ATLANTIC.NET LOAD BALANCING

Today's modern high-traffic websites are expected to serve millions of concurrent sessions and still provide fast, reliable web page delivery for digital content. A load balancer is a cost-effective, performance-enhancing solution to this problem. Atlantic.Net is proud to offer a comprehensive load balancing solution alongside Atlantic.Net Managed Firewall services.
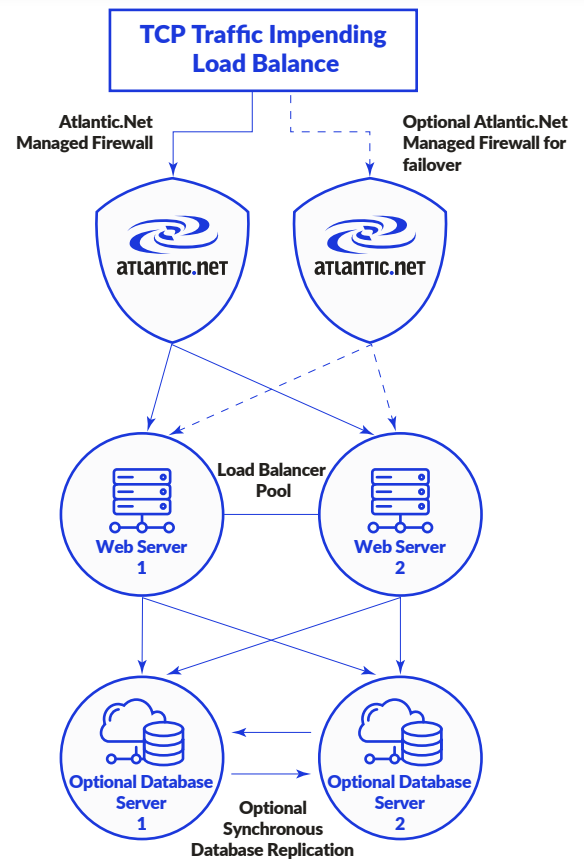
Load balancing is one of the most popular techniques used to distribute high traffic web servers, and it can significantly improve the customer experience as they view web page content. Our service gives clients the ability to add numerous diverse application and web servers into a load balancing pool, which in turn, helps deliver a significantly better digital experience to client customers and end users.

WHAT CAN LOAD BALANCING DO FOR ME?

Remove the complexity and the technology headache away by utilizing the Atlantic.Net Load Balancing service to enhance the performance and reliability of your business critical web sites:

- **Load Balancing** – distribute incoming application traffic load across multiple Atlantic.Net servers for an improved customer experience

- **Ensure High Availability** – increase web site reliability, redundancy, and failover capability by only sending requests to online Atlantic.Net servers, thus enabling contingency for any unexpected outages

- **Flexibility** – add an extra layer of flexibility to join or remove servers when needed by demand; This is perfect for clients who have seasonal peaks and busy promotional periods

- **Increase Scalability** – Atlantic.Net Load Balancing service gives you the ability to grow as your business grows. Whether you are starting small or growing significantly, our service can enhance your business

- **Reduced downtime** – when scheduling planned maintenance, live services can remain online whilst critical servers are updated

- **Increase performance** – provide better response times to web services

TCP Traffic Impending Load Balance

Atlantic.Net Managed Firewall — Optional Atlantic.Net Managed Firewall for failover

Load Balancer Pool

Web Server 1 — Web Server 2

Optional Database Server 1 — Optional Database Server 2

Optional Synchronous Database Replication

440 West Kennedy Blvd, Suite 3, Orlando, FL 32810, USA
www.atlantic.net

sales@atlantic.net
888-618-DATA (3282)
Int'l +1-321-206-3734

ATLANTIC.NET MANAGED & SUPPORTED — INVESTING IN AMERICAN JOBS — IN THE USA

ATLANTIC.NET LOAD BALANCING

LOAD BALANCING SERVICES

Atlantic.Net Firewall and Load Balancing service can introduce a wide range of key features designed to further improve functionality and help ensure all services remain online:

- **Round Robin** – this simple algorithm sends incoming traffic to the next available server in a load balancing cluster, this is done in a sequential sequence such as node 1, node 2, node 3

- **Static Round Robin** – this method allocates a weighting number to a server, or a priority to a particular server, therefore incoming traffic will get distributed to the preferred node(s) in the cluster, if available

- **Least connections** – the load balancer will monitor the number of open connections for each server, and sends the incoming request to the least busy server

- **IP source** – connections are distributed to the servers based on the source IP address. This is a great method for geolocation load balancing. If a web server fails and is taken out of service, the distribution changes. As long as all servers are running, a given client IP address will always go to the same web server

LOAD BALANCING FEATURES

Atlantic.Net Firewall and Load Balancing service provides a good combination of most popular techniques used in load balancing technology:

- **Sticky Sessions** – this feature is an efficiency measure that enables users connected to the web server to interact with the same web server at all times. This prevents the same content from being open for the same client on multiple different web servers, therefore reducing overhead

- **Health checks** – this vital feature is when the load balancer reaches out to the servers in the load balancing pool to check availability and health. Any issues are flagged, and failing server nodes are bypassed until any outstanding issues are resolved

- **SSL termination** – this technique is when SSL encryption is decoded on the load balancer prior to the request reaching the web server. This is an effective method used to improve performance and lessen the workload requests to the back end nodes

- **Multi-port balancing** – this advanced technique allows users to channel all traffic configured for a specific application port to one or more servers. It offers application developers greater performance capability

- **Connection throttling** – this feature protects the load balancing pool when specific incoming requests are demanding significant resources. This could be caused by certain applications demanding excessive bandwidth which may impact the entire cluster

Atlantic.Net Load Balancing service is backed by Atlantic.net Firewall Service, which enables you to take advantage of our latest technology to provide security and many other features. For more information, please email us at **sales@atlantic.net**

Find Out More?

Atlantic.Net stands ready to help you attain fast compliance with a range of certifications, such as SOC 2 and SOC 3, HIPAA, and HITECH, all with 24x7x365 support, monitoring, and world-class data center infrastructure. For faster application deployment, free IT architecture design, and assessment, visit us at **www.atlantic.net**, call **888-618-DATA (3282)**, or email us at **sales@atlantic.net**.

440 West Kennedy Blvd, Suite 3, Orlando, FL 32810, USA
www.atlantic.net

sales@atlantic.net
888-618-DATA (3282)
Int'l +1-321-206-3734