Software Product Description

PRODUCT NAME: **DEC 5800 Series Diagnostic Set**   **SPD 31.63.00**

DESCRIPTION

The DEC 5800 Series Diagnostic Set is a package of programs and documentation that allows users to maintain DEC 5800 Series central processor units (CPUs), memory, and standard peripheral devices. The set consists of ROM-Based and Loadable macrodiagnostic programs which are required to fully support diagnosis of a DEC 5800 Series system.

The heart of the DEC 5800 Series system is the XMI internal bus. CPUs, memory, and adapters to the I/O busses are connected to this bus, and are referred to as XMI nodes. The I/O busses consist of one or more VAXBIs, and peripheral device adapters and controllers reside there and are referred to as VAXBI nodes.

XMI and VAXBI nodes have extensive Self-tests built into them (primarily ROM-Based), and these are automatically executed when the system is initialized. In addition, most XMI nodes and some VAXBI nodes contain user-invokable ROM-Based Diagnostics which can be initiated by the operator. Lastly, the DEC 5800 Series system contains a maintenance processor which is capable of running loadable diagnostics under the VAX Diagnostic Supervisor, while the main processor is not operating.

DEC 5800 Series Diagnostic Components

ROM-Based Diagnostic Monitor (RBD Monitor) - Program which resides in ROM on various XMI and VAXBI nodes, which supplies diagnostic and operator services (i.e., starting, control, error messages) for the ROM-Based Diagnostics accessible from the maintanance console.

ROM-Based Diagnostics (RBDs) - Diagnostic programs which reside in ROM on various XMI and VAXBI nodes and are invokable on Power-up, Reset, and/or by the operator via the RBD Monitor. These diagnostics are installed and runnable on all DEC 5800 Series systems, and a license is NOT required to run them.

VAX Diagnostic Supervisor (VAX/DS) - Loadable program which supplies diagnostic and operator services (i.e., loading, starting, and control, error messages) for the loadable diagnostics. VAX/DS runs only in Stand-alone Mode (without the ULTRIX Operating System) on the maintenance processor of DEC Series 5800 systems.

VAX/DS Diagnostics - Loadable macrodiagnostics, consisting of exercisers, functional-level and logic-level tests, disk formatters, and an autosizer that run under control of VAX/DS on the maintenance processor.

DEC 5800 Series Diagnostic Program Classes

Class	Runtime Environment	Types of Programs
ROM-Based	Runs only in Stand-alone Mode on power-up, reset, or RBD Monitor control	Exercisers, Functional tests and logic tests of CPU, memory, maintenance processor and peripheral devices
Loadable	Runs under VAX/DS in Stand-alone Mode only, on the maintenance processor	Exercisers, Funcitonal tests and logic tests of CPU, maintenance processor and peripheral devices

HARDWARE REQUIREMENTS

Any valid DEC 5800 Series system configuration

OPTIONAL HARDWARE

None

SOFTWARE REQUIREMENTS

None

OPTIONAL SOFTWARE

None

INSTALLATION

RBDs are already installed. VAX/DS diagnostics are customer installable, and optional DIGITAL installation is available for a time and materials charge.

SOFTWARE WARRANTY

None

This software product is provided on an **"AS IS"** basis without any warranty of any kind, either express or implied.

ORDERING INFORMATION

All single-use licensed software, including any subsequent updates purchased, is furnished under the licensing provisions of DIGITAL's Standard Terms and Conditions, which provide in part that the software and any part thereof may be used on only the single system

on which the software is first installed, and may be copied, in whole or in part (with the proper inclusion of the copyright notice and any proprietary notices on the software) only for use on that same system.

The Single-Use, end-user license is required for each system to be self-maintained.

The license applies to the use of VAX/DS diagnostic media, and the acquisition of documentation for VAX/DS Diagnostics and ROM-Based Diagnostics.

The DEC 5800 Series Diagnostic Media Kit consists of a 9-track 1600 BPI Magtape containing all the loadable diagnostic software, plus a TK50 Cartridge containing all the loadable diagnostic software. The TK50 can boot the VAX Diagnostic Supervisor (the Magtape is not bootable).

DEC 5810 DIAGNOSTIC ORDERING INFORMATION

Z3302-UZ   Single-Use, end-user license only, no binaries, no documentation, no support services.

Z3302-HW   Diagnostic Media/Documentation kit, binaries (on Magtape and TK50)

Z3302-WW   Annual Diagnostic Update Service

DEC 5820 DIAGNOSTIC ORDERING INFORMATION

Z3303-UZ   Single-Use, end-user license only, no binaries, no documentation, no support services.

Z3303-HW   Diagnostic Media/Documentation kit, binaries (on Magtape and TK50)

Z3303-WW   Annual Diagnostic Update Service

Update Options

Licensed users of VAX Diagnostics may order the Annual Subscription Update Service at the prevailing rate for such updates. The update is distributed in binary form on the appropriate medium and includes no installation or other services unless specifically stated.

Documentation Options

Maintenance Documentation Service (MDS) - Microfiche documentation library

In general, each MDS Library includes:

Hardware Manuals, Illustrated Parts Breakdowns, Revision Matrix Preventive Maintenance Manuals, Diagnostic Listings, DEC-O-LOG (FCO Synopsis) and FCOs (Field Change Orders).

MD-VAX-01   Maintenance Documentation and Diagnostic Listings for VAX systems (Library Only, including updates)

MD-VAX-D1   Maintenance Documentation for VAX systems (Library Only, including updates)

MD-VAX-L1   Diagnostic Listings for VAX systems (Library Only, including updates)

DEC-O-LOG   MICROFICHE

MD-MFDOL-R   Field Change Order notification service for all systems (initial subscription includes one year of updates).

ADDITIONAL SERVICES

None