g GE Energy	**Functional Testing Specification**
Parts & Repair Services ***Louisville, KY***	**LOU-GED-DS3800HPTE**

Test Procedure for a Card

DOCUMENT REVISION STATUS: Determined by the last entry in the "REV" and "DATE" column

REV.	DESCRIPTION	SIGNATURE	REV. DATE
A	Initial release	Dan Laemmle	02/06/2004
B			
C			

PREPARED BY	REVIEWED BY	REVIEWED BY	QUALITY APPROVAL
Dan Laemmle			Robert Dwall
DATE	**DATE**	**DATE**	**DATE**
02/06/2004			2/18/04

Functional test procedure for a DS3800HPTE Card

1. SCOPE

1.1 This is a functional testing procedure for a DS3800HPTE Card.

2. STANDARDS OF QUALITY

2.1 Refer to the current revision of the IPC-A-610 standard for workmanship standards.

3. APPLICABLE DOCUMENTS

3.1 The following document(s) shall form part of this specification to the extent specified herein. Unless otherwise indicated, the latest issue shall apply.

3.1.1 Factory Documentation

4. ENGINEERING REQUIREMENTS

4.1 Equipment Cleaning

4.1.1 Equipment should be clean and free of debris prior to applying power unless performing an initial check. Refer to the local documented procedures for cleaning guidelines.

4.2 Equipment Inspection

4.2.1 Equipment should be visually inspected for any defects prior to applying power. This inspection should include the following as a minimum:

4.2.1.1 Wires broken or cracked
4.2.1.2 Terminal strips / connectors broken or cracked
4.2.1.3 Loose wires
4.2.1.4 Components visually damaged
4.2.1.5 Capacitors leaking
4.2.1.6 Solder joints damaged or cold
4.2.1.7 Circuit board burned or de-laminated
4.2.1.8 Printed wire runs burned or damaged

5. EQUIPMENT REQUIRED

5.1 The following equipment is required to perform the process requirements. Equipment may be substituted provided that all accuracy's and test ratios are equivalent or better.

Qty	Reference #	Description
1		Fluke 85 DMM (or Equivalent)
1		SCR Firing Box
1		Oscilloscope Tektronix 2215 or equiv.

6. TESTING PROCESS

6.1 Setup

6.1.1 None at this time.

6.2 Testing Procedure

6.2.1 High Voltage Indicator Test: Connect 120 VAC between JG-1 and JG-2 and see NE-1 glow dimly. Remove voltage.

6.2.2 Attenuator Test: Connect an ohmmeter from JA-8 to JF-2 and read 996K +/- .1%.

6.2.3 Isolation Resistance: Connect an ohmmeter on high range between JA-2 (D-COM) and the following points and look for infinity reading: JF-2, JC-1, JC-2, JB-4, andJA-8.

6.2.4 Gate Driver Test: Connect +28VDC to JA-1; com to JA-2. Connect non-isolated negative pulses from firing box to JA-4; com to JA-2. Connect scope probe to JC-1; scope com to JC-2. See approx. 20v output pulses. Observe that LED CR4 is luminous when input pulses are present.

6.3 ***TEST COMPLETE ***

7. NOTES

7.1 None at this time.

8. Oscilloscope Verification Examples:

8.1 None at this time.