Advanced z/OS Performance: WLM, Sysplex, UNIX Services and Web
ES85G

Delivery Type: Classroom
Duration: 5 days

Overview

Today z/OS supports new workloads running as e-business servers, including the IBM Hypertext Transfer Protocol (HTTP) Server and WebSphere. These workloads exploit the latest features of the z/OS runtime environments, including Parallel Sysplex, Workload Manager (WLM) and UNIX System Services (USS). New hardware technology such as zAAP and zIIP processors can be exploited for selected workloads, and the WLM Intelligent Resource Director balances workloads across clustered LPARs in a sysplex.

Examine the performance management and monitoring components of the Parallel Sysplex, USS and WLM environment, using extensive Resource Management Facility (RMF) reports and console displays to understand what is happening in the system. Based on this foundation, analyze case studies involving the HTTP Server in detail. Finish with an introduction to performance and tuning with WebSphere V6 for z/OS

Pre-Requisites

A working knowledge of the z/OS operational environment is assumed, including a basic knowledge of WLM, UNIX System Services, and Parallel Sysplex. Previous experience and/or training in z/OS measurement and tuning and RMF are also assumed. Such training can be obtained by attending course Basic z/OS Tuning Using the Workload Manager (WLM) (ES54).

Objectives

✓ Describe the advanced performance components of current complex z/OS environment and identify the major performance factors for these components
✓ Identify Coupling Facility (CF) technologies and how they function in a Parallel Sysplex, including CF links and CF structures
✓ Monitor and analyze the service times and other performance indicators of the CF and other Parallel Sysplex components, including Cross-system Coupling Facility (XCF)
✓ Predict and monitor effects of system managed CF duplexing on system performance

- ✓ Identify WLM services and their use by z/OS applications, including enclave services, routing services, and application environments
- ✓ Evaluate RMF enclave reports and understand enclave resource accounting
- ✓ Implement and control WLM optional features such as Intelligent Resource Director (IRD) and WLM defined capacity, and monitor LPAR performance when optimized by these features
- ✓ Evaluate the use of Enterprise Workload Manager (EWLM) as an end-to-end workload management tool
- ✓ Describe the new functionality introduced by zAAP and zIIP specialty processors on z/OS systems and use appropriate tools to control and monitor specialty CP workload performance

Target Audience

This course is for z/OS Systems Programmers, experienced Performance Analysts and Performance Administrators, UNIX Services support personnel, and other experienced I/S professionals who want to update their RMF and performance management skills to include the latest z/OS e-business runtime environments.