
airwaveapiclient Documentation

Release 0.1.10

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Contents:

Airwaveapiclient is a utility tool for Aruba Networks AirWave users. This module connects to AirWave and gets the information such as the access point list, detail, client, etc.

1.1 Supported features

Currently airwaveapiclient can:

- Get access point list (XML).
- Get access point detail (XML).
- Get client detail (XML).
- Get rogue detail (XML).
- Get latest report (XML).
- Make access point graph url.

2.1 Python

- Python2.7
- Python3.3
- Python3.4

2.2 AirWave

Checked below versions.

- AirWave 7.5
- AirWave 8.0

CHAPTER 3

Installation

3.1 PyPI

```
1 pip install airwaveapiclient
```

3.2 Github

```
1 git clone https://github.com/mtoshi/airwaveapiclient
2 cd airwaveapiclient
3 sudo python setup.py install
```


CHAPTER 4

User Guide

4.1 AirWaveAPIClient

4.1.1 init

4.1.2 login

4.1.3 logout

4.1.4 ap_list

4.1.5 ap_detail

4.1.6 client_detail

4.1.7 rogue_detail

4.1.8 latest_report

4.2 APList

4.2.1 init

4.3 APDetail

4.3.1 init

4.4 APGraph

Attributes:

- url (str)** AirWave URL.
- path (str)** Graph path.
- default_start_time(int)** Graph start default time.
- default_end_time(int)** Graph end default time.

4.4.1 init

`APGraph.__init__(url, obj)`
Initialize AirWaveAPIClient.

Args:

- url (str)** AirWave URL.
- obj (collections.OrderedDict)** APList element.

Usage:

```
>>> from airwaveapiclient import AirWaveAPIClient
>>> from airwaveapiclient import APGraph
>>> from airwaveapiclient import APList
>>>
>>> url = 'http://192.168.1.1/'
>>>
>>> airwave = AirWaveAPIClient(username='admin',
>>>                             password='xxxxx',
>>>                             url=url)
>>>
>>> airwave.login()
>>> ap_list = airwave.ap_list()
>>>
>>> objs = APList(ap_list)
>>> for obj in objs:
...     ap_graph = APGraph(url, obj)
...     ap_graph.client_count_802dot11an()
...
'http://x.x.x.x/nf/rrd_graph?
    end=0s&id=1&radio_index=2&start=-7200s&type=ap_client_count '
'http://x.x.x.x/nf/rrd_graph?
    end=0s&id=2&radio_index=2&start=-7200s&type=ap_client_count '
'http://x.x.x.x/nf/rrd_graph?
    end=0s&id=3&radio_index=2&start=-7200s&type=ap_client_count '
>>> airwave.logout()
```

4.4.2 client_count_802dot11bgn

`APGraph.client_count_802dot11bgn(start=None, end=None)`
RRD graph URL for access point client count of radio type IEEE802.11BGN.

Args:

- start (int, optional)** Graph start time(seconds ago). Default is -7200.
- end (int, optional)** Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.client_count_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=1&radio_index=1&start=-3600s&type=ap_client_count '
```

4.4.3 client_count_802dot11an

APGraph.**client_count_802dot11an** (*start=None, end=None*)

RRD graph URL for access point client count of radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.client_count_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=1&radio_index=2&start=-3600s&type=ap_client_count '
```

4.4.4 client_count_802dot11ac

APGraph.**client_count_802dot11ac** (*start=None, end=None*)

RRD graph URL for access point client count of radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.client_count_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=1&radio_index=2&start=-3600s&type=ap_client_count '
```

4.4.5 bandwidth_802dot11bgn

APGraph.**bandwidth_802dot11bgn** (*start=None, end=None*)

RRD graph URL for access point bandwidth of radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.bandwidth_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=1&radio_index=1&start=-3600s&type=ap_bandwidth'
```

4.4.6 bandwidth_802dot11an

APGraph.**bandwidth_802dot11an** (*start=None, end=None*)

RRD graph URL for access point bandwidth of radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.bandwidth_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=1&radio_index=2&start=-3600s&type=ap_bandwidth'
```

4.4.7 bandwidth_802dot11ac

APGraph.**bandwidth_802dot11ac** (*start=None, end=None*)

RRD graph URL for access point bandwidth of radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.bandwidth_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=3&radio_index=2&start=-3600s&type=ap_bandwidth'
```

4.4.8 dot11_counters_802dot11bgn

`APGraph.dot11_counters_802dot11bgn` (*start=None, end=None*)
RRD graph URL for access point dot11 counters of radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.dot11_counters_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=0s&id=1&radio_index=1&start=-3600s&type=dot11_counters'
```

4.4.9 dot11_counters_802dot11an

`APGraph.dot11_counters_802dot11an` (*start=None, end=None*)
RRD graph URL for access point dot11 counters of radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.dot11_counters_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=0s&id=1&radio_index=2&start=-3600s&type=dot11_counters'
```

4.4.10 dot11_counters_802dot11ac

`APGraph.dot11_counters_802dot11ac` (*start=None, end=None*)
RRD graph URL for access point dot11 counters of radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.dot11_counters_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
end=-0s&id=3&radio_index=2&start=-3600s&type=dot11_counters'
```

4.4.11 radio_channel_802dot11bgn

APGraph.**radio_channel_802dot11bgn** (*start=None, end=None*)

RRD graph URL for radio channel for radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_channel_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
ap_uid=00%3A00%3A10%3A00%3A00%3A03&
end=-0s&radio_index=1&radio_interface=2&start=-3600s&type=radio_channel'
```

4.4.12 radio_channel_802dot11an

APGraph.**radio_channel_802dot11an** (*start=None, end=None*)

RRD graph URL for radio channel for radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_channel_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
ap_uid=00%3A00%3A10%3A00%3A00%3A03&
end=-0s&radio_index=2&radio_interface=1&start=-3600s&type=radio_channel'
```

4.4.13 radio_channel_802dot11ac

APGraph.**radio_channel_802dot11ac** (*start=None, end=None*)

RRD graph URL for radio channel for radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_channel_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=1&start=-3600s&type=radio_channel'
```

4.4.14 radio_noise_802dot11bgn

APGraph.**radio_noise_802dot11bgn** (*start=None, end=None*)

RRD graph URL for radio noise for radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_noise_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=1&radio_interface=2&start=-3600s&type=radio_noise'
```

4.4.15 radio_noise_802dot11an

APGraph.**radio_noise_802dot11an** (*start=None, end=None*)

RRD graph URL for radio noise for radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_noise_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=1&start=-3600s&type=radio_noise'
```

4.4.16 radio_noise_802dot11ac

`APGraph.radio_noise_802dot11ac` (*start=None, end=None*)

RRD graph URL for radio noise for radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_noise_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=1&start=-3600s&type=radio_noise'
```

4.4.17 radio_power_802dot11bgn

`APGraph.radio_power_802dot11bgn` (*start=None, end=None*)

RRD graph URL for radio power for radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_power_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=1&radio_interface=2&start=-3600s&type=radio_power'
```

4.4.18 radio_power_802dot11an

`APGraph.radio_power_802dot11an` (*start=None, end=None*)

RRD graph URL for radio power for radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_power_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=radio_power'
```

4.4.19 radio_power_802dot11ac

`APGraph.radio_power_802dot11ac` (*start=None, end=None*)

RRD graph URL for radio power for radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_power_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=radio_power'
```

4.4.20 radio_errors_802dot11bgn

`APGraph.radio_errors_802dot11bgn` (*start=None, end=None*)

RRD graph URL for radio errors for radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_errors_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=1&radio_interface=2&start=-3600s&type=radio_errors'
```

4.4.21 radio_errors_802dot11an

`APGraph.radio_errors_802dot11an` (*start=None, end=None*)

RRD graph URL for radio errors for radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_errors_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=radio_errors'
```

4.4.22 radio_errors_802dot11ac

`APGraph.radio_errors_802dot11ac` (*start=None, end=None*)

RRD graph URL for radio errors for radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_errors_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=radio_errors'
```

4.4.23 radio_goodput_802dot11bgn

`APGraph.radio_goodput_802dot11bgn` (*start=None, end=None*)

RRD graph URL for radio goodput for radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_goodput_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=1&radio_interface=2&start=-3600s&type=radio_goodput'
```

4.4.24 radio_goodput_802dot11an

APGraph.**radio_goodput_802dot11an** (*start=None, end=None*)

RRD graph URL for radio goodput for radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_goodput_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=radio_goodput '
```

4.4.25 radio_goodput_802dot11ac

APGraph.**radio_goodput_802dot11ac** (*start=None, end=None*)

RRD graph URL for radio goodput for radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.radio_goodput_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=radio_goodput '
```

4.4.26 channel_utilization_802dot11bgn

APGraph.**channel_utilization_802dot11bgn** (*start=None, end=None*)

RRD graph URL for channel utilization for radio type IEEE802.11BGN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.channel_utilization_802dot11bgn(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=1&radio_interface=2&start=-3600s&type=channel_utilization'
```

4.4.27 channel_utilization_802dot11an

APGraph.**channel_utilization_802dot11an** (*start=None, end=None*)

RRD graph URL for channel utilization for radio type IEEE802.11AN.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.channel_utilization_802dot11an(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=channel_utilization'
```

4.4.28 channel_utilization_802dot11ac

APGraph.**channel_utilization_802dot11ac** (*start=None, end=None*)

RRD graph URL for channel utilization for radio type IEEE802.11AC.

Args:

start (int, optional) Graph start time(seconds ago). Default is -7200.

end (int, optional) Graph end time(seconds ago). Default is None.

Returns:

str Graph URL string.

Usage:

```
>>> ap_graph.channel_utilization_802dot11ac(start=-3600)
'https://x.x.x.x/nf/rrd_graph?
  ap_uid=00%3A00%3A10%3A00%3A00%3A03&
  end=-0s&radio_index=2&radio_interface=2&start=-3600s&type=channel_utilization'
```

4.5 Report

4.5.1 init

4.6 Sample code

- Sample code: [Github](#)

5.1 0.1.10 (2018-08-25)

Minor change for reliability.

5.2 0.1.9 (2017-10-13)

- Change method to generate URL path.

5.3 0.1.8 (2017-06-30)

- Added AMP stats and folder list methods.
- Changed documentation.

5.4 0.1.7 (2015-09-14)

- Changed some structures for stable into the APGraph methods.
- Changed documentation.

5.5 0.1.6 (2015-09-09)

- Added care of non existent graph url.
- Changed documentation.

5.6 0.1.5 (2015-09-07)

- Changed documentation.

5.7 0.1.4 (2015-09-07)

- Added latest report API.
- Changed documentation.

5.8 0.1.3 (2015-08-17)

- Added 802.11ac graph url.
- Changed documentation.

5.9 0.1.2 (2015-08-03)

- Changed documentation.

5.10 0.1.1 (2015-08-02)

- Changed documentation.

5.11 0.1.0 (2015-08-01)

- First release

CHAPTER 6

Indices and tables

- `genindex`
- `modindex`
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