IBM

IBM SecureWay On-Demand Server Version 2.0

Highlights

Delivers personalized Web solutions on demand to anyone, anywhere using profile serving

Provides industry-leading, two-staged personalization capabilities

Brings enterprise-class characteristics to the Web environment

Provides authentication and authorization services for secure access to Web applications
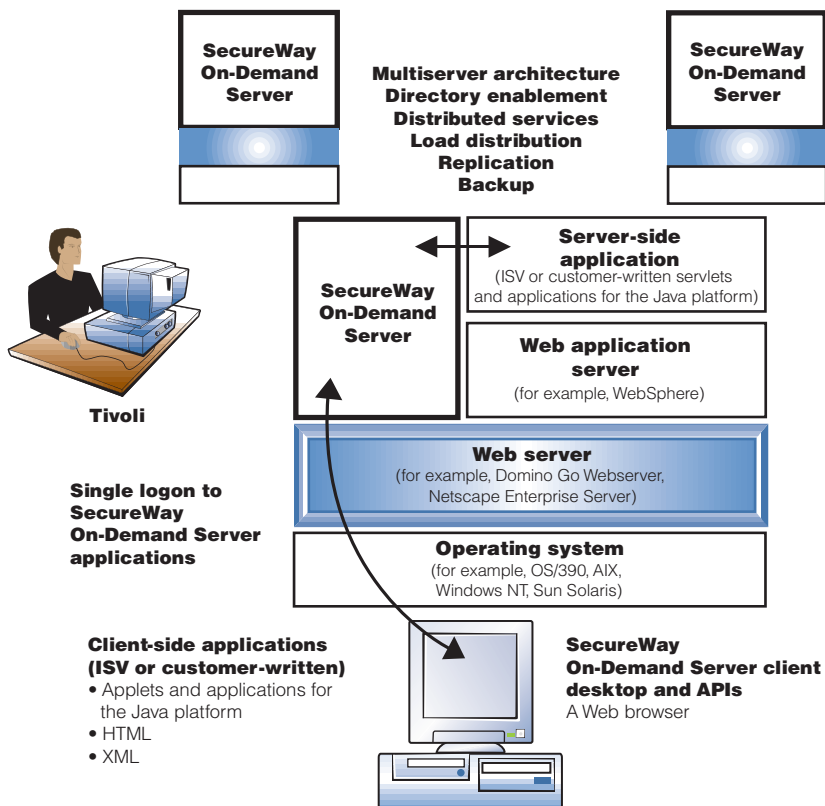
Includes an intuitive, Web-based interface for unified, enterprise-wide administration of multiple servers and client devices

Promotes quick rollouts of Web-based solutions while reducing development cost and cycle time

Employs industry-standard directory technologies

Extends Tivoli application management to the Web environment

Imagine how productive users might be if they could work from any device—local or remote—and always have secure access to the same, personalized desktop and applications. Think what the business world would be like if companies could choose the best Web applications for their businesses—rather than the best ones for their specific

SecureWay On-Demand Server

Multiserver architecture Directory enablement Distributed services Load distribution Replication Backup

SecureWay On-Demand Server

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Server-side application
(ISV or customer-written servlets and applications for the Java platform)

Web application server
(for example, WebSphere)

Web server
(for example, Domino Go Webserver, Netscape Enterprise Server)

Operating system
(for example, OS/390, AIX, Windows NT, Sun Solaris)

Tivoli

Single logon to SecureWay On-Demand Server applications

Client-side applications (ISV or customer-written)
• Applets and applications for the Java platform
• HTML
• XML

SecureWay On-Demand Server client desktop and APIs
A Web browser

SecureWay On-Demand Server promotes quick adoption of Web-based solutions.

e™
e-business

operating system. Imagine if IT administrators had to administer only a single user ID to provide universal access for each user—instead of different IDs for different systems. What if application developers could focus on business logic instead of coding for different infrastructures?

If you thought these goals were unrealistic, think again. Consider the possibilities for business growth offered by a new class of software—IBM® SecureWay® On-Demand Server Version 2.0.

Delivering unique, two-staged personalization

SecureWay On-Demand Server is an intelligent, policy-based "profile server" that enables robust, on-demand administration and delivery of personalized Web solutions to any client in an enterprise-class Web network. Delivery of applications is based on predefined access rights, multilayered individual or group preferences, and device capabilities.

Once a business environment is enabled for SecureWay On-Demand Server, administrators can define and control resources from a single, convenient Web browser interface. Authorized users can access Web applications from any device in the network using a single logon. User preferences are maintained by SecureWay On-Demand Server within an

industry-standard directory and are available to users at any device or location. When users launch their personalized desktop with a standard browser, they can immediately access all the Web applications for which they are authorized.

Through unique, two-staged personalization, parameters can be set based on organizational policies as well as on individual or group preferences. At the first stage, administrators can set default preferences or application access rights. At the second stage, users—operating within the boundaries set by their administrators—can customize the look-and-feel of their applications. For example, an administrator could specify that a user needs to access a particular host system on a regular basis by an emulation application such as IBM SecureWay Host On-Demand. Then, individual users could define characteristics of the application's interface, such as colors and type styles.

Enterprise-level characteristics for Web users

To extend on-demand computing to networks of all sizes, SecureWay On-Demand Server offers several key enterprise-level advantages. These characteristics include:

- A multiserver environment option, which allows SecureWay On-Demand Server components to be distributed across multiple servers. The multiserver environment improves scalability and recovery potential for your enterprise.

- Industry-standard methods for authentication and authorization services to control access to software and services.

- Industry-standard encryption methods to protect user, group and profile data.

- Tivoli® resource management, which extends Tivoli's ability to manage resources down to SecureWay On-Demand Server-enabled applications.

- Security features to provide user authentication based on user definitions stored in a Lightweight Directory Access Protocol (LDAP) directory or integrated with native platform security services (such as IBM RACF®, NIS or a Microsoft® Windows NT® domain).

- Fault tolerance and load balancing to ensure that your SecureWay On-Demand Server components stay up and running most efficiently.

Designed to be open and flexible

SecureWay On-Demand Server was developed with a commitment to industry standards to provide an open, interoperable solution. Supported industry standards include:

- Java™ Development Kit (JDK) 1.1.x Java APIs
- Java Directory and Naming Interface (JDNI)
- Hypertext Transfer Protocol (HTTP)
- Secure HTTP
- Java Remote Method Invocation (RMI)
- LDAP Version 2

SecureWay On-Demand Server supports applets, servlets and applications written for the Java platform, as well as simple HTML and XML. It also supports several different Web programming models, including:

- Server-side programming models, where business logic is focused on the server, with client interactions coming primarily through HTML and XML

- Client-side programming models, where application logic is split between the client and the server

SecureWay On-Demand Server is also Year 2000-ready[1]—one less thing to worry about as you move into the 21st century.

A robust architecture

The robust architecture of SecureWay On-Demand Server allows enabled client applications to fully exploit its services. The architecture centers around the following four key components:

Server component
The server component—the heart of the architecture—controls the other components' activities. It interacts with application or Web servers as well as with the Tivoli Enterprise Management System. SecureWay On-Demand Server services can be distributed across multiple servers to improve scalability and availability.

The server component operates as a series of servlets written for the Java platform that run on Web servers such as IBM WebSphere™ Application Server, Apache, Domino Go Webserver™, and Microsoft and Netscape Web servers. Supported platforms include Windows NT, IBM AIX®, IBM OS/390® and Sun Solaris. In the future, supported platforms[2] will include Linux® and OS/400®.

Administrative console component
The administrative console provides a simple interface to define and control SecureWay On-Demand Server users, groups and applications. Using a Java-compliant Web browser interface, administrators can define and customize new and existing Web applications. Profile management is used to add, define, update and remove software. User IDs, passwords and access privileges can also be assigned with profile management. This information can be populated automatically through an import file, or as part of the Tivoli Application Management System (AMS) software distribution process.

User component
Users can access their customized sets of applications and data by logging-on through a Web browser. Sign-on can be visible or invisible, depending on how the client is configured. When authorized users logon, they automatically access software configuration changes and

updates. Each user can be assigned a user ID and password. At sign-on, the encrypted user ID and password information is sent to SecureWay On-Demand Server, where the user's ID is authenticated. Once authenticated, the user is presented with a customized desktop that was created by employing SecureWay On-Demand Server preferences.

Directory component
The directory component is a repository for SecureWay On-Demand Server information such as device configuration, user and group profiles, and desktop and application preferences. The directory component uses LDAP technology to centralize SecureWay On-Demand Server data. By using a network directory, any SecureWay On-Demand Server has access to this data, so remote users can access their personalized desktops and applications.

Developer's toolkit

SecureWay On-Demand Server includes a rich set of documented application programming interfaces (APIs) that promote quick, easy deployment of Web-based solutions. These APIs allow developers to integrate SecureWay On-Demand Server services into applets, applications or servlets written for the Java platform.

Authentication and authorization
This API enables authentication of clients and determines the type of personalized experiences users have. When the client requests SecureWay On-Demand Server services, authorization rights are determined. Then, access to certain SecureWay On-Demand Server-controlled resources, such as software, is permitted.

Logging and tracing
This API includes a Java class that logs events and traces information to the SecureWay On-Demand Server event log. Administrators can access the event log with options of filtering the trace data and forwarding it to Tivoli system management software. In environments where Tivoli is used, a Tivoli Enterprise Console™ can monitor SecureWay On-Demand Server events so corrective actions can occur immediately.

License use management
The licensing Java-class API permits administrators to track the use of Web applications. Multiple licensing models are supported. This API can help manage actual license usage, or can be a simple awareness mechanism to determine which client applications are actually being used.

Preferences
The SecureWay On-Demand Server preference API is an extension to the standard Java properties class. It allows user preferences to be defined, saved and retrieved in the SecureWay On-Demand Server network registry, which is backed by an LDAP directory. When a user launches an application, preferences are delivered to the user as defaults for that application.

Systems management integration through Tivoli

Tivoli resource management is available through the Tivoli Plus™ Module (included with SecureWay On-Demand Server). SecureWay On-Demand Server Plus for Tivoli provides AMS 2.0-compliant tools. AMS, a widely accepted industry standard for reporting information to network management products, offers:

- Distributed monitoring, which provides the Tivoli Enterprise Console with complete access to SecureWay On-Demand Server operational information. This allows full automation of SecureWay On-Demand Server monitoring and recovery functions.

- Software distribution, which allows deployment of SecureWay On-Demand Server and enabled software across the enterprise.

- Event management, which filters, reformats and sends logging and tracing records to the Tivoli Enterprise Console. This allows SecureWay On-Demand Server applications to take advantage of automated alarms and corrective actions.

Service offerings
IBM offers a full set of service offerings if you need assistance with deployment or application development for SecureWay On-Demand Server. For more information, visit:
www.ibm.com/software/network/services

For more information
For more information about SecureWay On-Demand Server and other SecureWay Software, visit:
www.ibm.com/software/network/on-demand

SecureWay On-Demand Server for Windows NT requirements

- Processor: Pentium® Pro, 180MHz (minimum)
- Disk space for installation: 100MB for NTFS format, 200MB for FAT format
- Memory: 96MB
- Operating system: Microsoft Windows NT Server 4.0 with Service Pack 3 or higher, or Windows NT Workstation 4.0 with Service Pack 3
- One of the following Web servers:
    - IBM HTTP Server (provided with WebSphere Application Server Version 2.02, and packaged with SecureWay On-Demand Server)
    - Domino Go Webserver 4.6.2.5 or higher, with no installed support for servlets written for the Java platform
    - Apache Server Version 1.3.2
    - Microsoft Internet Information Server 3 or 4
    - Netscape Enterprise Server 3.5.1
    - Netscape Fastrack Server 3.0.1

SecureWay On-Demand Server for AIX requirements

- Disk space for installation: 100MB
- Memory: 144MB
- Operating system: AIX, Version 4.3.2 with JRE 1.1.6
- One of the following Web servers:
    - IBM HTTP Server (provided with WebSphere Application Server Version 2.02, and packaged with SecureWay On-Demand Server)
    - Domino Go Webserver 4.6.2.5 or higher, with no installed support for servlets written for the Java platform
    - Apache Server Version 1.3.2
    - Netscape Enterprise Server 3.5.1
    - Netscape Fastrack Server 3.0.1

SecureWay On-Demand Server for Sun Solaris requirements

- Processor: 180MHz
- Disk space for installation: 100MB in HPFS format
- Memory: 296MB
- Operating system: Sun Solaris Version 2.6.1 or higher, with JDK 1.1.6 or higher
- One of the following Web servers:
    - IBM HTTP Server (provided with WebSphere Application Server Version 2.02, and packaged with SecureWay On-Demand Server)
    - Domino Go Webserver 4.6.2.5 or higher, with no installed support for servlets written for the Java platform
    - Apache Server Version 1.3.2
    - Netscape Enterprise Server 3.5.1
    - Netscape Fastrack Server 3.0.1

SecureWay On-Demand Server for OS/390 requirements

- Operates in a virtual storage environment in any IBM system configuration supporting OS/390 Version 2 Release 5 or higher, with TCP/IP UNIX® System Services
- JDK 1.1.6
- One of the following Web servers:
    - IBM HTTP WebServer 5.1 (for OS/390 Version 2 Release 7)
    - IBM WebSphere Application Server (for OS/390 Version 1.1)
    - Domino Go Webserver 5.0 (for OS/390, Version 2 Release 5 and Version 2 Release 6)
    - LDAP Server (part of the OS/390 Security Server)
- IBM DB2® Universal Database™ for OS/390 Version 5

Client requirements

- Processor: Pentium, 100MHz
- Disk space: 5MB
- Memory: 48MB for users, 96MB for administrators
- Screen resolution: 800 x 600 pixels and greater than 256 colors
- Operating systems: Microsoft Windows NT Server 4.0; Microsoft Windows NT Workstation 4.0; Microsoft Windows® 95; Microsoft Windows 98
- One of the following Web browsers:
    - Netscape Navigator (for Windows) 4.51 or higher
    - Microsoft Internet Explorer (IE) 5.0 and Microsoft IE native JRE

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