

Dynamics AX: Performance Hands on Lab



Hands-on Lab

Target Audience:

This Hands-on Lab is designed for database administrators and application developers in your organization who are involved in deploying, supporting, or upgrading Microsoft Dynamics AX.

Key Benefits:

- *Provide applicable techniques, such as performance improvement approaches that you can apply in production*
- *Transfer knowledge on performance best practices*
- *Save time and money by reducing the duration of key processes within Microsoft Dynamics AX*
- *Provide information to help you prevent performance issues before they arise in production*

Overview

The Performance Hands-on Lab for Microsoft Dynamics AX is an in-depth training session on the tools and techniques used to identify performance bottlenecks and optimize the application. The Hands-on Lab covers topics such as Microsoft Dynamics AX and Microsoft SQL Server configuration tuning, query and index optimization, and application trace analysis. This proactive service can be scheduled any time during implementation, from user acceptance testing through operation to optimize performance. For example, you can schedule the Performance Hands-on Lab before an anticipated increase of transaction volume to optimize performance.

Data collection is performed on the production system using proven tools. The Performance Hands-on Lab provides fast and easy data collection with minimal impact on the production servers and real-time troubleshooting of the production system. The participants will learn theory, process, and how to resolve production performance issues in real-time. The techniques can also be applied during the development and implementation of new modules, functionality, and customizations. The duration of this service is four days of dedicated on-site time with your organization (partners are welcome to attend on your request).

Technical Highlights

After completing this Hands-on Lab, you will be able to:

- Collect and analyze Dynamics AX performance data using proven tools.
- Understand how to approach different troubleshooting scenarios.
- Identify actions to improve the performance of your Microsoft Dynamics AX solution.

Syllabus

Pre-visit

Preparation:

The following data should be provided to the Microsoft team one week before the Performance Hands-on Lab:

- *Summary of performance concerns and problem reports from the production environment*

This Hands-on Lab runs for **four** full days. Participants should anticipate consistent start and end times for each day. Early departure on any day is not recommended.

Module 1: Factors that Impact Performance

This module provides an overview of the factors that impact the performance of Microsoft Dynamics AX.

Module 2: Installation

In this module, you will learn to install Performance Analyzer for Microsoft Dynamics.

Module 3: Analyze Configuration

This module will discuss how to analyze SQL Server and Microsoft Dynamics AX configurations and share the best practices for each.

Module 4: Analyze Indexes

This module covers SQL indexes and the best practices around configuring them for Microsoft Dynamics AX.

Module 5: Analyze SQL Queries

This module focuses on how to find and resolve Microsoft Dynamics AX queries that are causing poor application performance.

Module 6: Analyze Blocking

This module provides you with the tools and process for resolving database blocking in Microsoft Dynamics AX.

Module 7: Benchmark Analysis

In this module, you will learn how to analyze your transaction volumes to better answer the question - **What is the change?**

Module 8: Microsoft Dynamics AX Queries

This module demonstrates some Microsoft Dynamics AX specific analysis.

Module 9: Microsoft Dynamics AX Tracing

This module demonstrates how to do tracing in Microsoft Dynamics AX to resolve issues.

Module 10: SQL Server Reporting Services (SSRS)

This module demonstrates the SSRS reports provided with Performance Analyzer for Microsoft Dynamics.