

# Software Product Description

PRODUCT NAME: POLYCENTER Print Queue Manager,  
62.76.01 for OpenVMS, Version V4.4

SPD

## DESCRIPTION

POLYCENTER Print Queue Manager for OpenVMS is a layered product that eases the print queues management in an Enterprise computer network. It enables operations people to set-up many print queues on multiple systems from a central point, a coherent, efficient and secured way. When used in conjunction with POLYCENTER System Watchdog, it also provides notification about stopped queues, and a level of automatic correction.

The major goals of the PQM software are the following:

- **Centralize** print queues definitions and **homogenize** their names and common attributes.
- **Ensure consistency** of print queues definitions and related LAT pseudo-devices setup on multiple systems in a network.
- **Automate** pseudo-terminals setup and queue initializations operations, thus drastically increasing system managers productivity in large OpenVMS clusters and networked environments.
- Minimize risks of errors while performing print queues related operations.

POLYCENTER Print Queue Manager (PQM), thanks to both its easy to use, forms based user interface, and its **Client/Server** approach, will let your system managers **define and maintain, from a central point**, such different print queue types as listed below, as well as pseudo-terminals and print queues attributes.

The **manageable print queue types** are:

- Physically **attached** printers.
- **LAT** print queues.
- **PostScript** print queues.
- **Print Servers** (LPS).
- **Generic** print queues.
- Distributed Queuing Service (**DQS**) Client or Server print queues.
- **ALL-IN-1** print queues.

- **DECpage** print queues.

## LIST OF FEATURES

- A central database for
  - \_ Target Client nodes and clusters.
  - \_ Print queues definitions.
  - \_ LAT pseudo-devices definition and specific setup.
  - \_ LAT pseudo-devices and queue initialization general options.
- Support for Attached, LAT, PostScript, Print Servers, Generic, and DQS print queues.
- Ability to set-up queue definitions directly inside ALL-IN-1 and DECpage.
- A forms and menus based user interface to edit, list or print the database contents and launch PQM remote operations.
- Simplified, automated and efficient operations on print queues (creation, update, and deletion), achieved using a Client/Server approach: those processings are initiated from a central PQM Master node, and targetted to any PQM Client node within the managed domain, such as a list of nodes or clusters within a data-centre or a complete enterprise network.
- A remote access to Terminal Server Manager (TSM) for Terminal Server ports characteristics display, configuration, or port logging-out. Preset scripts to configure DS90M, DS900, DS500, DS200 and DS100 Terminal Servers a suitable way for printing usage are provided.
- A Queue Activity report for statistics about the number of jobs per queue, the number of printed pages per queue and for inactive queues detection.
- A Queue Balancing facility on OpenVMS Clusters, to let you dispatch fairly the workload generated by print queues presence on different cluster members.

- An utility to automatically load already existing queues into the PQM database. This ought to be used by new users at PQM implementation time, to avoid manual database population effort.
- An authorization mechanism to allow PQM usage restriction to entitled persons.

PQM can also be used jointly with POLYCENTER System Watchdog, an event management tool which will monitor queues and possibly trigger Action Routines to automatically restart accidentally paused, stalled or stopped queues, using the PQM setup for the concerned queues.

### **Software Components**

POLYCENTER Print Queue Manager consists of the following main components:

- **PQM.EXE** implements the user interface and manages the PQM database. This process also initiates print queues definitions transmission to PQM Client nodes, when one requests their processing. It allows as well a remote access to the node on which TSM is installed, in order to manage LAT ports on Terminal Servers.
- **START\_EXECUTION.EXE**, this image runs in batch mode on the server node and is trusted to transfer data to remote client nodes, via DECnet task to task communications. It is distinct from PQM.EXE to enhance both communication efficiency and user interface availability.
- **APPLY.EXE** resides on any PQM Client node. It answers the connection request from START\_EXECUTION.EXE, receives the print queue definitions, then creates pseudo-terminals and initializes queues accordingly.
- **PQM\_AUTHORIZE.EXE** allows you to maintain the PQM\_AUTHORIZE.DAT file on the Client node. This file stores the nodes and user names of accounts from which the considered Client can be accessed. Connection requests from any other location are rejected by PQM DECnet objects, to ensure print queue definitions security.
- **PQM\$QUEUE\_BALANCING.EXE** dispatches print queues on distinct cluster members in order to equitably share the job processing load. It is executed once at startup, then regularly on a customizable time basis.
- **PQM\$LOAD.EXE** and **PQM\$EXTRACT.EXE** implement a Client/Server mechanism for PQM autoconfiguration: this allows the user, from the PQM Master node, to remotely extract definitions for all already existing print queues on a specified list of Client nodes.

These data are fed into the PQM central database for further edition and reuse.

- **PQM\$TSM.EXE** to allow a remote access to the node on which the Terminal Server Manager software is installed, and display terminal server ports setup, configure them adequately for printing usage or even disconnect current sessions and reset the port parameters from the permanent database.
- **DP\_PRINTERS.EXE** interfaces PQM with DECpage, thus allowing print queues be added, from PQM, into the DECpage printer database file DEVICELST.DAT.
- **CONVERT\_044.EXE** converts PQM V4.3 databases into the new PQM V4.4 format.

### **INSTALLATION**

This product is intended to be installed and customized by the customer. It uses the standard OpenVMS installation utility VMSinstal, and its installation procedure is self documented. The *POLYCENTER Print Queue Manager Installation Guide* provides advanced explanations and useful details about software and hardware prerequisites, answers to prompts during the installation, and postinstallation operations. However, sites with unusual customization requirements may wish to purchase installation and customization consulting services from Digital.

### **HARDWARE REQUIREMENTS**

#### **Supported Processors**

PQM supports all VAX and Alpha AXP processors (unless listed in Unsupported Processors), with a minimum of 8 Mega bytes of memory.

#### **Unsupported Processors**

MicroVAX I, VAXstation I, VAX-11/725, VAX-11/782, VAXstation 8000  
DECsystem 5800 series, DECsystem 5900 series, DECsystem 5260 series.

A TK50 Tape Drive is required for standalone MicroVAX 2000 and VAXstation 2000 systems.

#### **Disk Space Requirements (Block Cluster Size = 1)**

OpenVMS AXP Server platform	
Disk space required for installation:	21,000 Kilobytes
Disk space required for use (permanent):	5,500 Kilobytes

OpenVMS VAX Server platform

Disk space required for installation: 20,000 Kilobytes  
Disk space required for use (permanent): 4,500 Kilobytes

OpenVMS AXP Client platform  
Disk space required for installation: 20,000 Kilobytes  
Disk space required for use (permanent): 2,500 Kilobytes

OpenVMS VAX Client platform  
Disk space required for installation: 20,000 Kilobytes  
Disk space required for use (permanent): 2,000 Kilobytes

The sizes are approximate; actual sizes may vary depending on the user's system environment, configuration, and software options.

### CLUSTER ENVIRONMENT

This layered product is fully supported when installed on any valid and licensed VAXcluster\* configuration without restrictions. The **HARDWARE REQUIREMENTS** section of this document details any special hardware required by this product.

- V6.x VAXcluster configurations are fully described in the VAXcluster Software Product Description (29.78.xx) and include CI, Ethernet, and Mixed Interconnect configurations.

### SOFTWARE REQUIREMENTS

#### Prerequisite Software

- OpenVMS Operating System <V6.1 - V6.2>
- DECnet Phase IV or V
- FMS V2.4 (Run Time only; mandatory on the Master server side).

#### *OpenVMS Tailoring:*

The following OpenVMS classes are required for full functionality of this layered product:

- OpenVMS Required Saveset
- Network Support
- RMS Journaling Files

For more information on OpenVMS classes and tailoring, refer to the OpenVMS VAX Operating System Software Product Description (SPD 25.01.xx).

### OPTIONAL SOFTWARE

The following optional software may be used with PQM:

- DCPS V1.0
- DCPS-PLUS

- Distributed Queuing Services V1.3
- Terminal Server Manager V1.6
- POLYCENTER System Watchdog V2.2
- ALL-IN-1 V3.0
- DECpage V3.0

### GROWTH CONSIDERATIONS

The minimum hardware/software requirements for any future version of this product may be different from the requirements for the current version.

### DISTRIBUTION MEDIA

- CD-ROM
- TK50 Streaming Tape

This product is NOT available as part of the OpenVMS VAX Consolidated Software Distribution on CD-ROM.

The software documentation for this product is NOT available as part of the OpenVMS VAX Online Documentation Library on CD-ROM.

### ORDERING INFORMATION

#### For both OpenVMS VAX and Alpha AXP platforms

Client/Server documentation kit:	Q2-GG3AA-GZ
Server Installation and Orientation Services:	QS-GG3A9-A9
Client Installation and Orientation Services:	QS-GG6A9-A9

Client Concurrent Use License:	Q2-GG6AA-3B
Client Concurrent Use Update License:	Q2-GG6AA-5B

#### For OpenVMS AXP platform

Client/Server kit CD-ROM:	Q2-4P6AA-H8
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Server Traditional License:	Q2-4P6A9-AA
Server Traditional Update License:	Q2-4P6A9-RA

#### For OpenVMS VAX platform

Client/Server kit TK50:	Q2-GG3AA-H5
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Server Traditional License:	Q2-GG3A9-AA
Server Traditional Update License:	Q2-GG3A9-RA

\* Denotes variant fields. For additional information on available licenses, services, and media, refer to the appropriate price book.

The above information is valid at time of release. Please contact your local Digital office for the most up-to-date information.

## **SOFTWARE LICENSING**

This software is furnished under the licensing provisions of Digital Equipment Corporation's Terms and Conditions for Software Application Products, or where applicable, Standard Terms and Conditions. For more information about Digital's licensing terms and policies, contact your local Digital office.

### *License Management Facility Support:*

This layered product supports the OpenVMS License Management Facility. A Product Authorization Key is required for installation or use of the software.

License units for this product are allocated on an Unlimited System Use or a Concurrent Use basis.

This layered product offers the following licensing possibilities:

- Client side: Concurrent Use license.

Concurrent Use license allows any one node at a time (for a given operating system) to run the layered product.

- Server side: Traditional license.

This allows unlimited system use.

For more information on the License Management Facility, refer to the OpenVMS VAX Operating System Software Product Description (SPD 25.01.xx) or the *License Management Facility* manual of the OpenVMS Operating System documentation set.

## **SOFTWARE PRODUCT SERVICES**

A variety of service options are available from Digital. For more information, contact your local Digital office.

## **SOFTWARE WARRANTY**

A 90 day warranty for this software application product is provided by Digital with the purchase of a license for the product.

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