IBM WebSphere Application Server for z/OS, V5 Features Support for Key Java and Web Services Standards

Overview

WebSphere® Application Server for z/OS™, V5 is a Java™ 2 Enterprise Edition (J2EE) 1.3-compatible¹ Web services application server specifically designed to utilize the unique qualities of service provided by IBM @server zSeries™ hardware and z/OS operating system. WebSphere Application Server for z/OS includes the robust, enterprise-level capabilities for workload management, availability, and scalability.

What’s new with this version?

V5 is designed to be functionally equivalent with the programming model of the WebSphere Application Server Network Deployment. This allows for greater flexibility in development and simplified management capabilities, while maintaining the tight integration and optimization for the z/OS and zSeries programs and products.

WebSphere Application Server for z/OS, V5 provides:

- Support for next generation technologies — J2EE 1.3-compatible¹ with support for key Web services.
- Integration with enterprise data and transactions — Allows comprehensive utilization of resources, from hardware to IT personnel, through the use of open standards and integration with zSeries processes and procedures.
- Simplified deployment and management features — Contains improvements to both deployment and management functions to help provide a friendlier and more flexible environment, in a manner designed to be consistent with WebSphere Application Server Network Deployment V5.
- A configuration specifically optimized for the z/OS and zSeries programs and products — Continues the legacy of close integration and leverage of the z/OS operating system and zSeries hardware.
- New pricing metric — With WebSphere Application Server for z/OS, V5, the program will be priced on the Value Unit metric to allow for more flexible pricing and to more closely align with other zSeries software charges.
- A new entry price option — Affords an easy on-ramp for e-business on the z/OS operating system. Refer to the Description section for more information.

With the delivery of V5, the unified WebSphere Application Server family delivers a flexible and agile deployment environment for advanced e-business. Based on business needs, an application can be deployed on a wide variety of platforms. V5 demonstrates the continuing commitment by IBM to deliver dynamic e-business and open-standard support.

Key Prerequisites

- Any hardware that supports OS/390® V2.10, z/OS or z/OS.e operating systems
- Binary floating point hardware, such as S/390® Parallel Enterprise Server Generation 5, and higher, systems, is highly recommended
- OS/390 V2.10, z/OS or z/OS.e operating system

Planned Availability Date

May 2, 2003 (Java compatible support available May 30, 2003.¹)

At a Glance

WebSphere Application Server for z/OS helps maximize your company’s return on investment while leveraging existing software assets and making your administrative resources more productive. Benefits include:

- Java Enterprise Edition (J2EE) V1.3 compatibility¹
- Java compatibility
- Support for key Web services standards
- Deep integration with the z/OS operating system
- Enhanced scalability

For ordering, contact:
Your IBM representative, an IBM Business Partner, or the Americas Call Centers at 800-IBM-CALL

Reference: LE001

¹ The initial delivery of WAS V5 is Java compatible, not J2EE compatible. An updated product will be made available via an upcoming announcement. Java 2 Enterprise Edition (J2EE) compatibility will be provided to current WAS V5 customers via a Program Temporary Fix (PTF) and to customers new to WAS V5 via a refreshed System Pack.
As part of the foundation and tools of the WebSphere software pyramid, WebSphere Application Server for z/OS delivers a J2EE-compatible Web services application server in a configuration optimized to leverage the unique Qualities of Service (QoS) inherent to the z/OS and zSeries programs. The program is delivered as a single offering, along with Software Development Kit (SDK) 1.3.

It includes the following elements as part of its Web deployment environment:

- Support for the latest J2EE and Web services standards:
  - Java 2 Enterprise Edition (J2EE) V1.3 compatibility
  - Web services including private Universal Description, Discovery, and Integration (pUDDI)
- Integrated run time
- Common administration and deployment features
- Highly secure Web deployment environment
- Java Reliability Availability and Serviceability (RAS) services integrated with existing RAS services and quality of services for z/OS and OS/390 programs
- Support for interoperability with:
  - WebSphere Application Server, WebSphere Application Server Network Deployment, and WebSphere Application Server Enterprise
  - CICS® Transaction Server (TS) V1.3, or later, for inbound Internet Inter-Object Request Broker Protocol (IIOP) support
  - Programs from other vendors that comply with the supported levels of the J2EE specification


- Workstation-based support for administration and operations applications used to install, deploy, and manage WebSphere Application Server for z/OS applications.
- SDK 1.3.0 — Shipped with WebSphere Application Server for z/OS, V5. You must use the SDK shipped with the product.

The Entry Price Option allows for an on ramp to e-business on the z/OS operating system for new customers. It enables the purchase of a minimum number of Value Units (10 for z800, 20 for z900) of eligible WebSphere Application Server for z/OS to be deployed in a manner consistent with IBM terms and conditions. You are required to install the products on eligible zSeries hardware such as z800, zSeries 800 coupled mode, and z900 with z/OS operating system running in z/Architecture™ (64-bit) mode or equivalent. No other MVS™-based operating system can be licensed to that server, among other requirements. To validate compliance with the terms and conditions, IBM requires LPAR utilization data to be provided by you on a monthly basis.

For more information, refer to Software Announcement 203-093, dated April 8, 2003.

This program includes software based on technology developed by the Apache Software Foundation. For more information, visit: [http://www.apache.org/](http://www.apache.org/)

**Accessibility by People with Disabilities**

The following features support use by people with disabilities:

- Operation by keyboard alone
- Optional font enlargement and high-contrast display settings
- Screen readers and screen magnifiers tested for use by people with visual impairment

**Section 508 of the U.S. Rehabilitation Act**

WebSphere Application Server for z/OS, V5 is capable, as of May 2, 2003, when used in accordance with IBM’s associated documentation, of satisfying the applicable requirements of Section 508 of the Rehabilitation Act, provided that any assistive technology used with the product properly interoperates with it.

**Product Positioning**

The latest release of WebSphere Application Server is designed to exploit the advanced capabilities of the IBM zSeries family of products. It allows for deployment of J2EE-based applications to the mainframe and is designed to provide application programming model consistency with WebSphere Application Server Network Deployment. WebSphere Application Server for z/OS, V5 combines the best of two worlds:

- Integrated, open-standards-based J2EE environment
- Reliability and availability of the zSeries and S/390 products

**Reference Information**

For information on the Web:

- The WebSphere Application Server zone of Developer Domain has valuable V5.0 information. Visit: [http://www7b.boulder.ibm.com/wsdd/zones/was/](http://www7b.boulder.ibm.com/wsdd/zones/was/)
Trademarks

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Services

**WebSphere® Architecture and Design Workshop for z/OS™:** This is a five-day workshop where IBM consultants will work with a customer’s architects and subject-matter experts to develop a conceptual solution to an e-business requirement based on WebSphere architecture. For more information, visit:

http://www.software.ibm.com/wsdd/services/services.html#z

**IBM Implementation Services for WebSphere Application Server for zSeries™** (previously known as IBM Installation Services for WebSphere Application Server for zSeries) provides a services specialist at customer site to assist with planning, installation, and implementation services for WebSphere Application Server software on the zSeries and S/390® platforms.

This service helps customers use rich security features to build, manage, and deploy a powerful and available WebSphere e-business environment on a zSeries server. A services specialist will work with technical and programming staff to help increase productivity and accelerate implementation of WebSphere solutions in an e-business environment. For more information, visit:


**Performance and Testing Services:** Optimizes the performance and availability of a customer’s IT infrastructure. For more information, visit:

http://www.ibm.com/services/ism/pmts

**WebSphere Proof of Concept for z/OS:** The objective of this offering is to rapidly build and demonstrate a limited working prototype of an e-business solution based on a real customer e-business problem. For more information, visit:

http://www.software.ibm.com/wsdd/services/services.html#z

**WebSphere z/OS V5 Application Migration:** This offering’s objective is to migrate applications from previous versions of WebSphere Application Server for z/OS to V5, or from WebSphere Application Server distributed to WebSphere Application Server for z/OS, V5. For more information, visit:

http://www.ibm.com/websphere/developer/services

Offering Information

Product information is available through the Offering Information Tool at:

http://www.ibm.com/common/ssi

Through the Passport Advantage Web site at:

http://www.ibm.com/software/passportadvantage

Publications

The following licensed publication is available with your order and on the Web:

http://www.ibm.com/software/webservers/appserv/zos-os390

<table>
<thead>
<tr>
<th>Title</th>
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<tr>
<td>WebSphere Application Server for z/OS, V5 GI11-2825 Program Directory</td>
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<th>Title</th>
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<tbody>
<tr>
<td>WebSphere Application Server for z/OS, V5 GA22-7908 License Information</td>
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The following publications are available on the Web:

http://www.ibm.com/software/webservers/appserv/zos_os390/

- Program Directory for WebSphere Application Server for z/OS, V5
- WebSphere Application Server for z/OS, V5 License Information
- WebSphere Application Server for z/OS, V5 Installation and Customization
- WebSphere Application Server for z/OS, V5 Diagnosis
- WebSphere Application Server for z/OS, V5 Operations and Administration
- WebSphere Application Server for z/OS, V5 Messages and Codes

Application development help, and the above publications, are also provided in the WebSphere Application Server for z/OS InfoCenter: Visit:

Education Support

Call IBM Education and Training at 800-IBM-TEACH (426-8322) for catalogs, schedules, and enrollments.
Customization and system management help are provided within these tools delivered with WebSphere Application Server for z/OS, V5:

- System Management
- WebSphere for z/OS Customization Dialogs

Related WebSphere Publications: Related WebSphere Application Server family documentation can be found on the Web:


### Technical Information

#### Hardware Requirements

For WebSphere Application Server for z/OS, V5:

- Any hardware that supports OS/390® V2.10, z/OS or z/OS.e operating systems
- Binary floating point hardware, such as S/390 Parallel Enterprise Server™ Generation 5, and higher, systems, is highly recommended

#### Software Requirements

- OS/390 V2.10 (5647-A01), z/OS (5694-A01), or z/OS.e (5655-G52) operating systems

  - The following z/OS elements, features, and components must be installed, enabled, and configured:
    - Communications Server (TCP/IP) or equivalent
    - z/OS UNIX® System Services and the hierarchical file system (HFS)
    - Security Server (RACF®) or equivalent security management product
    - System logger
    - System SSL security required when using SSL
    - Workload management in goal mode
    - Resource recovery services

  - The following z/OS elements, features, and components are optional:
    - IBM HTTP Server for OS/390, or equivalent
    - If your application environment uses a DB2® database, then DB2 Universal Database® Server for OS/390 and z/OS, V7 is required (may coexist with existing levels of DB2 programs used by other applications)
    - CICS® Transaction Server:
      - If your application environment uses CICS Transaction Server, then CICS Transaction Server for OS/390 V1.3, or later.
      - If your application environment accesses CICS Transaction Server through the CICS Transaction Gateway (TG), then CICS TG V5 plus appropriate maintenance is required. The required CICS TG support is planned to be made available within 90 days of WebSphere Application Server for z/OS, V5 General Availability. Refer to details at:

        http://www.ibm.com/cics/ctg

  - Information Management System (IMS™)
    - If your application environment accesses IMS through Java™ Database Connectivity (JDBC), or through IMS Connect/Connector for Java, then IMS V8, or later, and appropriate maintenance is required. Refer to details at:

        http://www.ibm.com/ims

  - SDK: IBM Developer Kit, Java 2 Technology Edition, SDK 1.3 with specific maintenance SR-17 (included with WebSphere Application Server for z/OS, V5), or later.

- The WebSphere MQ for z/OS product function included within WebSphere Application Server for z/OS, V5 cannot be used independently of WebSphere Application Server for z/OS, V5 and has significantly reduced function. If you wish to use the full-function WebSphere MQ for z/OS (5655-F10) program together with WebSphere Application Server, you must purchase a separate license for WebSphere MQ for z/OS, V5.3.1, or later. WebSphere MQ for z/OS, V5.2 and V5.3 can run with WebSphere Application Server for z/OS, V5. However, it will have significantly reduced function that is only available at the WebSphere MQ for z/OS, V5.3.1 level. Java client and XA support are examples of functions that will only be available at the WebSphere MQ for z/OS, V5.3.1 level.

  - Application development and Web site development tools such as the following are available:

    - WebSphere Application Server, V5 (distributed version)
    - WebSphere Studio V5

OS/390 customers are strongly encouraged to migrate to the z/OS operating system. Customers migrating to the z/OS operating system can take advantage of the many functions that are designed to benefit a WebSphere environment, including Dynamic Routing for WebSphere transactions, improvements in SSL performance, Intrusion Detection Services, large scale PKI services, and Enterprise Identity Mapping.

Make your plans to migrate to the z/OS operating system now. z/OS V1.4 is planned to be an important staging release for future IBM middleware releases. z/OS V1.4 is planned to be the base for exploiting future zSeries server enhancements. For information on migration, refer to the z/OS Migration Web site at:


Over time, WebSphere Application Server for z/OS is planned to deliver functionality intended to exploit features of the z/OS operating system.

For further details, refer to the publications found at the Web site listed in the Publications section of this announcement.

#### Performance Considerations:

WebSphere Application Server for z/OS, V5 runs on any hardware that supports the OS/390 V2.10 or z/OS operating system, or later.
Because of changes introduced in SDK 1.3.0, there are significant performance advantages for those applications doing floating point arithmetic if the machine has binary floating point hardware, such as S/390 Parallel Enterprise Server™ — Generation 5, or higher, systems.

**Planning Information**

WebSphere Application Server for z/OS, V5 can be installed independently and will coexist with prior versions of WebSphere Application Server for z/OS.

**Customer Responsibilities:** WebSphere Application Server for z/OS, V5 can be installed independently and will coexist with prior versions of WebSphere Application Server for z/OS.

**Direct Customer Support:** For IBM software support services, call 800-IBM-SERV (800-426-7378).

For technical support or assistance, contact your IBM representative for additional assistance, or visit:

http://www.ibm.com/support

**Packaging:** Program components are delivered either on tape or via the Web. All publications are delivered via the Web.

**Security, Auditability, and Control**

WebSphere Application Server for z/OS, V5 provides automated authorization checking and a very strong security implementation for authentication and authorization. It is also designed to provide authentication and authorization service to clients, automatically checking security credentials of all clients accessing WebSphere Application Server for z/OS services.

WebSphere Application Server for z/OS continues to derive its security services from the information provided by the hosting IBM HTTP server for OS/390. This is consistent with previous releases of the product. Support for basic or certificate-based authentication and support for SSL is included by this support.

The customer is responsible for evaluation, selection, and implementation of security features, administrative procedures, and appropriate controls in application systems and communication facilities.

**Ordering Information**

Ordering WebSphere Application Server for z/OS, V5 through the Internet ShopzSeries provides an easy way to plan and order your z/OS ServerPac or CBPDO. It will analyze your current installation, determine the correct product migration, and present your new configuration based on z/OS. Additional products can also be added to your order (including determination of whether all product requisites are satisfied).

ShopzSeries is available in the U.S. and several countries in Europe. In countries where ShopzSeries is not available yet, contact your IBM representative (or Business Partner) to handle your order via the traditional IBM ordering process. For more details and availability, visit the ShopzSeries Web site at:


**WebSphere Application Server for z/OS, V5**

WebSphere Application Server for z/OS, V5 is priced per Value Unit.

**Software Subscription and Support:** The annual price of Software Subscription and Support for WebSphere Application Server for z/OS, V5 (5655-F81) depends on the number of Value Unit license entitlements purchased.

**Value Unit Exhibit VUE007**

<table>
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<th>Minimum</th>
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**Description**

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<th>Description</th>
<th>Program Number</th>
<th>Feature Number</th>
<th>Medium Feature Number</th>
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<tbody>
<tr>
<td>WebSphere Application Server for z/OS, V5 Per Value Unit</td>
<td>5655-I35</td>
<td>0001</td>
<td>5802</td>
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</table>

**Basic License:** To order, specify the program number, feature number 9001 for asset registration, and the OTC feature number. Also specify the feature number of the desired distribution medium. To suppress shipment of media, select the license-only option in CFSW.

**OTC Feature Number**

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**Program Number 5655-I35**

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<td>5802</td>
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<td>WebSphere Application Server for z/OS, V5 per 250 Value Units</td>
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<td>5802</td>
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**Note:** The media type is chosen during the customized offering (CBPDO, ServerPac) ordering procedure.

**Software Subscription and Annual Support:** To order the Software Subscription and Annual Support, specify program number 5655-F81 and the feature number from the table below. The quantity of licenses must be equal to the number of OTC licenses ordered.

Existing WebSphere Application Server V4.0 and V4.0.1 for z/OS and OS/390 Software Subscription customers must order WebSphere Application Server for z/OS, V5; shipment is not automatic.
Order under PID 5655-F81
Standard Support Media
Support for Annual Charge Feature Number
Program Name Feature Number

WebSphere Application Server for z/OS, V5 — No Charge
Decline Software Subscription and Support

WebSphere Application Server for z/OS, V5 — No Charge
Per MSU Software Subscription and Support Registration

WebSphere Application Server for z/OS, V5 — No Charge
Per 250 MSU Software Subscription and Support Registration

WebSphere Application Server for z/OS, V5 — OTC Per Value Units Software Subscription and Support One Year

WebSphere Application Server for z/OS, V5 — OTC Per 250 Value Units Software Subscription and Support One Year

Customization Options: None

**Customized Offerings**

Product media is shipped only via Customized Offerings (for example, CBPDO, ServerPac, SystemPac®). Non-customized items (CDs, diskettes, source media, media kits) will continue to be shipped via the stand-alone product.

**Terms and Conditions**

**Licensing:** IPLA. Proofs of Entitlement are required for all authorized use.

These products are licensed under the IPLA, and the associated Agreement for Acquisition of Support, and the Addendum for Support (Z125-6443), which provides for support with ongoing access to releases and versions of the program. These programs have a one-time license charge for use of the program and an ongoing recurring charge for the enhanced support that includes telephone assistance (voice support for defects during normal business hours) as well as access to updates, releases, and versions of the program as long as support is in effect. The customer will be notified of discontinuance of support with 12 months’ notice.

Program service will be available until March 31, 2006.

**Money-Back Guarantee:** If for any reason you are dissatisfied with the program, return it within 30 days from the invoice date to the party (either IBM or its reseller) from whom you acquired it for a refund. This applies only to your first acquisition of the program.

**Copy and Use on Home/Portable Computer:** No

**Volume Orders (IVO):** No

**Passport Advantage Applies:** No

**Software Maintenance Applies:** No

For Operating System software, the revised IBM Operational Support Services — Support Line offering will provide support for those operating systems and associated products that are not available with the newly announced Software Maintenance offering. This will ensure total support coverage for your enterprise needs, including IBM and selected non-IBM products. For complete lists of products supported under both the current and revised Support Line offering, refer to our Web site at:

http://www.ibm.com/services/sl/products

For additional information on the revised IBM Operational Support Services, refer to Services Announcement 601-023, dated July 10, 2001.

**IBM Operational Support Services — Support Line:** Yes

**AIX®/UNIX Upgrade Protection Applies:** No

**Entitled Upgrade for Current AIX/UNIX Upgrade Protection Licensees:** No

**iSeries™ Software Subscription Applies:** No

**Variable Charges Apply:** No

**Educational Allowance Available:** Yes, 15% education allowance applies to qualified education institution customers.
### Prices

<table>
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<th>WebSphere Application Server for z/OS, V5</th>
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**Software Subscription and Annual Support**

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### Global Financing

IBM Global Financing offers competitive financing to credit-qualified customers to assist them in acquiring IT solutions. Our offerings include financing for IT acquisition, including hardware, software, and services, both from IBM and other manufacturers or vendors. Offerings (for all customer segments: small, medium, and large enterprise), rates, terms, and availability can vary by country. Contact your local IBM Global Financing organization or visit the Web at:

http://www.ibm.com/financing

### Order Now

To order, contact the Americas Call Centers, your local IBM representative, or your IBM Business Partner.

To identify your local IBM representative or IBM Business Partner, call 800-IBM-4YOU (426-4968).

**Phone:** 800-IBM-CALL (426-2255)  
**Fax:** 800-2IBM-FAX (242-6329)  
**Internet:** ibm_direct@vnet.ibm.com  
**Mail:** The Americas Call Centers Dept. LE001  
P.O. Box 2690  
Atlanta, GA  30301-2690

Reference: LE001

The Americas Call Centers, our national direct marketing organization, can add your name to the mailing list for catalogs of IBM products.

**Note:** Shipments will begin after the planned availability date.

### Trademarks

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