

Structured Data for Streamlined Business Processes

Challenge

Your mission critical applications produce trusted reports, and these reports contain information which is the lifeblood of an enterprise. Managing mainframe print and report distribution within today's business infrastructure has become increasingly complex. To help ensure optimal business operations, enterprises must automate and streamline the handling of their large and ever-growing volume of reports.

Opportunity

The speed of business is getting faster every day. Are you able to get the right people to the right data at the right time in the right format? Broadcom offers a suite of Output Management solutions for enterprise reporting and printing that can help you provide real-time access to reports. Quickly, easily, and securely share critical information. Manage compliance with various security regulations, such as General Data Protection Regulation (GDPR).

Benefits

The Broadcom Output Management portfolio of products fills the growing need for efficient report management demands. Together, these products deliver scalable, extendable solutions that significantly reduces time—and resource-intensive, manual document management.



Overview

Turning data into usable information is a primary objective of any IT organization. Data is gold! Many organizations use the mainframe to create and process thousands of enterprise reports daily, and struggle with accurately providing enterprise-wide access to integrated, business-critical output.

The Broadcom[®] Output Management solutions for enterprise reporting and printing allow end users to view their reports online, print only what is absolutely necessary, and package their information for easy and efficient delivery. This approach is as uncomplicated as its overall benefits which include reduced costs, improved efficiency, and improved user productivity.

Effectively manage your enterprise reporting and printing needs—save time and money with the Broadcom enterprise-wide print and report management solutions.

Output Management: Integrated Solutions for Enterprise Reporting and Printing

At Broadcom, we realize that information access goes beyond mere report delivery. Managing and securing large volumes of reports and documents in a modern enterprise is a daunting task. Not only must you streamline report capture, tracking, delivery, and printing, but also extend report management policies to include multi-platform documents. Traditional report management must now incorporate interactive knowledge management systems.

Broadcom provides leading software for the capture, archiving, distribution, viewing, and management of reports and documents throughout the enterprise. Our solutions employ scalable and reliable software that protects current IT investments—ensuring that the right information is available in the right format to the right people at the right time.

Broadcom Output Management solutions for enterprise reporting and printing provide the following results right now:

- **Provide fast access to report data** – Quickly, easily, and securely share data in real-time with relevant stakeholders.
- **More control of output** – Get secure, single point of control for the enterprise management of print, email, and intelligence delivery services.
- **Comply with regulations** – Improve standardized processes and security controls.

The Broadcom Output Management portfolio includes the following products:

- **Deliver™** – A single point of management for all your report capture, bundling, distribution management, and recipient access activities to help you save time and money by optimizing your report management.
- **View™** – A scalable and extensible report management solution that provides enhanced document management across your enterprise to help you reduce costs and comply with regulations.
- **Web Viewer** – Enables business users to securely access reports to print, email, save, and export to Microsoft Excel.
- **Spool™** – Securely manage your enterprise-wide print management, email, delivery, and data transformation across the network, platforms, and locations.

Deliver

Deliver is an online report management system that provides you with tools to manage and reduce the cost of report distribution. By automating day-to-day document management, Deliver helps you reduce time-consuming manual tasks and minimize document delivery costs. In addition, the product can be integrated with other important enterprise functions; for example, scheduling, restart and rerun, automated operations, storage, and security. Together with enterprise report management solutions from Broadcom, Deliver enables the automated flow of reports from the mainframe to anywhere in the enterprise.

Deliver uses the power of the mainframe to automate the day-to-day report management functions of distribution, tracking, and printing. Deliver operates in real-time, pre-spool mode, which enables Deliver to capture the report directly from the application and avoid the JES spool. Reports can optionally be processed from the JES spool in a post-spool mode, which is desirable when reports are generated remotely (NJE). Deliver provides a single point of management for all your report capture, distribution, archival distribution management, and recipient access activities—all without changing JCL or starting and stopping the system tasks.

Deliver provides the following key features:

- **Streamlined document delivery** – Eliminates manual sorting and provides immediate availability of reports.
- **Reduced printing** – Provides more efficiency and results in tremendous cost savings.
- **Dynamic reports** – Enable a report administrator to create a run-time rule to dynamically create report and distribution IDs based on data within the report.
- **Report bundling** – Bundle different reports into a single print stream.
- **Email reports and notifications** – An email notification stating that a report was created is sent to recipients.
- **Multiple report capture methods** – Capture reports through pre-spool, dataset (post-spool only), jobname, CLASS, DEST, Step, DD name, writer, and form.

View

View is an automated archival and retrieval system that provides lifecycle management and an online environment for viewing computer generated output (SYSOUTs), or simply reports. As reports are collected into View, enterprises can specify where they should be stored, either on disk or tape. You can also specify the report retention period. The retention period determines how long to store a report on disk before moving to tape, or when to completely remove the report.

The View repository is capable of storing many types of documents and file types to give you an easy mechanism for selectively viewing and managing a variety of data types. You can select portions of any report and set options to view and print only the pages that you need. By automating day-to-day report management, View helps to minimize time-consuming manual tasks and lower document delivery costs. With View's online visibility, fewer reports are printed, saving paper and printing costs, and reducing the time spent reformatting, tracking, handling, and re-running reports. Immediate viewing access while reducing printing and manual delivery results in tremendous cost savings.

View integrates with other solutions to automate the flow of reports between mainframe and distributed platforms, offering a solution that grows with changing business needs.

View provides the following key features:

- **Flexible selection criteria** – Enables both business and IT users to search for jobs based on job names, condition codes, start and end date, and time— additionally see, print, and email all or individual DDs for the job.
- **Secure viewing facility** – Customizes how a report should be displayed, with the ability to hide rows and columns. Securing this view enables report administrators to hide sensitive information and only show it to the appropriate users.
- **Long-term archival** – Supports report retention management to meet corporate, industry, and government guidelines.
- **Out of the box reporting tools** – Extract critical metadata and other batch functions to create custom reports.
- **Data encryption** – Protect your sensitive report data using 256-bit AES encryption.
- **Auditing capabilities** – Provides the ability to measure the activity and usage of a View database. Easily export to Microsoft Excel.

Web Viewer

Web Viewer delivers web-based access to View, and enables business users to view, print, email, save, and export reports. Web Viewer saves printing costs because all reports can be viewed online in real time. It enables users to export text reports to Excel using formatting rules that can be saved for later use. These rules remove data that is not needed in a report and help reduce or eliminate the time it takes to manually modify the report in Excel. Automating exports to Excel reduces time, frustration, and mistakes.

Some businesses generate Xerox or AFP mainframe type reports. When these types of reports are encountered using Web Viewer, they get converted to PDF automatically. No special software is needed by the end users, and this saves money by not having to maintain expensive AFP or Xerox printers.

Web Viewer also provides secure open access through REST APIs, enabling users to programmatically access their reports. These APIs can also be called by third-party or in-house applications. In addition, the Zowe CLI provides a command-line interface that lets you interact with View remotely and use common tools such as IDEs, shell commands, and bash scripts. This powerful CLI interface enables automation. For example, users can run scripts manually or through a scheduling program and receive an exported report through email using the Zowe CLI.

Web Viewer provides the following key features:

- **Mainframe security** – Enables all of the View security features.
- **Enhanced productivity** – Allows users to print, email, save, and export reports.
- **Lower software and printer cost** – Allows users to view non-mainframe reports such as AFP in PDF format.
- **Reduced paper costs** – Allows users to view pages without printing which reduces the dependency on printers.

Spool

Spool provides an enterprise-wide, single-image print and report distribution solution to manage remote printing in a z/OS environment. Operating as a self-contained subsystem, Spool provides nonstop operation as it collects reports from multiple sources (including VSE, VM, OS/400, NetWare, Windows, Linux, and UNIX)—all while offering centralized, enterprise-wide spooling and print capabilities.

Spool (cont.)

Additionally, the advanced user controls facilitate support for a wide variety of output interfaces and advanced printers. It offers powerful facilities for exchanging information between programs and platforms, and for spooling, printing, and delivering in a multiplatform business environment.

The central, integrated point of role-based control offers:

- Unified management of IT operations through 3270 or web access
- Simplified access to end-content consumers
- Discreet cost control over hard-copy generation
- Pooled print resources for production failover capability

Highly granular security enables:

- Rule-based definitions for distribution of content to a printer.
- Identity and access controls for specific pieces or groups of content.
- Granular access controls for specific content pages.
- End-content consumer operation limits.

Spool securely manages your business-critical print and report delivery requirements across networks, platforms, and locations. It enhances your current spool environment, providing a central point of control over day-to-day print management issues and securing the distribution of important data.

Spool provides the following key features:

- **Central point of control** – You can view and manage the printing, emailing, and distribution of reports and documents to assigned destinations.
- **Java-based document transformers** – Automatically convert and split AFP, Xerox, PCL, TIFF, or PDF documents into AFP, Metacode, PDF, Postscript, Web, Image, PCL, PDF/A, and TIFF formats.
- **Support for multiple print interfaces** – Enable data distribution for virtual printers, NJE, CALL, SUBSYS, SVSOUT, Natural, LPD, and IPP.
- **Multi-access spool** – Share spool data on up to 32 Spool systems on multiple CPUs.
- **Support for multiple print drivers out of the box** – Many output drivers are available including support for Email, FTP, DB2, SharePoint, and MQ, among others.

For more information, please visit our site: www.broadcom.com/products/mainframe/output-management

About the Mainframe Division at Broadcom

The Mainframe Division at Broadcom continues to drive the next horizon of open, cross platform, enterprise solutions. We specialize in DevOps, security, AIOps, and infrastructure software solutions that allow customers to embrace open tools and technologies, make mainframe an integral part of their cloud, and enable innovation that drives business forward. We are committed to forging deep relationships with our clients at all levels. We go beyond products and technology to partner with you in creative ways that support your success.