

CLAIMS

1. A computer-implemented method of checking capabilities and availability of proxy servers comprising:

Connecting, by an Exit Node, to a Supernode;

Sending by the Supernode a benchmark request to the Exit Node;

Implementing by the Exit Node the benchmark request;

Sending by the Exit Node to the Supernode a response for the benchmark request;

Measuring by the Supernode an Exit Node response quality;

Storing by a Supernode Exit Node Metadata, together with the response quality measurements to the Exit Node Database;

wherein benchmark targets are changed dynamically according to results of analyzing a customer's request as monitored, registered, and aggregated by a Service Provider Infrastructure;

wherein the benchmark request target is a resource submitted to the Exit Node as an IP address or URL/URI;

wherein the measuring of the Exit Node response identifies whether the Exit Node can be indicated as suitable for proxying or not suitable for proxying.

2. The method of Claim 1, wherein the Exit Node indicated as suitable for proxying can be stored in exit node groups categorizing as random proxying, proxying of requests to specific geolocation, proxying of requests to specific target, or any combination thereof.

3. The method of Claim 1, wherein the response of the Exit Node is stored in the Supernode.

4. The method of Claim 1, wherein a number of the Exit Nodes connected to the Supernode at the same time is unlimited.

5. The method of Claim 1, wherein the benchmark request is applied to the Exit Node during the initial registration of the Exit Node with the Service Provider Infrastructure or is applied to an Exit node that has been previously registered and stored in the Exit-Node Database and is exhibiting performance inadequate corresponding to the thresholds configured at the Service Provider Infrastructure.

6. A system of checking availability of proxy servers comprising at least:
a Service Provider Infrastructure, comprised of:
a Front End Proxy Server,
an Exit Nodes Database,
a Supernode; and,
an Exit Node;

wherein the availability of the Exit Node is evaluated by initiating a benchmark test request to targets through the Exit Node tested, where targets are changed dynamically according to results of analyzing a customer's previous request as registered by the Service Provider Infrastructure.

7. The system of Claim 6, wherein the Exit Node is registered in the Exit Node Database as suitable for random proxying, proxying of requests to specific geolocation, proxying of requests to a specific target, any combination thereof, or not suitable for proxying.

8. The system of Claim 6, wherein the Exit Node Database stores a response of the Exit Node from a benchmark request as well as results of customer's previous request.

9. The system of Claim 6, wherein the Supernode applies benchmark requests to the Exit Node during the initial registration process or to an Exit node that has been previously registered and stored in the Exit-Node Database and is exhibiting performance inadequate corresponding to thresholds configured at the Service Provider Infrastructure.

10. A non-transitory computer readable medium for checking availability of proxy servers comprising instructions which, when executed by a computing device within a Service Provider Infrastructure, cause the corresponding computing device to:

- Accept, by a Supernode, a connection from an Exit Node;
- Send, by a Supernode, a benchmark request to the Exit Node;
- Accept, by a Supernode, from the Exit Node a response to the benchmark request;
- Measures, by the Supernode an Exit Node response quality;
- Store, by a Supernode, Exit Node Metadata, together with the response quality measurements to the Exit Node Database;
- Compare, by the Exit Node Database, the benchmark response quality measurements to the quality thresholds configured;
- Place, by the Exit Node Database, the Exit Node in a corresponding group based on the Exit Node metadata and a quality of the response provided by the Exit Node;

Provide, by the Front End Proxy Server to the User Device, the Exit Node registered in the Exit Node Database;

wherein benchmark targets are changed dynamically according to results of analyzing a customer's request as monitored, registered, and aggregated by a Service Provider Infrastructure;

wherein the benchmark request target is a resource submitted to the Exit Node as an IP address or URL/URI;

wherein the measuring of the Exit Node response identifies whether the Exit Node can be indicated as suitable for proxying or not suitable for proxying.

11. The non-transitory computer readable medium of Claim 10 wherein the benchmark request is performed against a specific selected target, geolocation, IP address, or HTTP link.

12. The non-transitory computer readable medium of Claim 10 wherein the Exit Node suitable for proxying is stored in the Exit Node Database and categorized as intended for random proxying, or proxying against a specific geolocation, proxying of requests to a specific target, any combination thereof, or not suitable for proxying.

13. The non-transitory computer readable medium of Claim 10 wherein the benchmark request is applied to the Exit Node during the initial registration with a Proxy Service Provider or is applied to an Exit Node, already stored in the proxy pool, that has response measurements marked as less than thresholds configured at the Service Provider Infrastructure.