

ATTACHMENT 10

KI 525A Pictorial NAV Indicator Test Data Sheets

FINAL TEST DATA SHEET 1 of 3

S/N 89124

FLAVOR: 07

APPLIES TO ALL FLAVORS EXCEPT WHERE SPECIFIED

All equipment has current calibration

✓ OK

MPS Ref.	PROC Step	TEST DESCRIPTION	Limits/Conditions	Meas. Data
6.3.29	6.2	Balance on End	hidden	✓ (OK)
6.3.32	6.2	Balance on End	1/2 Bar	✓ (OK)
6.3.3	6.11.4	Nav Flag Out	+0.235 ± 0.025 Vdc	<u>226</u> Vdc
		Nav Flag In	+0.195 ± 0.025 Vdc	<u>.199</u> Vdc
6.3.7	6.11.23	Nav Flag+CMR Out	+0.235 ± 0.025	<u>228</u> Vdc
6.3.7	6.11.25	Nav Flag+CMR In	+0.195 ± 0.025	<u>201</u> Vdc
		<u>HDG FLAG</u>		
6.3.45	6.12.6	out of View	5 Vdc to 13 Vdc	<u>11.4</u> Vdc
6.3.46	6.12.8	Hdg Flag in View	2 Vdc to 6 Vdc	<u>3.3</u> Vdc
	6.12.11	INVALID		✓ (OK)
6.3.40	6.13.4.1 6.13.4.2	<u>SYNCHRO (MPS)</u>		
		<u>CW</u>	<u>CCW</u>	
	0°	<u>358.47</u> °	<u>358.8</u> °	359 to 1°
	90°	<u>88.0</u> °	<u>88.2</u> °	89 to 91°
	180°	<u>178.5</u> °	<u>179.4</u> °	179 to 181°
	270°	<u>267.9</u> °	<u>268.4</u> °	269 to 271°
	-01, -03, -05, -07, -08, -09, -10, -11, -12, and -13 units only			
		<u>HDG SYNCHRO</u>		
		<u>CW</u>	<u>CCW</u>	
	0°	<u>359.1</u> °	<u>359.7</u> °	358.5 to 1.5 °
	90°	<u>89.4</u> °	<u>90.0</u> °	88.5 to 91.5 °
	180°	<u>179.7</u> °	<u>180.8</u> °	178.5 to 181.5 °
	270°	<u>269.2</u> °	<u>270.2</u> °	268.5 to 271.5 deg
	<u>RESOLVER</u>			
6.3.41	6.14.6	Resolver Null	299 to 301°	<u>300</u> Degrees
		<u>Resolver Accuracy</u>		
6.3.43	6.14.8	<u>CW</u>	<u>CCW</u>	
	0°	<u>359.7</u> °	<u>0.6</u> °	358.25 to 1.75 °
	60°	<u>59.3</u> °	<u>60.9</u> °	58.25 to 61.75 °
	120°	<u>119.5</u> °	<u>120.2</u> °	118.25 to 121.75 °
	180°	<u>180.0</u> °	<u>180.5</u> °	178.25 to 181.75 °
	240°	<u>240.0</u> °	<u>241.1</u> °	238.25 to 241.75 °
	300°	<u>299.7</u> °	<u>300.0</u> °	298.25 to 301.75 °
6.3.51		6.14.12 -02, -03, -06, -07, -11, -12, and -13 units only		
		Resolver Null (pin S)	28.5 to 31.5 °	✓ (OK/NA)
		<u>COMPASS DRIVE</u>	<u>CW</u>	<u>CCW</u>
6.3.34	6.15.3	1.0 sec	✓ (OK)	✓ (OK)
6.3.35	6.15.6	67ms	✓ (OK)	✓ (OK)
	6.15.8	.33sec	✓ (OK)	✓ (OK)
6.3.38	6.15.11	33ms	✓ (OK)	✓ (OK)
6.3.36	6.15.13, 6.15.22	HDG Clutch ± 2 deg	✓ (OK)	✓ (OK)
6.15.13	6.15.22	CRS pointer ± 2 deg	✓ (OK)	✓ (OK)
	6.15.19-6.15.30	HDG Card	✓ (OK)	✓ (OK)
6.3.30	6.15.16, 6.15.26	Centering <u>out of TOL</u> 1/2 Bar	✓ (OK)	✓ (OK)
6.3.31	6.15.16, 6.15.26	Balance 360 deg <u>out of TOL</u> 1/2 Bar	✓ (OK)	✓ (OK)
6.3.28	6.15.16, 6.15.25	Centering 360 deg hidden	✓ (OK)	✓ (OK)
6.3.37	6.15.30.3 & 4	No Back Drive	✓ (OK)	✓ (OK)

924-01069-0000

Rev. 49

Page 29 of 31

FINAL TEST DATA SHEET 2 OF 3

MPS Ref.	PROC Step	TESTDESCRIPTION	Limits/Conditions	Meas. Data
HDG POINTER				
6.3.1	6.16.5	Zero	-0.45 to +0.45 V dc	-0.64 Vdc
6.3.8	6.16.6.1	Left 10 degrees	-4.77 to -6.22 V dc	-6.3 Vdc
6.3.9	6.16.6.2	Left 20 degrees	-9.8 to -13.1 V dc	-12.2 Vdc
6.3.9.1	6.16.6.3	Left 25 degrees	-12.05 to -15.45 V dc	-12.7 Vdc
6.3.9.2	6.16.6.4	Left 160 degrees	-12.05 to -15.45 V dc	-12.7 Vdc
6.3.1	6.16.9	Zero	+0.45 to -0.45 V dc	-5.6 Vdc
6.3.10	6.16.9.1	Right 10 degrees	+4.77 to +6.22 V dc	5.0 Vdc
6.3.11	6.16.9.2	Right 20 degrees	+9.8 to +13.1 V dc	10.7 Vdc
6.3.11.1	6.16.9.3	Right 25 degrees	+12.05 to +15.45 V dc	13.6 Vdc
6.3.11.2	6.16.9.4	Right 160 degrees	+12.05 to +15.45 V dc	13.6 Vdc
6.3.12	6.16.9.6	Right till 0 V dc	170 to 190 degrees	179.9 °
6.3.12.1	6.16.9.10	J1-P to S reads	NMT +0.5 V dc	0.2 Vdc
6.3.12.2	6.16.9.15	J1-P to S reads	NLT -0.5 V dc	0.2 Vdc
6.3.1	6.16.12	Zero	-0.45 to +0.45 V dc	-5.6 Vdc
6.3.1	6.16.15	Zero	-0.45 to +0.45 V dc	-6.0 Vdc
6.3.1	6.16.18	Zero	-0.45 to +0.45 V dc	-3.0 Vdc
CRS POINTER				
6.3.1	6.17.4	Zero at 0 Degrees	-0.6 to +0.6 V dc	-5.0 Vdc
6.3.13	6.17.4.1	Left 10 degrees	-1.5 to -2.7 V dc	-2.6 Vdc
6.3.14	6.17.4.2	Left 45 degrees	-8.95 to -9.95 V dc	-9.5 Vdc
6.3.14.a	6.17.4.3	Left 60 degrees	-12.15 to -13.05 V dc	-11.7 Vdc
6.3.14.b	6.17.4.4	Left 90 degrees	-13.45 to -15.05 V dc	-12.8 Vdc
6.3.1	6.17.7	Zero	+0.6 to -0.6 V dc	-6.4 Vdc
6.3.15	6.17.7.1	Right 10 degrees	+1.5 to +2.7 V dc	1.4 Vdc
6.3.16	6.17.7.2	Right 45 degrees	+8.95 to +9.95 V dc	8.5 Vdc
6.3.16.a	6.17.7.3	Right 60 degrees	+12.15 to +13.05 V dc	11.5 Vdc
6.3.17	6.17.7.4	Right 90 degrees	+13.45 to +15.05 V dc	13.6 Vdc
6.3.18	6.17.7.5	Right till 0 V dc	170 to 190 degrees	181.4 °
	6.17.7.10	Zero at 90 Degrees	-0.6 to +0.6 V dc	-3.9 Vdc
	6.17.10.1	Left 45 degrees	-8.95 to -9.95 V dc	-9.4 Vdc
	6.17.10.2	Left 60 degrees	-12.15 to -13.05 V dc	-11.8 Vdc
	6.17.11.1	Right 45 degrees	+8.95 to +9.95 V dc	8.5 Vdc
	6.17.11.2	Right 60 degrees	+12.15 to +13.05 V dc	11.5 Vdc
	6.17.14	Zero at 180 Degrees	-0.6 to +0.6 V dc	-6.7 Vdc
	6.17.14.1	Left 45 degrees	-8.95 to -9.95 Vdc	-9.6 Vdc
	6.17.14.2	Left 60 degrees	-12.15 to -13.05 Vdc	-11.9 Vdc
	6.17.15.1	Right 45 degrees	+8.95 to +9.95 Vdc	8.3 Vdc
	6.17.15.2	Right 60 degrees	+12.15 to +13.05 Vdc	11.3 Vdc
	6.17.18	Zero at 270 Degrees	-0.6 to +0.6 V dc	-6.7 Vdc
	6.17.18.1	Left 45 degrees	-8.95 to -9.95 V dc	-9.5 Vdc
	6.17.18.2	Left 60 degrees	-12.15 to -13.05 Vdc	-11.8 Vdc
	6.17.19.1	Right 45 degrees	+8.95 to +9.95 Vdc	8.3 Vdc
	6.17.19.2	Right 60 degrees	+12.15 to +13.05 Vdc	11.3 Vdc
TO/FROM				
6.3.27	6.18.5	From -200 ±40	-160 to -240 mV dc	-212 mVdc
	6.18.7	To +200 ±40	+240 to +160 mV dc	183 mVdc
D-BAR				
6.3.33	6.19.4, 6.19.5	Dots	(-)Left	(+)Right
	One	25 to 35 mV dc	-38	35
	Two	54 to 66 mV dc	-69	65
	Three	76 to 104 mV dc	-99	96
	Four	102 to 138 mV dc	-130	125
	Five	130 to 170 mV dc	-155	150
6.3.31.1	6.19.7	Ramp	moves smoothly	(OK) Sticky

FINAL TEST DATA SHEET 3 of 3

MPS Ref.	PROC Step	TEST DESCRIPTION	Limits/Conditions	Meas. Data
		GS FLAG/DEV		
6.3.20	6.20.2	GS Pointer Full CW/CCW	hidden	✓ (OK)
6.3.21	6.20.4.1	GS Flag .215 V dc	12 seconds	✓ (OK)
	6.20.4.2 & 3	GS Center	± ½ Needle	— (OK) off 1/2 needle
	6.20.4.4	Pointer	no OSC	✓ (OK)
	6.20.6	Dev. CMR ±/Off	± ½ Needle	✓ (OK)
6.3.22	6.20.7	Flag CMR	in view	✓ (OK)
6.3.23	6.20.8	Center Line	0±5 mV dc	0.0 mVdc
		(+)UP Needle above center Line		
		1st Dot	65 to 85 mV dc	81 mVdc
		2nd Dot	147 to 160 mV dc	147 mVdc
		(-)DOWN Needle below center Line		
		1st Dot	-65 to -85 mV dc	-70 mVdc
		2nd Dot	-140 to -160 mV dc	-141 mVdc
	6.20.10	GS DEV 220mv	View 30 deg Angle	✓ (OK)

GS DEV RAMP

TO/FROM RAMP

6.3.24	6.20.16 & 17	45° Left moves smoothly	Struck ✓ (OK)	45° Left moves smoothly	✓ (OK)
		20° Up moves smoothly	✓ (OK)	20° Up moves smoothly	✓ (OK)
		20° Down moves smoothly	✓ (OK)	20° Down moves smoothly	✓ (OK)
		45° Right moves smoothly	Struck ✓ (OK)	45° Right moves smoothly	✓ (OK)
		Normal moves smoothly	— (OK)	Normal moves smoothly	✓ (OK)
6.3.24	6.20.18	GS Flag .185 VDC		slowly out of view	✓ (OK)

LIGHTING 14/28V (-00 thru -07 unit flavors)

6.21.1	Lighting ON and Uniform	✓	✓ OK /NA
6.21.2	Lighting ON and Uniform	✓	✓ OK /NA
6.21.7	Intensity decreasing and Uniform	✓	✓ OK /NA

LIGHTING 5V (-08, -10, -11, and -12 unit flavors)

6.3.54	6.21.4	Lighting ON and Uniform	NA	✓ OK /NA
	6.21.5	Intensity increasing and Uniform	NA	✓ OK /NA

NVG LIGHTING (28V ONLY) -09 and -13 unit flavors

6.3.56	6.21.6	Lighting ON and Uniform	NA	✓ OK /NA
6.3.57	6.21.7	Intensity decreasing and Uniform	NA	✓ OK /NA

7.1.4	0.0 ± 0.600 V dc	Start Reference	-0.65	VDC
7.1.6	0.0 ± 0.600 V dc	1 turn CW	-0.35	VDC
7.1.8	0.0 ± 0.600 V dc	1 turn CCW	-0.15	VDC
7.1.10	0.0 ± 0.600 V dc	1 turn CW	-0.56	VDC

8.3	Connectors (J101 & J102) free of visual damage	✓ OK /NA	cracked
-----	--	----------	---------

Tested by

Date

5/23/18