

Rule Group Server

<https://campus.barracuda.com/doc/45026180/>

To Create a Rule Group Server

URL: /v1/virtual_services/{virtual_service_id}/content_rules/{rule_id}/rg_servers			
Method: POST			
Description: Adds a rule group server.			
Parameter Name	Data Type	Mandatory	Description
Input Parameters:			
name	Alphanumeric	Yes	A name to identify this server.
identifier	Enumeration	Yes	The way to be used by the Barracuda Web Application Firewall to identify the server. The enumerated values include: <ul style="list-style-type: none"> hostname ip_address
address_version	Enumeration	Yes	The internet protocol version to be used. The enumerated values include: <ul style="list-style-type: none"> ipv4 ipv6
ip_address	Alphanumeric	Conditional	The IP address of the server. This is required when identifier is set to <i>ip_address</i> .
hostname	Alphanumeric	Conditional	The hostname of the server. This is required when identifier is set to <i>hostname</i> .
port	Numeric	Yes	The port number of the server.
status	Enumeration	Optional	The status for the server to handle the requests. The enumerated values include: <ul style="list-style-type: none"> out_of_service_sticky in_service out_of_service_all out_of_service_maintenance
backup_server	String	Optional	Determines whether to designate this server as a last resort server to be used when all other servers configured under the Service fail. The values include: <ul style="list-style-type: none"> yes no <p>Note: If backup_server is set to <i>yes</i>, the weight value automatically resets to zero (0) and modifying this value will not take effect on the server.</p>

weight	Numeric	Optional	The weight for the server. This is applicable only when the Load Balancing Algorithm is set to <i>weighted_round_robin</i> .
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Example:

Request:

```
curl
http://192.168.0.1:8000/restapi/v1/virtual_services/demo_service/content_rules/rule1/rg_servers
-u
'eyJldCI6IjEzODAwNzg5MzEiLCJwYXNzd29yZCI6IjA3YTZhMTQyNjQ1NmI0NjllZjczOWM4NjY5\nNDR
hZml2IiwidXNlciI6ImFkbWluIn0=\n:' -X POST -H Content-Type:application/json -d
'{"name":"demo_rg_server","ip_address":"10.11.3.213","port":"80"}';
```

Response:

```
{"id":"demo_rg_server","token":"eyJldCI6IjEzODAwNzk0NTEiLCJwYXNzd29yZCI6IjQ5YWl3Yzc0NG
JkYWM3ZjA5NzU1MzZmMTUw\nMWQwYTBlwidiXNlciI6ImFkbWluIn0=\n"}
```

To Retrieve Rule Group Servers

URL: /v1/virtual_services/{virtual_service_id}/content_rules/{rule_id}/rg_servers /v1/virtual_services/{virtual_service_id}/content_rules/{rule_id}/rg_servers/{rg_server_id}			
Method: GET			
Description: Lists all rule group servers if "rg_server_id" is not specified.			
Parameter Name	Data Type	Mandatory	Description
Input Parameters:			
parameters	Alphanumeric	Optional	Any specific parameter name that needs to be retrieved. For information on passing the parameters in the request, refer to the <i>Example 2</i> in To Retrieve Servers .

Example:

Request:

```
curl
http://192.168.0.1:8000/restapi/v1/virtual_services/demo_service/content_rules/rule1/rg_servers
/demo_rg_server -u
'eyJldCI6IjEzODAwNzg5MzEiLCJwYXNzd29yZCI6IjA3YTZhMTQyNjQ1NmI0NjllZjczOWM4NjY5\nNDR
```

hZml2liwidXNlci6lmFkbWluIn0=\n:' -X GET

Response:

```
{
  "in_band_health_checks": {
    "max_http_errors": "0",
    "max_refused": "10",
    "max_timeout_failure": "10",
    "max_other_failure": "10"
  },
  "out_of_band_health_checks": {
    "enable_OOB_health_checks": "1",
    "interval": "10"
  },
  "status": "in-service",
  "application_layer_health_check": {
    "additional_headers": [],
    "status_code": "200",
    "url": null,
    "method": "GET",
    "match_content_string": null,
    "max_request": "1000",
    "comments": null,
    "max_establishing_connections": "100",
    "backup_server": "0",
    "timeout": "300000",
    "max_connections": "10000",
    "weight": "1",
    "ip_address": "10.11.3.213",
    "id": "demo_rg_server",
    "token": "eyJldCI6IjEzODAwNzk2MzgiLCJwYXNzd29yZCI6ImI1OTQxZDg2ZWlON2U4NDAwNjZmNzA3MzQw\nOTEzZGY0IiwidXNlci6lmFkbWluIn0=\n",
    "ssl": {
      "enable_https": "0",
      "client_certificate": null,
      "enable_ssl_3": "1",
      "validate_certificate": "0",
      "enable_tls_1": "1",
      "version": "ipv4",
      "name": "demo_rg_server",
      "port": "80",
      "connection_pooling": {
        "enable_connection_pooling": "1",
        "keepalive_timeout": "900000"
      },
      "max_keepalive_requests": "0",
      "max_spare_connections": "0"
    }
  }
}
```

To Update a Rule Group Server

In this REST API call, the parameters can be passed in a Simple JSON request or a Nested JSON request based on the parameters that needs to be modified. For information on JSON requests, see **Request Syntax**.

URL: /v1/virtual_services/{virtual_service_id}/content_rules/{rule_id}/rg_servers/{rg_server_id}			
Method: PUT			
Description: Updates the values of given parameters in the given rule group server.			
Parameter Name	Data Type	Mandatory	Description
Input Parameters:			
name	Alphanumeric	Optional	The name of the rule group server.
identifier	Enumeration	Optional	The way to be used by the Barracuda Web Application Firewall to identify the server. The enumerated values include: <ul style="list-style-type: none"> hostname ip_address
address_version	Enumeration	Optional	The internet protocol version to be used. The enumerated values include: <ul style="list-style-type: none"> ipv4 ipv6

ip_address	Alphanumeric	Optional	The IP address of the server. This is required when identifier is set to <i>ip_address</i> .
hostname	Alphanumeric	Optional	The hostname of the server. This is required when identifier is set to <i>hostname</i> .
port	Numeric	Optional	The port number of the server.
status	Enumeration	Optional	The status for the server to handle the requests. The enumerated values include: <ul style="list-style-type: none"> • out_of_service_sticky • in_service • out_of_service_all • out_of_service_maintenance
backup_server	String	Optional	Determines whether to designate this server as a last resort server to be used when all other servers configured under the Service fail. The values include: <ul style="list-style-type: none"> • yes • no <p>Note: If backup_server is set to yes, the weight value automatically resets to zero (0) and modifying this value will not take effect on the server.</p>
weight	Numeric	Optional	The weight for the server. This is applicable only when the Load Balancing Algorithm is set to <i>weighted_round_robin</i> .
ssl.enable_https	Enumeration	Optional	The SSL status for backend connections. The values include: <ul style="list-style-type: none"> • yes • no
ssl.enable_ssl_3	String	Optional	SSL 3.0 protocol to be used by the clients to establish the connection to the server. The values include: <ul style="list-style-type: none"> • yes • no

ssl.enable_tls_1	String	Optional	TLS 1.0 protocol to be used by the clients to establish the connection to the server. The values include: <ul style="list-style-type: none"> • yes • no
ssl.enable_tls_1_1	String	Optional	TLS 1.1 protocol to be used by the clients to establish the connection to the server. The values include: <ul style="list-style-type: none"> • yes • no
ssl.enable_tls_1_2	String	Optional	TLS 1.2 protocol to be used by the clients to establish the connection to the server. The values include: <ul style="list-style-type: none"> • yes • no
ssl.enable_sni	Enumeration	Optional	When set to Yes , the Barracuda Web Application Firewall allows a client to request a certificate for a specific domain from a web server. It can be used if multiple virtual HTTP domains with different certificates are hosted on one server. The values include: <ul style="list-style-type: none"> • yes • no
ssl.client_certificate	String	Optional	The certificate to be used when the server requires client authentication.
ssl.validate_certificate	String	Optional	Determines whether to validate the server certificate. The values include: <ul style="list-style-type: none"> • yes • no
ssl.enable_ssl_compatibility_mode	String	Optional	Determines whether to enforce compatibility with legacy servers or not. The values include: <ul style="list-style-type: none"> • yes • no
in_band_health_checks.max_http_errors	Numeric	Optional	The maximum number of HTTP error responses to be allowed per 1024 requests before marking the server as out of service.

in_band_health_checks.max_refused	Numeric	Optional	The maximum number of connection refused errors to be allowed per 1024 connections before marking the server as out-of-service (default is 10).
in_band_health_checks.max_other_failure	Numeric	Optional	The maximum number of connection time-out errors to be allowed per 1024 connections before marking the server as out-of-service (default is 10).
in_band_health_checks.max_timeout_failure	Numeric	Optional	The maximum number of other errors to be allowed per 1024 connections before marking the server as out-of-service (default is 10).
out_of_band_health_checks.enable_OOB_health_checks	String	Optional	The status of Out-of-Band monitoring. The values include: <ul style="list-style-type: none"> • yes • no
out_of_band_health_checks.interval	Numeric	Optional	The interval time (in seconds) between the probes sent by the Barracuda Web Application Firewall to the server to determine the health status.
application_layer_health_check.additional_headers	Alphanumeric	Optional	Any additional headers to be sent with the OOB HTTP request.
application_layer_health_check.status_code	Numeric	Optional	The expected HTTP response status code.
application_layer_health_check.url	URL	Optional	The URL to be used in the HTTP request to determine the server health.
application_layer_health_check.method	Enumeration	Optional	The method to be used for the HTTP request. The enumerated values include: <ul style="list-style-type: none"> • POST • GET • HEAD

application_layer_health_check.match_content_string	String	Optional	The string that needs to be matched in the response. If specified, the response must contain the string. If the response does not contain the string, the probe is deemed unsuccessful, and the server will be marked out-of-service.
connection_pooling.enable_connection_pooling	String	Optional	The connection pooling status. The values include: <ul style="list-style-type: none"> • yes • no
connection_pooling.keepalive_timeout	Numeric	Optional	The time in milliseconds to timeout a connection which was used at least once. This is the maximum amount of time a connection is kept alive. This value is applicable per 1024 connections, where a timeout error had occurred before turning off the server.
advanced_configuration.max_connections	Numeric	Optional	The maximum number of connections established to the server at any time.
advanced_configuration.max_requests	Numeric	Optional	The maximum number of requests that can be queued.
advanced_configuration.max_keepalive_requests	Numeric	Optional	The maximum number of requests retained on a persistent connection before the connection is shut down (if the server does not close the connection first).
advanced_configuration.max_establishing_connections	Numeric	Optional	The maximum number of simultaneous connections that can be established to the server.
advanced_configuration.max_spare_connections	Numeric	Optional	The maximum number of pre-allocated connections.
advanced_configuration.timeout	Numeric	Optional	The time in milliseconds to timeout an unused connection.

advanced_configuration.client_impersonation	String	Optional	Specifies if the Barracuda Web Application Firewall uses the client IP address as the source IP address to communicate to the servers. The values include: <ul style="list-style-type: none"> • yes • no
advanced_configuration.source_ip_to_connect	Alphanumeric	Optional	The IP address to be used by the Barracuda Web Application Firewall to communicate with the Server. It can be WAN IP address, LAN IP address or a custom virtual interface IP address in the Vsite. If client_impersonation is set to Yes, then this IP is used only for Out of Band Health checks. Note: If the server is reachable through a static route configured in the Vsite, then the custom virtual interface defined in that Vsite should be specified in source_ip_to_connect .

Example 1:**Request:**

```
curl
http://192.168.0.1:8000/restapi/v1/virtual_services/demo_service/content_rules/rule1/rg_servers
/demo_rg_server -u
'eyJldCI6IjEzODAwNzg5MzEiLCJwYXNzd29yZCI6IjA3YTFhMTQyNjQ1NmI0NjllZjczOWM4NjY5\nNDR
hZml2liwidXNlci6ImFkbWluIn0=\n:' -X PUT -H Content-Type:application/json -d
'{"in_band_health_checks":{"max_http_errors":500},"connection_pooling":{"keepalive_timeout"
:700000},"status":"out-of-service-all"}'
```

Response:

```
{"id":"demo_rg_server","token":"eyJldCI6IjEzODAwNzk3NTU0LCJwYXNzd29yZCI6IjMyZmY3NTk2N
Tg0NGY2YzI5MDFIMGFhNGQ0\nNGY0NDc2liwidXNlci6ImFkbWluIn0=\n"}
```


Example 2:**Request:**

```
curl http://192.168.0.1:8000/restapi/v1/virtual_services/aert/servers/Server1 -
u 'eyJldCI6IjE0NTk0MDk0NTMiLCJwYXNzd29yZCI6IjU5MjkxNTY4ZWFIODI1ZDkyNTc3YmU1NDEz\n
YTYyMTEyIiwidXNlciI6ImFkbWluIn0=\n:' -X PUT -H Content-Type:application/json -d '{"ssl"
:{"enable_compatibility_mode":"yes"}}'
```

Response:

```
{"id":"Server1","token":"eyJldCI6IjE0NTk0MDk1MTIiLCJwYXNzd29yZCI6IjAwN2Q0ODEzNTk3NzRk
NGYwMWNmYzJmMDYw\nM2UyZWU1IiwidXNlciI6ImFkbWluIn0=\n"}
```

To Delete a Rule Group Server

URL: /v1/virtual_services/{virtual_service_id}/content_rules/{rule_id}/rg_servers/{rg_server_id}
Method: DELETE
Description: Deletes the given rule group server.

Request:

```
curl
http://192.168.0.1:8000/restapi/v1/virtual_services/demo_service/content_rules/rule1/rg_servers
/demo_rg_server -u
'eyJldCI6IjEzODAyMzczMDciLCJwYXNzd29yZCI6IjM1MGM0MDQxYzA1NTEwZTcwNmYwZDBmNmE
5\nNWMyN2U5IiwidXNlciI6ImFkbWluIn0=\n:' -X DELETE
```

Response:

```
{"msg":"Successfully
deleted","token":"eyJldCI6IjEzODAyNDY0OTkiLCJwYXNzd29yZCI6IjRjYzNhYjM0YTkwZjU4ZTFmZT
RjOWNjOWZi\nYTU3MDMwIiwidXNlciI6ImFkbWluIn0=\n"}
```

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