

FEBIAD MK-XII-B ISAC Target/Ion Source Descriptive			
Document Number: 11	Issue No.: 1	Revision No.: 11	
Target Name: <<<FILL IN TARGET NAME>>>	CURRENT DATE		
Date Issued: 2005-12-09	Date Revised: MARCH 19, 2009		

May 18 2012 SIC #27

14.3 Generic Target & Source Test at Hot Cell
 Fill in section with measure value or ∞ if it equals expected value

Test	Circuit			Oven & Transfer Tube	Extraction Electrode	Anode Bias	Magnet Coil	60KV Common	Einzel
				A,B,C,D ⁴	I	H UHF	Q	T	Y
Ohmmeter	Anode Bias	H	Meas						
		UHF	Exct				∞		∞
	Magnet Coil	U	Meas						
			Exct				0		∞
60KV Common	T	Meas	OL	OL					OL
		Exct	OL	10M Ω ⁵	∞	∞	∞	∞	∞
Chassis		Meas						OL	OL
		Exct						∞	300M Ω ⁶
Megger ⁷	Chassis	Meas						949M	OL
		Exct			∞	∞	∞	∞	300M Ω ⁸
					500V Max	500V Max	2500V Max	2500V Max	

~~EE~~
 A,B,C,D \rightarrow Chassis \rightarrow OL
 OL

Notes:

	A	B	C	D
A	Diagonal	0	0	0
B	4.968 m Ω	Diagonal	0	0
C	5.633 m Ω	5.394 m Ω	Diagonal	0
D	4.383 m Ω	4.145 m Ω	4.741 m Ω	Diagonal

Test 50m Test

EE \rightarrow Chassis @ 500V OL
 ABCD \rightarrow 60KV @ 500V OL
 Chassis @ 1000V 970M Ω
 EE @ 500V OL
 Megger
 6.07M Ω

⁴ Individually measure the oven/tube circuits (A,B,C,D) to 60KV common

⁵ The extraction electrode has TRIUMF built high voltage resistors of 9.78M Ω and 206K Ω in series between feed-thru "I" and 60KV common. Values within $\pm 10\%$ are acceptable. A fault report should be issued for values outside this range.

⁶ Ohmmeter test of Einzel will usually show infinite.

⁷ Do not exceed Megger setting as shown in red. Do not use the megger to measure any other circuits then those shown.

⁸ Einzel lens has two TRIUMF built resistors of 300M Ω and 588K Ω . Megger tests outside of the range 280M Ω -330M Ω to chassis are a failure and a fault report should be issued.