

**WinterGreen Research, INC.**

**Application Server Market Shares, Strategies, and Forecasts,  
Worldwide, 2014 to 2020**

**Mountains of Opportunity**



Picture by Susan Eustis

**WinterGreen Research, Inc.**

**Lexington, Massachusetts**

[www.wintergreenresearch.com](http://www.wintergreenresearch.com)

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**CHECK OUT THESE KEY TOPICS**

**Mission Critical Application Server Web Based Applications:  
Cloud Improvement and Globally Integrated Enterprise Functions**

<ul style="list-style-type: none"><li>Application Server</li><li>Web Services</li><li>E-Commerce</li><li>Cloud Technology</li><li>Application Server Blogging</li><li>Web 2.0</li><li>Wiki-Style Collaboration</li><li>Social Networking</li><li>Business Process Management</li><li>Virtualized Systems</li></ul>	<ul style="list-style-type: none"><li>Open Source Application Server</li><li>WinterGreen Research</li><li>Web Assets</li><li>JBOSS</li><li>SOA Reusable Software Components</li><li>Virtualization</li><li>Server Hosting Centers</li><li>Web Properties</li><li>Web Application Gallery</li></ul>	<ul style="list-style-type: none"><li>Web PI</li><li>Collaboration</li><li>Mashups</li><li>Salesforce.com</li><li>Web services</li><li>Web Analytics / Frameworks</li><li>Java</li><li>Linux</li><li><a href="http://wintergreenresearch.com/reports/application%20server.html">http://wintergreenresearch.com/reports/application%20server.html</a></li></ul>
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**Application Server Growth Strategy: Internet Based Real Time Applications Software**

**Application Server: Market Shares, Strategies, and Forecasts, Worldwide, 2014-2020**

**Next Generation Mission Critical Application Servers: Cloud, Apps, Tablets, and Mobile Devices**

LEXINGTON, Massachusetts (June 20, 2014) – WinterGreen Research announces that it has published a new study **Application Servers: Market Shares, Strategy, and Forecasts, Worldwide, 2014 to 2020: Next Generation Mission Critical Application Servers for the Cloud, Apps, Tablets, and Mobile Devices**. The 2014 study has 577 pages, 267 tables and figures. Worldwide Application Server markets are poised to achieve significant growth as Internet of things and the mobile Internet further evolve, driving the market for apps into the trillions in the next few years.

WinterGreen Research predicts that the application server market will be \$23 billion by 2020, new markets evolved because of the value that apps provide to smart phones, mobile devices, tablets, and the Internet of things. These apps will drive the application server market to \$30 billion by create the need for tools to use in writing the apps.

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According to Susan Eustis, lead author of the study, "Application servers are being used to create apps that run on mobile devices and that tie together the Internet of things. Infrastructure for the Internet and for smart mobile devices creates demand for more sophisticated web development and web applications. Everything is going mobile. This evolution is driven by mobile smart phones and tablets that provide universal connectivity. Application servers represent a significant aspect of Internet market evolution."

IBM is moving toward domination of the application server market, going from 55% share in 2011 to 60% share in 2012, buttressed in part by its dominance in supporting development of mobile apps. This achievement of 60% share of the application server market provides IBM with a defacto standard status in the market.

Mission critical application servers are needed in the enterprise to support scalability, reliability, and security. More light weight open source application servers have a place in the market for web presence software, but for a solution that involves transactions intensively and has the downside of losing significant revenue if the site is down the mission critical servers are needed.

IBM WebSphere application server is a proven, high-performance transaction engine that can help build, run, integrate, and manage dynamic web applications. The IBM WebSphere application server Liberty profile option and development tool options extend the mission critical aspects of the system. Intelligent management capabilities minimize end-user outages and maximize operations monitoring and control of the production environment.

IBM WebSphere application server features robust capabilities.

Key features relate to configuration. IBM ability to support development of mobile apps is unparalleled in the industry. The app server is able to provide the flexibility needed to create tags and URLs that support search engines.

Search engine optimization is a key strength of the IBM WebSphere application server. Companies with a web presence need to be seen across all devices that a user may have in use on any given day. WebSphere permits users to choose the application server configuration that best fits a current business strategy.

IBM WebSphere application server is far and away the best product on the market for growing solutions as needs evolve. As market conditions change, applications need to be changed and adjusted rapidly. The modular construction and the solid front end and back end integration of the IBM WebSphere application server give IBM significant advantage in the market.

The J2EE application server software market is defined by the ability to build mission critical web sites that support a globally integrated enterprise. Strong growth is anticipated as tablets, smart phones, and mobile devices replace PCs. Mobile devices proliferate with 6.9 billion smart phones anticipated to be installed in 2019.

There are now 6.9 billion cell phone registered, paying users. Portable, mobile systems will expand the Internet at a pace not yet achieved. It is anticipated that the apps market will expand from \$24 billion in 2013 to \$35 trillion by 2019. This expansion of mobile computing at the device level is nothing compared to what is happening at the

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machine to machine (m to m) communications, with sensors being located everywhere, and monitoring of those sensors proliferating.

Application servers are poised to deal with the complexity that is being instantiated at every level of the environment that humans touch. Communication, analytics, collaboration are all part of what will make application servers relevant. The Internet of Everything (IoE) is expected to enable global private-sector businesses to generate at least \$613 billion in global profits in 2013. Quadrillions of interconnected sensors will drive market innovation. Apps will proliferate based on the ability to quickly, accurately put together an app in one half hour or less and launch it. This is a fundamental aspect of application servers.

Application server mobile extensions are integrated in the Web apps development environments of vendors. Application server development can create Web applications using business server pages. They can use the mobile extensions of the Web application server, which makes the special requirements and characteristics of mobile devices available.

Application servers leverage evolving software delivery models, new development methodologies, emerging mobile application development, and open source software. Mobile application development projects targeting smartphones and tablets are an essential aspect of any departmental application initiative. Native PC projects are anticipated to give way to smartphone and tablet apps for the enterprise. Every enterprise has to have apps that give customers, distributors, partners, and suppliers access to information.

Mobile changes how consumers behave. Users leverage mobility to communicate. They use it to improve their daily lives. Mobile is growing through existing data services and new services. Users demand connectivity anywhere and anytime. Enterprises are beginning to exploit the opportunities provided by mobility. Mobile communications permit the enterprise improve efficiency by enabling remote services and sales people to work efficiently, by enabling better access to enterprise records from remote sites, by streamlining processes, and by supporting new business models.

Worldwide application server market revenues are forecast to grow 17.5% year-over-year from \$7.4 billion in 2013 to \$23.1 billion by 2020. This is in the context of a world communications infrastructure that is changing. Technology is enabling interaction, innovation, and sharing of knowledge in new ways and application servers promise to bring significant capability to enterprises seeking mission critical solutions to making the Internet available for productive, efficient use.

WinterGreen Research is an independent research organization funded by the sale of market research studies all over the world and by the implementation of ROI models that are used to calculate the total cost of ownership of equipment, services, and software. The company has 35 distributors worldwide, including Global Information Info Shop, Market Research.com, Research and Markets, Bloomberg, electronics.ca, and Thompson Financial. WinterGreen Research is positioned to help customers facing challenges that define the modern enterprises. The increasingly global nature of science, technology and engineering is a reflection of the implementation of the globally integrated enterprise. Customers trust wintergreen research to work alongside them to ensure the success of the participation in a particular market segment.

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WinterGreen Research supports various market segment programs; provides trusted technical services to the marketing departments. It carries out accurate market share and forecast analysis services for a range of commercial and government customers globally. These are all vital market research support solutions requiring trust and integrity.

## Companies Profiled

### Market Leaders

**IBM**  
**RedHat**  
**Microsoft**  
**SAP**  
**Adobe Systems**

**Oracle**  
**Attachmate / Novell**  
**NEC**  
**Software AG**  
**Fujitsu**

### Market Participants

**Hewlett Packard**  
**Aurea**  
**BizAgi**  
**BizFlow**  
**BonitaSoft**  
**Open Source BPM Software**  
**Vendor**  
**CA Technologies**

**Progress Software**  
**RedHat**  
**SAP**  
**Software AG**  
**Tibco**  
**Compuware**  
**Workday**  
**Apache**

**Cisco**  
**HostBridge Technology**  
**Rocket Software**  
**EMC / VMware**  
**EMC**  
**Fiorano**

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**Application Server: Market Shares, Strategies, and Forecasts,  
Worldwide, 2014 to 2020**

**Report Methodology**

This is the 602nd report in a series of primary market research reports that provide forecasts in communications, telecommunications, the Internet, computer, software, telephone equipment, health equipment, and energy. Automated process and significant growth potential are priorities in topic selection. The project leaders take direct responsibility for writing and preparing each report. They have significant experience preparing industry studies. Forecasts are based on primary research and proprietary data bases.

The primary research is conducted by talking to customers, distributors and companies. The survey data is not enough to make accurate assessment of market size, so WinterGreen Research looks at the value of shipments and the average price to achieve market assessments. Our track record in achieving accuracy is unsurpassed in the industry. We are known for being able to develop accurate market shares and projections. This is our specialty.

The analyst process is concentrated on getting good market numbers. This process involves looking at the markets from several different perspectives, including vendor shipments. The interview process is an essential aspect as well. We do have a lot of granular analysis of the different shipments by vendor in the study and addenda prepared after the study was published if that is appropriate.

Forecasts reflect analysis of the market trends in the segment and related segments. Unit and dollar shipments are analyzed through consideration of dollar volume of each market participant in the segment. Installed base analysis and unit analysis is based on interviews and an information search. Market share analysis includes conversations with key customers of products, industry segment leaders, marketing directors, distributors, leading market participants, opinion leaders, and companies seeking to develop measurable market share.

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## WinterGreen Research, INC.

Over 200 in depth interviews are conducted for each report with a broad range of key participants and industry leaders in the market segment. We establish accurate market forecasts based on economic and market conditions as a base. Use input/output ratios, flow charts, and other economic methods to quantify data. Use in-house analysts who meet stringent quality standards.

Interviewing key industry participants, experts and end-users is a central part of the study. Our research includes access to large proprietary databases. Literature search includes analysis of trade publications, government reports, and corporate literature.

Findings and conclusions of this report are based on information gathered from industry sources, including manufacturers, distributors, partners, opinion leaders, and users. Interview data was combined with information gathered through an extensive review of internet and printed sources such as trade publications, trade associations, company literature, and online databases. The projections contained in this report are checked from top down and bottom up analysis to be sure there is congruence from that perspective.

The base year for analysis and projection is 2010. With 2010 and several years prior to that as a baseline, market projections were developed for 2011 through 2017. These projections are based on a combination of a consensus among the opinion leader contacts interviewed combined with understanding of the key market drivers and their impact from a historical and analytical perspective.

The analytical methodologies used to generate the market estimates are based on penetration analyses, similar market analyses, and delta calculations to supplement independent and dependent variable analysis. All analyses are displaying selected descriptions of products and services.

This research includes referencde to an ROI model that is part of a series that provides IT systems financial planners access to information that supports analysis of all the numbers that impact management of a product launch or large and complex data center. The methodology used in the models relates to having a sophisticated analytical technique for understanding the impact of workload on processor consumption and cost.

WinterGreen Research has looked at the metrics and independent research to develop assumptions that reflect the actual anticipated usage and cost of systems. Comparative analyses reflect the input of these values into models.

The variables and assumptions provided in the market research study and the ROI models are based on extensive experience in providing research to large enterprise organizations and data centers. The ROI models have lists of servers from different manufacturers, Systems z models from IBM, and labor costs by category around the world. This information has been developed from WinterGreen research proprietary data bases

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constructed as a result of preparing market research studies that address the software, energy, healthcare, telecommunications, and hardware businesses.

## YOU MUST HAVE THIS STUDY

### Application Server Market Shares, Strategy, and Forecasts, 2014 to 2020

## Table of Contents

### Application Server Executive Summary

The study is designed to give a comprehensive overview of the Application Server equipment market segment. Research represents a selection from the mountains of data available of the most relevant and cogent market materials, with selections made by the most senior analysts. Commentary on every aspect of the market from independent analysts creates an independent perspective in the evaluation of the market. In this manner the study presents a comprehensive overview of what is going on in this market, assisting managers with designing market strategies likely to succeed.

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## Application Server Product Description

**This section describes selected companies and selected products. Products for this market segment are described with attention to the most significant aspect of features and functions in this category of product. The juxtaposition of a range of different product descriptions from a single market category provides a**

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really good way to access market directions and achieve market competitive analysis. This section is useful because it compliments other views of innovation, providing a clear presentation of all the alternatives for positioning products in this market. Company products are described in the appropriate sections, meaning a company is mentioned several times in the chapter in different places.

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## Application Server Company Profiles

This section selectively describes company strategies, partners, acquisitions, and revenue by segment and regional revenue when available. Companies are described by looking at what is most interesting about that company. The descriptions collectively give a sense of market directions within the industry segment. The alphabetical listing of company thumbnail sketches provides an accessible way to find out what is going on in any particular company.

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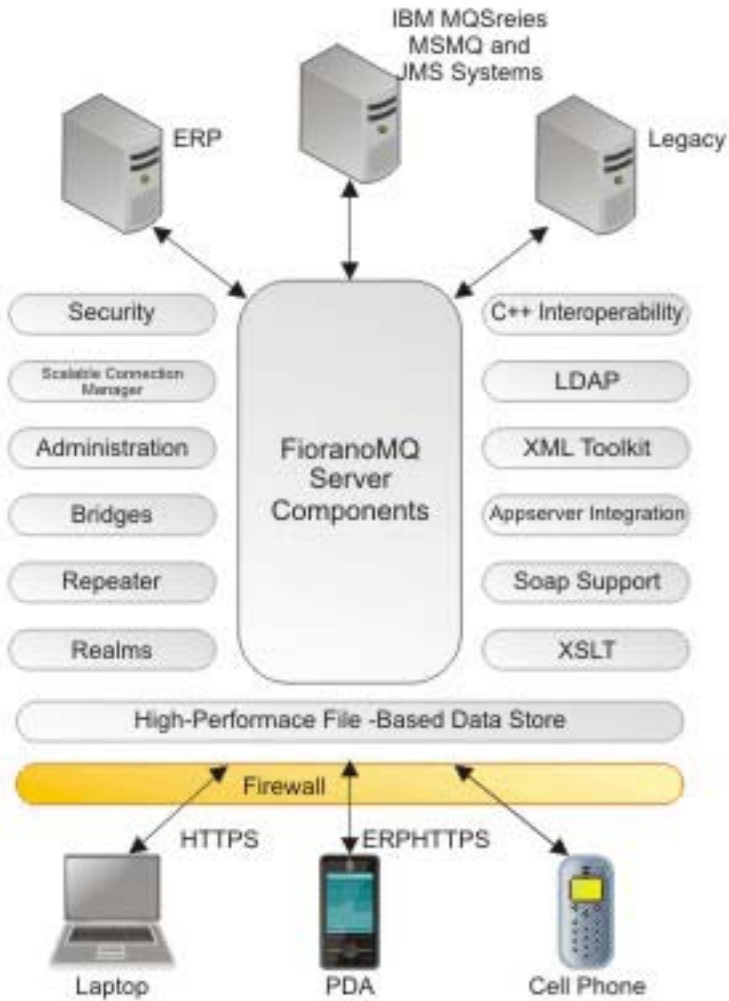


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## **ABOUT THE COMPANY**

**WinterGreen Research**, founded in 1985, provides strategic market assessments in telecommunications, communications equipment, health care, Software, Internet, Energy Generation, Energy Storage, Renewable energy, and advanced computer technology.

Industry reports focus on opportunities that expand existing markets or develop major new markets. The reports access new product and service positioning strategies, new and evolving technologies, and technological impact on products, services, and markets. Innovation that drives markets is explored. Market shares are provided. Leading market participants are profiled, and their marketing strategies, acquisitions, and strategic alliances are discussed. The principals of WinterGreen Research have been involved in analysis and forecasting of international business opportunities in telecommunications and advanced computer technology markets for over 30 years.

The studies provide primary analytical insight about the market participants. By publishing material relevant to the positioning of each company, readers can look at the basis for analysis. By providing descriptions of each major participant in the market, the reader is not dependent on analyst assumptions, the information backing the assumptions is provided, permitting readers to examine the basis for the conclusions.

WinterGreen Research is positioned to help customers facing challenges that define the modern enterprises. The increasingly global nature of science, technology and engineering is a reflection of the implementation of the globally integrated enterprise. Customers trust wintergreen research to work alongside them to ensure the success of the participation in a particular market segment.

WinterGreen Research supports various market segment programs; provides trusted technical services to the marketing departments. It carries out accurate market share and forecast analysis services for a range of commercial and government customers globally. These are all vital market research support solutions requiring trust and integrity.

### **ABOUT THE PRINCIPAL AUTHORS**

**Ellen T. Curtiss**, Technical Director, co-founder of WinterGreen Research, conducts strategic and market assessments in technology-based industries. Previously she was a member of the staff of Arthur D. Little, Inc., for 23 years, most recently as Vice President of Arthur D. Little Decision Resources, specializing in strategic planning and market development services. She is a graduate of Boston University and the Program for Management Development at Harvard Graduate School of Business Administration. She is the author of recent studies on worldwide telecommunications markets, the top ten internet equipment companies, the top ten contract manufacturing companies, and the Top Ten Telecommunications market analysis and forecasts.

**Susan Eustis**, President, co-founder of WinterGreen Research, is a senior analyst. She has done research in communications, healthcare equipment, and computer markets and applications. She holds several patents in microcomputing and parallel processing. She has the original patents in electronic voting machines. She has new patent applications in format varying, multiprocessing, and electronic voting. She is the author of recent studies of the Internet, Cloud Computing marketing strategies, Internet equipment, biometrics, a study of Healthcare Equipment, Worldwide Telecommunications Equipment, Top Ten Telecommunications, Digital Loop Carrier, Web Hosting, Web Services, and Application Integration markets. Ms. Eustis is a graduate of Barnard College. Ms. Eustis was named Top Woman CEO in 2012 by Who's Who Worldwide. She was named Top Woman Market Research Analyst the same year.

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