BMC AMI Batch Optimizer

Optimize batch workloads without costly manual changes to jobs or job control language (JCL)

**PRODUCT DESCRIPTION**

BMC AMI Batch Optimizer provides vastly improved batch job runtimes. Its insight into your mainframe batch processing environment means jobs run at peak efficiency and meet the demands of digital business. It reduces cost with dynamic data optimization techniques, such as job piping and adaptive processing, and by pinpointing which jobs would benefit the most from these techniques.

**BUSINESS CHALLENGE**

The rapid pace of digital business has created management challenges as business applications continue to grow and environments become increasingly complex. Global demands and the mainframe’s key role in digital business make it difficult for IT to cost-effectively manage batch processing manually and still get jobs completed in a timely manner. Changes are often deferred with manual processes because of the fear of introducing JCL errors, which can result in missing the shrinking batch window and impact key business services. Batch jobs haven’t kept pace with the advances in hardware and OS technologies, resulting in inefficient batch run times that waste expensive resources.

**BMC SOLUTION**

BMC AMI Batch Optimizer helps meet digital business objectives by delivering fast batch processing and dynamic, targeted optimization to dramatically improve performance while reducing costs. Jobs take less time, which allows more time to solve problems and meet service level agreements for batch and online processing.

### Key Features

- **Fast** – Reduce elapsed times for batch processes
- **Optimized** – Quickly and easily optimize VSAM, QSAM, BSAM, and BPAM data sets to eliminate I/Os and tape mounts
- **Easy** – Simplify batch job prioritization to determine which jobs benefit the most from I/O optimization and parallel execution
- **Dynamic** – Locate batch jobs most in need of I/O optimization and leverage piping features to process multiple jobs and data steps

### Key Benefits

- Significantly reduce batch job runtimes and free up valuable system resources
- Postpone costly CPU upgrades by getting the most out of your current resources
- Free up time for mission-critical mainframe workloads and process multiple jobs concurrently
- Improve performance and reduce costs by automatically adapting processing techniques to suit current system conditions

BMC AMI Batch Optimizer can significantly improve I/O performance, dynamically execute multiple batch job steps in parallel, and pipe file I/O between batch processes for concurrent execution of data-dependent steps or jobs.
PRODUCT DETAILS

**Candidate utility:** BMC AMI Batch Optimizer provides a candidate utility that generates reports to help you understand which jobs might benefit from I/O optimization and parallel execution in your environment, helping pinpoint where you will achieve significant elapsed-time savings. It also removes manual updates and guesswork to allow IT best practices to be implemented.

**Standard and advanced options:** BMC AMI Batch Optimizer has both a standard and an advanced option. BMC AMI Batch Optimizer – Standard provides data optimization. BMC AMI Batch Optimizer – Advanced contains the data optimization capabilities of the Standard edition and adds job optimization and job pipes.

**Data optimization:** Using BMC AMI Batch Optimizer – Standard provides I/O performance benefits for VSAM and non-VSAM data sets. By using a variety of I/O optimization techniques, the number of accesses to disk and unnecessary wait times are reduced, or eliminated, reducing elapsed run times. Data Optimizer automatically tunes your system to achieve optimum application performance.

- Adjusts buffer values and processing techniques dynamically based on current system conditions
- Build Local Shared Resources (LSR) buffer pools, dynamically switching to LSR processing for random access
- Performs read-ahead functions for faster sequential access during LSR processing, read large amounts of data, and overlap I/Os to maximize performance
- Optimizes support for VSAM, QSAM, BSAM, and BPAM data sets, as well as the buffer value for tape, PDS members, and striped data sets
- Retains multiple data tracks in memory to maximize cache-hit performance benefits for random processes

**Job optimization:** BMC AMI Batch Optimizer – Advanced uses parallelism, workload distribution, and data sharing to reduce batch processing time and balance the workload across your system or Parallel Sysplex. Job Optimizer reduces the elapsed time of batch jobs and job streams by running job steps in parallel and by automatically routing job steps to available images in the Parallel Sysplex.

**Job piping:** BMC AMI Batch Optimizer – Advanced provides the in-memory pipes feature. Job Optimizer Pipes allows data-related jobs or job steps to transfer data while running in parallel, without using I/O resources. The Job Optimizer Pipes component establishes an in-memory pipe between one or more jobs that create the data (writers), and one or more jobs that read the data (readers). By using a pipe, the reader can access a block as soon as the block is written. The writer and reader jobs or steps can execute on the same image or on another image in the Parallel Sysplex.

**FOR MORE INFORMATION**

To learn more about BMC AMI Batch Optimizer, please visit [bmc.com/it-solutions/bmc-ami-batch-optimizer.html](http://bmc.com/it-solutions/bmc-ami-batch-optimizer.html)