMENT ERRORS.
 - 3.4. BEFORE EACH FLIGHT, CHECK VANES FOR DAMAGE SUCH AS SCRAPED FIN EDGES, BENT FINS OR VANES, AND NOISY VANE BUSHINGS.
 - 3.5. BEFORE EACH FLIGHT, VERIFY ALL SCREWS ARE TIGHT AND THAT THE AIRCRAFT MOUNTING POINT IS SECURE.
 - 3.6. VERIFY CALIBRATION OF VANE ASSEMBLIES ANNUALLY.

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DATE: 3-5-02 DWO

QTY REQD	CAGE CODE	SYM	PART OR IDENTIFYING NO.	NOMENCLATURE OR DESCRIPTION	MATERIAL SPECIFICATION	ITEM NO.
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UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES. TOLERANCES ARE: DECIMALS ANGLES X.X ± 0.03 X° ± 30' X.XX ± 0.01 X.XXX ± 0.005 DO NOT SCALE DRAWING		CONTRACT NO.		SpaceAge Control, Inc.		
		APPROVALS	DATE	TITLE		
		DRAWN S/D. O'MAHERNEY	9/30/99	STRAIGHT-NOSE AIR DATA BOOM, HEATED		
		CHECKED S/M. McDANIEL	9/30/99			
		ENGR S/J. GATES	9/30/99	SIZE	CAGE CODE	DWG NO.
		DESIGN ACTIVITY		A	34851	100700
NEXT ASSY	USED ON			SCALE		REV. F
APPLICATION				N/A	SHEET 2 OF 2	