

iLighting intelligent Lighting Monitoring

***External Lighting Automation System for
Energy saving, reduced maintenance costs,
increased lighting service and safety/security
for your Lighting Networks***

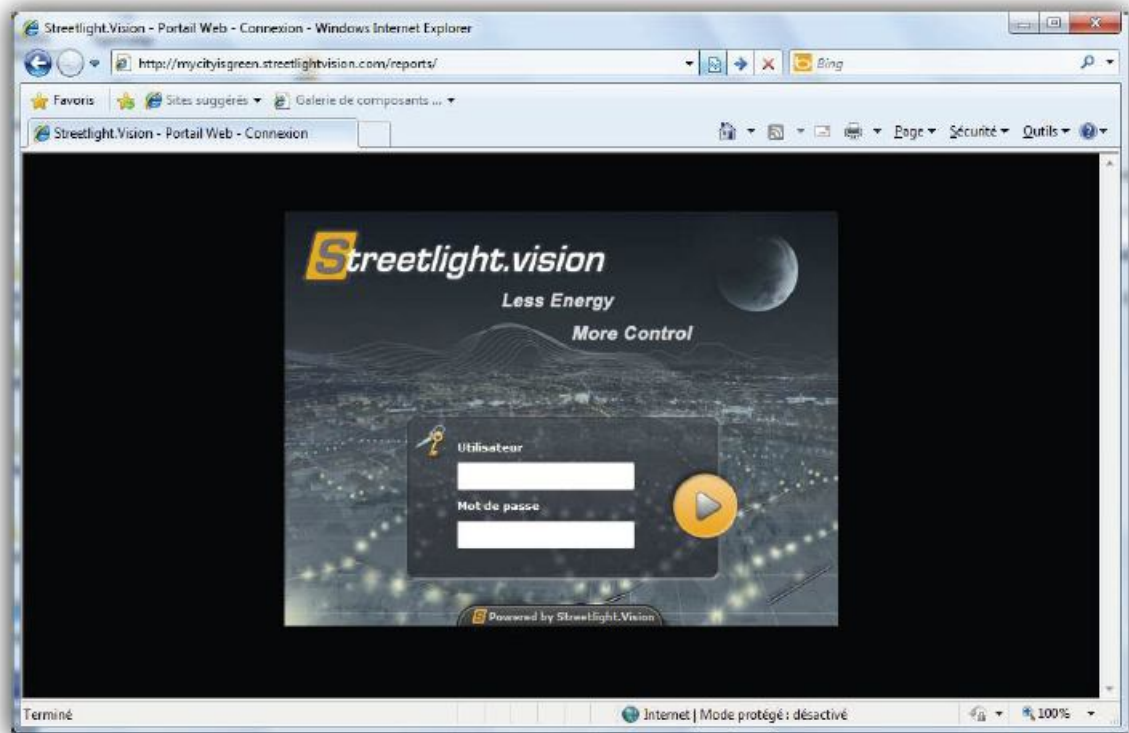


www.ilighting.com.hk



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iLighting Intelligent Automation System Co.
Ltd.



Log in screen



Desktop screen

How to navigate in the map

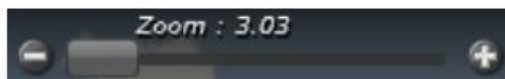
When the “Equipments” WebApp is started, the default Map Source (usually Microsoft BING MAP) is displayed in the main part of your screen.



“Equipments” webApp screen

Action – The map area provides the end-user with a fluid navigation experience on online maps. To navigate in the map you can use:

- the navigation using the mouse of the computer:
 - click-hold-move to move the map in any direction
 - double-click to zoom in
 - in case your mouse has a rolling button, you may use it to zoom in and out
- the Zoom in and out using the “zoom slider” in the top horizontal toolbar:



- the navigation using the geozone tree: navigate from one geozone to another by clicking on the geozone in the geozone tree on the left side of the screen (circled in green below).

Tip – You can change the map source by selecting a new map source in the map source selector. Various WMS-compatible map sources are available in various modes: roads only, aerial (satellite and bird-eye views) and hybrid (satellite and bird-eye accompanied with road indications).

Nota – A yellow pin represents each geozone and a rectangle shows the limit box of its devices (light points, segment controllers, cameras, smart meters, etc.... and sub-geozone).


When a given geozone is selected in the tree, its sub-geozones are shown on the map. The zoom level is automatically calculated to display the geozone based on its south-west and north-east positions as well as the position of the devices it contains.



Map source selector

How to create, edit or delete a geozone

Action – To create a geozone:

1. Right-click on the “root” Geozone or on a parent geozone, in which the new geozone should be create.
2. Click on “Add geozone”. The mouse pointer is modified to .



Add Geozone action

3. Edit the name (circled in green below) of the newly created geozone in the widget window that is displayed at the top right side of the screen.
4. As an option, you may also edit the current monthly energy consumption of all the equipments in this geozone (circled in red below). If current monthly energy consumption is different from zero, then these data shall be taken into account when calculating the energy savings thanks to the Monitoring and Control System. In case these figures are zero, the STREETLIGHT.VISION WEB SERVER shall estimate the energy saving based on the number of measured running hours with lamps burning at 100% in addition to existing old magnetic ballast.
5. Push the CTRL key on your keyboard and click/hold/drag the mouse on the map to draw a rectangle corresponding to the geozone you want to create. A transparent blue rectangle is displayed to show your geozone.
6. Release the CTRL+click action and click on the “Create” button in the geozone Widget to create this geozone.

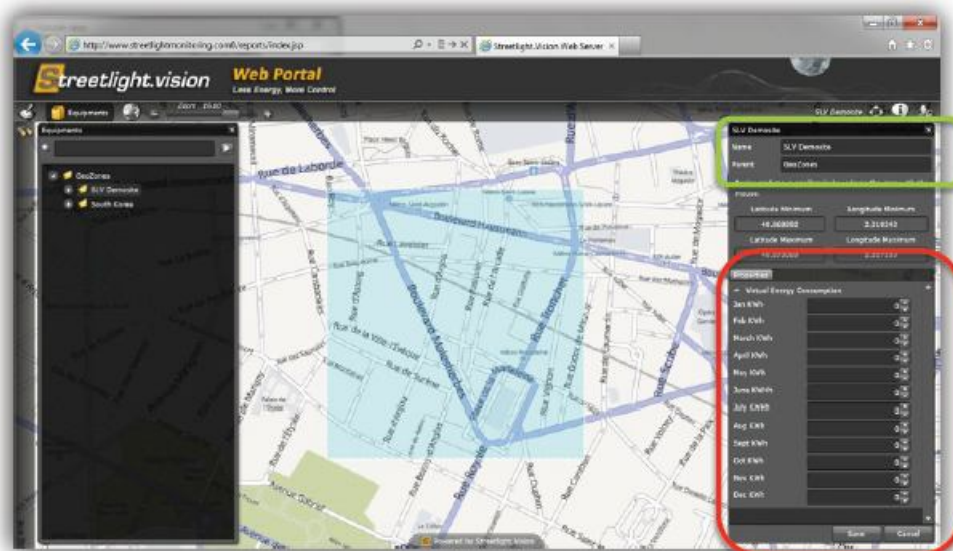


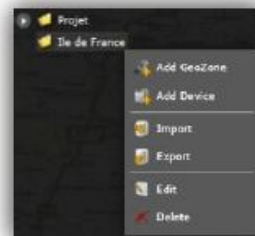
Fig 15: Geozone creation screen

Nota – You may create a complex tree of geozone in order to organize and group your devices the way you want. As explained in the “Users WebApp” section, you may group your geozones per customer, per city or whatever and give access to a city (or part of the city or any other geozone) only to few users, grouped in a user profile.

How to create or edit a device

Action – To add a device in a geozone:

1. Right-click on the geozone in which you want to add a device.
2. Click on “Add Device” to display the device’s Widget.



Add Device action

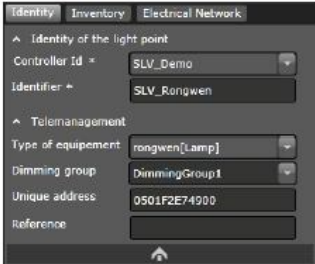
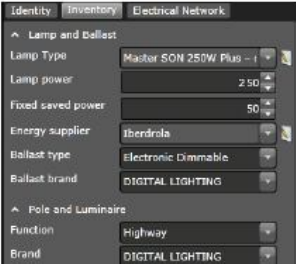

3. Enter the name of the device in the Name entry field (circled in green below).
4. Select the type of device you want to create (circled in green below):

| Icon | Type of device |
|------|-------------------------------------|
| | Light Point |
| | Switch |
| | Camera |
| | Segment Controller |
| | Energy Meter |
| | Electrical Vehicle Charging Station |
| | Green Node |

Light point creation Widget

Once the type of device is selected, the Widget is reloaded to get the list of properties for this type of device, from the server.

Here are the tabs for a light point:

| 1 st tab pane: Identity | 2 nd tab pane: Inventory | 3 rd tab pane: Electrical network |
|--|---|---|
|  <ul style="list-style-type: none"> • Controller Id: Name of the Segment Controller to which your device is connected • Identifier: character string that characterize your device on the SC • Type of equipment: is model of OLC • Dimming group: group that shall be used to schedule the light point in the SC • Unique address: NEURON ID of your device if it is a LonWorks device |  <ul style="list-style-type: none"> • Lamp type: click on the "edit" icon to select or add a new lamp type • Lamp power: power of the lamp • Fixed saved power: power consumed by the old magnetic ballast (or other driver) that was replaced by an electronic ballast • All the other entry fields are free-format text entry fields to describe the device. |  <ul style="list-style-type: none"> • Network type: free-format text entry field • Segment: id of the electrical segment that supplies this device • Section: cable section that supplies this device |

1. Click on the map where you want to position your device.
2. Click on the "Save" button at the bottom of the device Widget.

How to move multiple devices

Action – To move multiple devices on the map:

1. Hold the **CTRL** key on your keyboard and click/hold the mouse to draw a rectangle on the map, including all the devices you want to move.
2. If you want to add devices that are not into the drawn rectangle, hold the **CTRL** key on your keyboard and click on the device one by one to include them into the selection.
3. Place the pointer of the mouse on one of the selected devices.
4. Click/hold/move the mouse to move the selected devices accordingly.

How to delete multiple devices

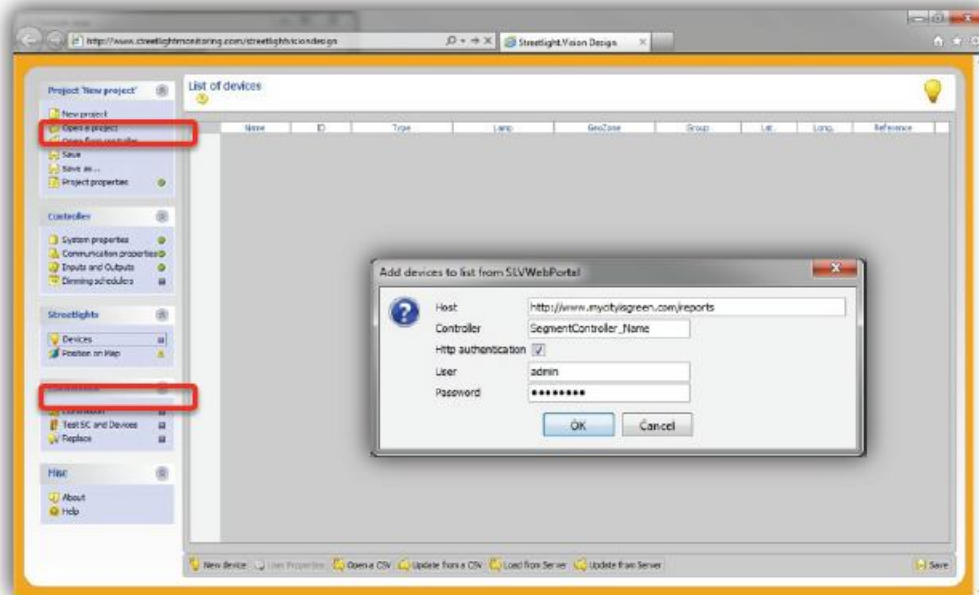
Action – To delete multiple devices on the map:

1. Select the devices as explained in the "Move multiple devices" section.
2. Click on the "Delete all" button in the duplicate widget or click on the red cross in front of the devices you want to delete.

How to bar-code the Mac Address or Neuron ID

Action – To delete multiple devices on the map:

1. Select the devices you want to assign a mac address or Neuron Id to, as explained in the "Move multiple devices" section.
2. Select the first device in the list that is displayed in the duplicate widget.
3. Enter the mac address or Neuron Id using your keyboard or (recommended) using a bar-code reader that is connected to the USB port of your computer or through Bluetooth.



Streetlight.Vision Design Add devices screen

How to display the “Alarm Manager” WebApp

Action – To display the “Alarm Manager” WebApp, click on the “Alarm Manager” selectable rectangle on the desktop.

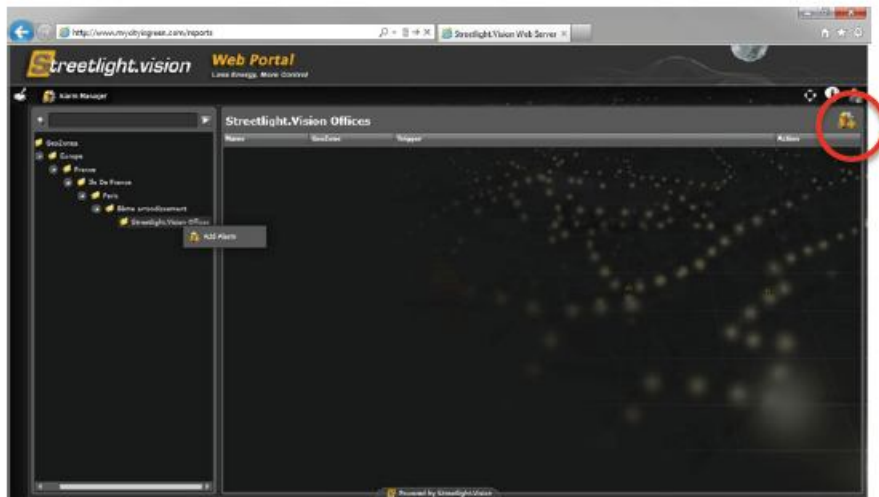


: “Alarm Manager” rectangle

How to create an Alarm

Action – To configure the Web Portal so that it triggers an Alarm:

1. **Right-click on the geozone in which you want to add an Alarm or select the geozone in the geozone tree and click on the “Add Alarm” button (circled in red above).**



add an Alarm screen

2. **Select the type of Alarm you want to create in the drop-down list (circled in red below). Each type of alarm is described in the table below.**

3. Fill-in the parameters and properties for the alarm you created (see below for description of each alarm's entry field).
4. Click "Create" at the bottom right side of the screen to create this alarm.

The screenshot shows the 'Alarm Definition' window with the 'New Alarm' tab selected. The 'Name' field is empty. The 'Type' dropdown is highlighted with a red circle and shows 'Group failure ratio'. The 'GeoZone' is set to 'Streetlight Vision Offices' and the 'Action' is 'Send E-Mail'. Below the 'Type' dropdown, there are fields for 'Priority' (set to 0) and 'Critical Failure Rate (%)' (set to 3). A list of failure types is shown on the left, including 'Backup scheduler [BackupScheduler]', 'Ballast communication [Default]', 'Ballast Failure [BallastFailure]', 'Ballast fault [Default12]', 'Bootloader Mode [BootloaderMode]', 'Brown out [Default11]', 'Cap Mode [CapMode]', 'Capacitor Failure [CapacitorFailure]', and 'Controller Failure [ControllerFailure]'. On the right, there is a 'Send E-Mail' panel with fields for 'From', 'To', 'Subject', and 'Message'. The 'Message' field has buttons for 'ET', 'CR', and 'FR'. At the bottom right, there are 'Create' and 'Cancel' buttons.

Alarm creation screen

How to edit an alarm

Action – To edit an alarm:

1. Click on the alarm in the geozone tree.
2. Edit the parameters of the selected alarm.
3. Click on "Save" at the bottom right side of the screen.

How to delete an alarm

Action – To delete an alarm:

1. Right-click on the alarm in the geozone tree.
2. Click on "Delete" in the menu.
4. Confirm by clicking "OK".

| Alarm type | Description |
|---|--|
| Group failure ratio | Alarm is triggered in case a user-defined percentage of failures (multiple types of failure are selected by end-user) within the selected geozone is exceeded. |
| Multiple alarms on multiple OLCs | Alarm is triggered in case any OLC in a list of selected OLCs (from various sub-geozone in the selected geozone) has detected a failure (multiple types of failure are selected by end-user). |
| One alarm on multiple OLCs | Alarm is triggered in case a user-defined number of OLCs in a list of selected OLCs (from various sub-geozone in the selected geozone) has detected a failure (multiple types of failure are selected by end-user). |
| SC input alarm | Alarm is triggered in case the selected digital input of the Segment Controller or an external MODBUS input (from a MODBUS I/O device that is connected to the Segment Controller and supported by the Streetlight.Vision Design software) is equal to the user-defined value (ON or OFF). Alarm can be defined in case the last value that is collected from the Segment Controller is ON or OFF or in case the selected digital input had this value (ON or OFF) within the last 1, 6 or 12 hours, to enable detection or fast-changing changes in digital inputs. |
| Segment Controller did not send data | Alarm is triggered in case the Segment Controller has not sent data during the last hours. Number of hours is defined by the end-user. |
| Too many failures in area | Alarm is triggered in case the number of light point that has a failure within a circle area (as defined by a radius in meter) is exceeded. |

How to edit an alarm

Action – To edit an alarm:

1. Click on the alarm in the geozone tree.
2. Edit the parameters of the selected alarm.
3. Click on “Save” at the bottom right side of the screen.

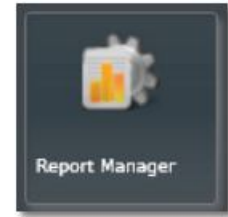
How to delete an alarm

Action – To delete an alarm:

1. Right-click on the alarm in the geozone tree.
2. Click on “Delete” in the menu.
4. Confirm by clicking “OK”.

How to display the “Report Manager” WebApp

Action – To display the “Report Manager” WebApp, click on the “Report Manager” selectable rectangle on the desktop.

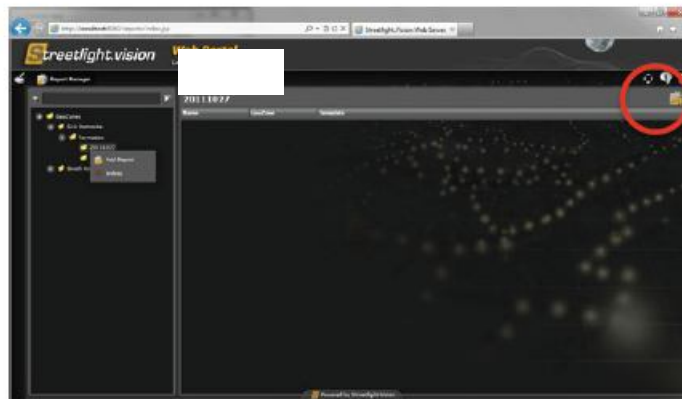


: “Report Manager” rectangle

How to create a Report

Action – To create a Report that shall be automatically generated by the STREETLIGHT.VISION WEB SERVER:

1. **Right-click on the geozone that you want to be considered in the automatically generated Report or select the geozone in the geozone tree and click on the “Add Report” button (circled in red above).**



Add a report screen

2. **Select the type of Report you want to create in the drop-down list.**

| | |
|-------------|----------------------|
| Name | New Report |
| Type | Failures Report |
| Periodicity | Failures Report |
| | Symology Report |
| | Umso |
| | Weekly Energy Report |

Selection of the alarm type screen

Each type of report is described in the table below:

| Type of Report | Description |
|-----------------------------|--|
| Failure report | STREETLIGHT.VISION WEB SERVER shall generate a text file that contains the list of failures detected in the selected geozone and publish it on a FTP server for 3 rd party software to read it. |
| Symology Report | STREETLIGHT.VISION WEB SERVER shall generate a file that is specific to the SYMOLOGY Maintenance Software. This file shall contain the list of failures detected in the selected geozone. The file shall be published on a FTP server for the SIMOLOGY software to read it. |
| UMSO Report | STREETLIGHT.VISION WEB SERVER shall generate a file that is specific to the UMSUG specification in the United Kingdom. The software passed the UMSUG certification in conjunction with certain OLCs. This file shall contain the time at which the OLCs executed ON, OFF and dimming commands. It also contains the list of failed OLCs and lamps in the selected geozone. The file shall be published on a FTP server for the UMSO software to read it. |
| Weekly Energy Report | STREETLIGHT.VISION WEB SERVER shall generate an eMail that contains the energy consumption and saving for the selected geozone and sub-geozones, for the last week. This report shall be generated and sent by eMail either every day or once a week. |

3. Fill-in the parameters and properties for the report you created.
4. Click “Create” at the bottom right side of the screen to create this Report on the server.

How to configure a "Failure report"

Action – To create a "Failure Report":

1. **Right-click on the geozone** for which you want to create this type of report and click **"Create Report"**.
2. **Select "Failure Report"** in the list of report type (circled in red below).
3. **Give a name to your report** (circled in blue below).
4. **Enter a free-format text description** in the description entry field.
5. **Select the time of the day** at which the server shall generate this report.
6. **Enter the FTP parameters** of the FTP target server on which the Failure Report shall be published:
 - FTP Host: host name or TCP/IP address of the FTP server
 - FTP User: user name to login to the FTP server
 - FTP Password: password to login to the FTP server
 - FTP full file path: the path and file name of the automatically generated failure report

The screenshot shows the 'Report Definition' window with the following details:

- Title:** Report Definition
- Section:** New Report
- Name:** New Report (circled in blue)
- Type:** Failure Report (circled in red)
- Description:** (empty text field)
- Periodicity:** Each Day, 00:00
- Action:** Send via FTP
- Send via FTP section (highlighted with a green border):**
 - FTP host: (empty text field)
 - FTP user: (empty text field)
 - FTP password: (empty text field)
 - FTP full file path: (empty text field)
- Buttons:** Create, Cancel
- Failures Report section:** No Parameter

How to edit a report

Action – To edit a report:

1. **Click on the report** in the geozone tree.
2. **Edit the parameters** of the selected report.
3. **Click on "Save"** at the bottom right side of the screen.

How to delete a report

Action – To delete a report:

1. **Right-click on the report** in the geozone tree.
2. **Click on "Delete"** in the menu.
3. **Confirm by clicking "OK"**.

How to configure a "Weekly energy report"

Action – To create a "Weekly energy report":

1. Right-click on the **aeozone** for which you want to create this type of report and

How to use the "Data History" WebApp

Action – To display the Data history, click on the "Data History" selectable rectangle on the desktop.

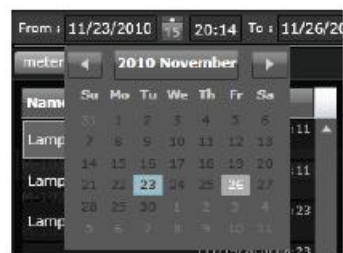


"Data history" rectangle

How to display a trend chart

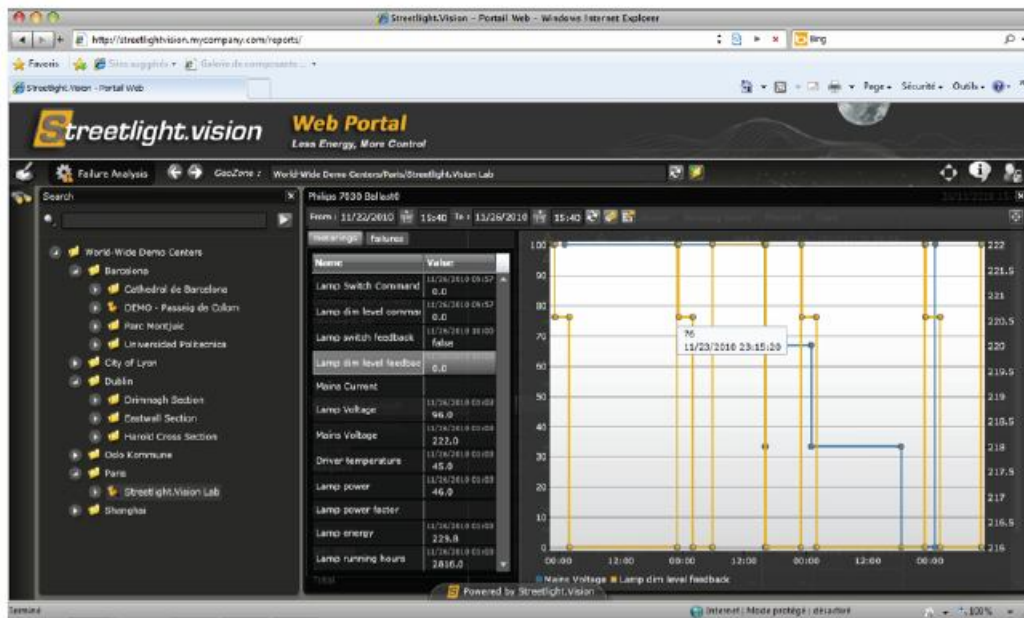
Action – To display a trend chart:

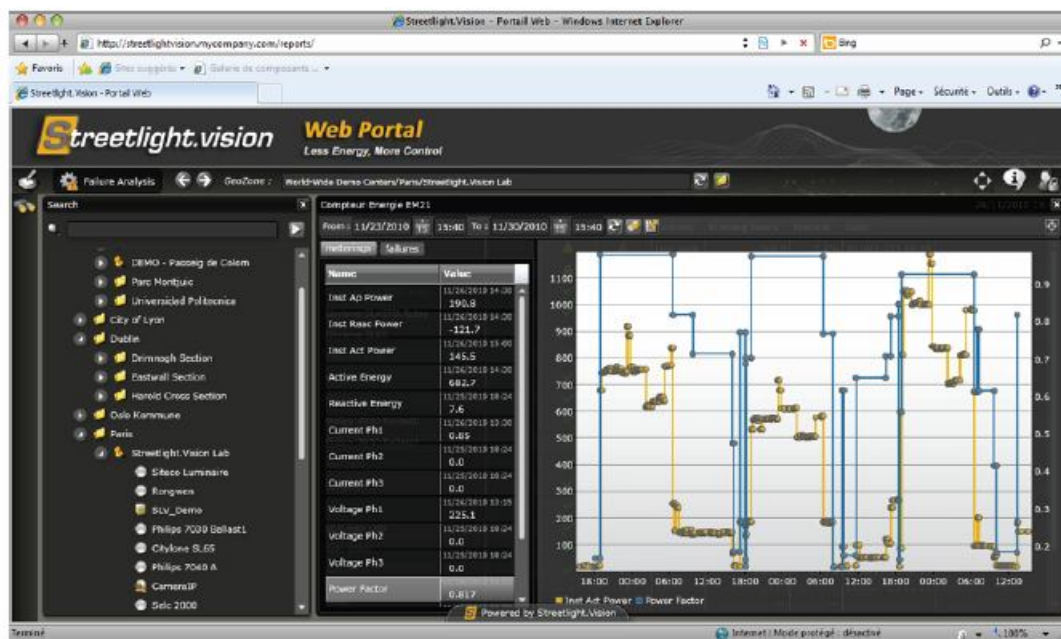
1. Select a device in the geozone tree.
2. Select the "From" and the "To" dates and times in the header of the trend chart area.



Calendar of the trend chart area




3. Select the data to display in the list of metering data or failure data for the selected device:





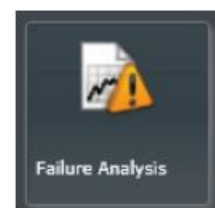
Data history graph screen 2

You may also want to:

- Display the value and time of a point in the trend chart, by mousing over this point in the trend chart.
- Remove the currently displayed trend charts, by clicking on the  icon.
- Reload the data display, for example after having changed the date and time, by clicking on the  icon.
- Export the displayed data in a CSV comma-separated file, by clicking on the  icon.
- Select another device to analyze its data, by clicking on the device in the geozone tree.

How to display the "Failure Analysis" WebApp

Action – To display the "Failure Analysis" WebApp, click on the "Failure Analysis" selectable rectangle on the desktop.



"Data history" rectangle

How to display the "Aggregated Failure Report" for a particular geozone

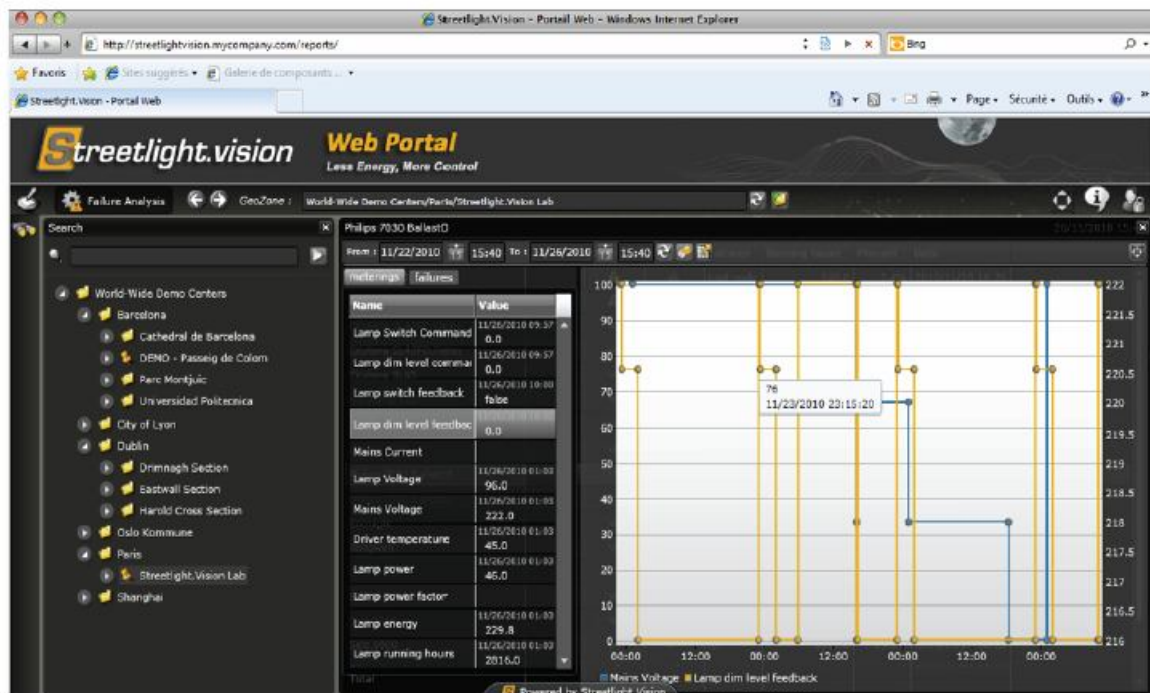
Nota – When launching the "Failure Analysis" WebApp, the "Failure Analysis" WebApp automatically displays the aggregated failure report for the "root" geozone.

Action – To display an "Aggregated Failure Report" for a particular geozone:

The screenshot shows the Streetlight.vision Web Portal interface. On the left is a navigation tree under 'World-Wide Demo Centers' listing various locations like Barcelona, Dublin, Paris, etc. The main area displays a 'Failures Report' table with the following data:




| Name | Count | Warning | Warning % | Outage # | Outage % | Lamps to change # | Lamps to change % |
|--------------|------------|-----------|-------------|-----------|-------------|-------------------|-------------------|
| Barcelona | 303 | 33 | 10.9% | 33 | 10.9% | 0 | 0.0% |
| Dublin | 297 | 31 | 10.4% | 31 | 10.4% | 0 | 0.0% |
| City of Lyon | 317 | 23 | 7.3% | 23 | 7.3% | 0 | 0.0% |
| Paris | 19 | 3 | 15.8% | 2 | 10.5% | 1 | 5.3% |
| Cala Kommune | 12 | 0 | 0.0% | 0 | 0.0% | 0 | 0.0% |
| Shanghai | 10 | 0 | 0.0% | 0 | 0.0% | 0 | 0.0% |
| Total | 958 | 90 | 9.4% | 89 | 9.3% | 1 | 0.1% |

Failure Analysis screen – aggregated report



Data history graph screen

You may also want to:

- Display the value and time of a displayed point by mousing over the point in the trend chart.
- Remove the currently displayed trend chart by clicking on the  icon.
- Reload the data display, for example after having changed the date and time, by clicking on the  icon.
- Export the displayed data in an EXCEL file (CSV comma separated format) by clicking on the  icon.
- Select another light point to analyze its data by clicking on the device in the geozone tree.

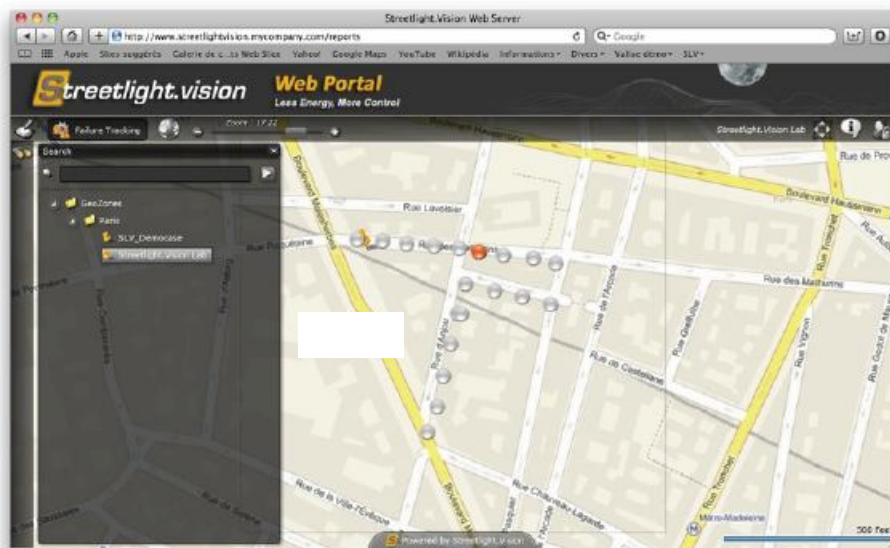


How to display failed devices on a map

Action – To display the failed devices on the map:

1. Click on a geozone that contains devices.
2. The devices are painted in:
 - a. red if the device has a critical failure
 - b. orange if the device has a warning
 - c. gray if the device works in normal conditions

You may also mouse over the device to display some information about the device and the type of warning or outage that has been detected on the device.



: Failed devices tracking screen

- Display the historical trend of warnings or outages for a particular light point.

In this example, the light point was detected not to be reachable any more (cable loss or device is out of order) on May 28th at 12:55.

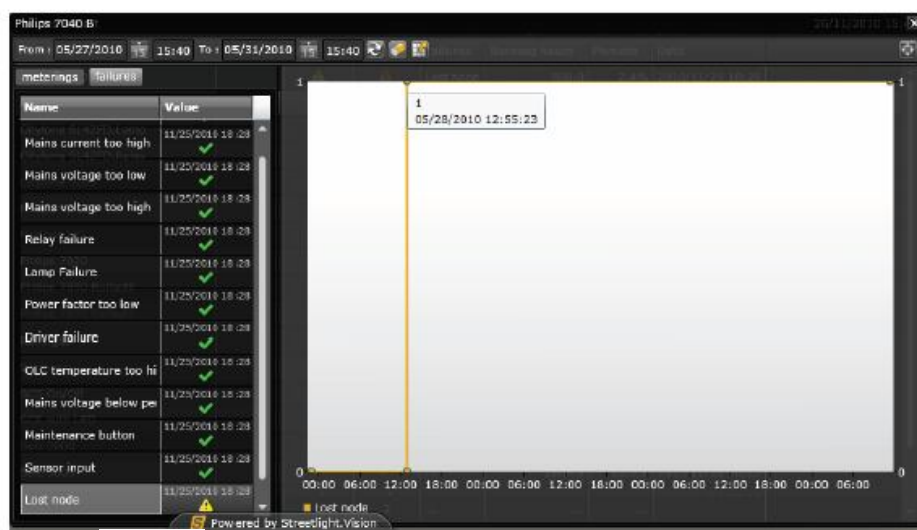


Fig 57: Example of historical trend of warning for a particular light point

How to display the device's failure history

Action – To display the device's failure history:

1. Click on the device on the map.
2. The device failure history widget is displayed on the right side of the screen.

In case the device is controlled by an OLC, then the last 15 days of failure history is displayed.

In case the device is a standalone device (not controlled by any OLC), the last 3 months of failure history are displayed.

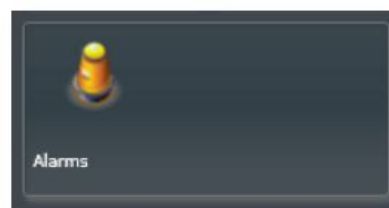
| History on this light point | | |
|-----------------------------|------------------------|---|
| 06/06/2011 05:20 | High Temperature | ✓ |
| 06/06/2011 05:20 | Mains current too low | ✓ |
| 06/06/2011 05:20 | Mains current too high | ✓ |
| 06/06/2011 05:20 | Mains voltage too low | ✓ |
| 06/06/2011 05:20 | Lamp Failure | ✓ |
| 06/06/2011 05:20 | Mains voltage too high | ⚠ |
| 06/06/2011 05:10 | Mains voltage too high | ✓ |
| 06/06/2011 02:10 | Mains voltage too high | ⚠ |
| 06/06/2011 02:00 | Mains voltage too high | ✓ |
| 06/06/2011 01:20 | Mains voltage too high | ⚠ |
| 06/06/2011 01:10 | Mains voltage too high | ✓ |
| 06/06/2011 00:10 | Mains voltage too high | ⚠ |

Device's failure history widget

How to display the "Alarms" I

Action – To display the "Alarms" WebApp, click on the "Alarms" selectable rectangle on the Web desktop.

"Alarms" rectangle



How to display the list of alarms

Action – To display the list of alarms using the "Alarm" WebApp, click on a geozone to display the list of alarms in this geozone and its sub-geozones.

| Name | GeoZone | Priority | Trigger | Creation time | State | Last notification | User |
|----------------------|------------------------|----------|---------------------------|----------------|-------|-------------------|------|
| SLV Lost node | Streetlight-Vision Lab | 2 | SLV Lost node | 10/06/15 12:10 | ⚠ | 10/06/15 12:10 | - |
| SLV Multiples Alarms | Streetlight-Vision Lab | 8 | SLV Multiples Alarms-950 | 10/11/02 08:27 | ⚠ | 10/11/02 08:27 | - |
| SLV Multiples Alarms | Streetlight-Vision Lab | 8 | SLV Multiples Alarms-2035 | 10/09/07 17:36 | ⚠ | 10/09/07 17:36 | - |
| SLV Multiples Alarms | Streetlight-Vision Lab | 8 | SLV Multiples Alarms-958 | 10/09/02 15:20 | ⚠ | 10/09/02 15:20 | - |
| SLV Multiples Alarms | Streetlight-Vision Lab | 8 | SLV Multiples Alarms-959 | 10/11/10 00:07 | ⚠ | 10/11/10 00:07 | - |
| SLV Multiples Alarms | Streetlight-Vision Lab | 8 | SLV Multiples Alarms-2037 | 10/06/20 01:10 | ⚠ | 10/06/20 01:10 | - |

Alarms list screen

How to acknowledge a triggered alarm


Action – To acknowledge a triggered alarm:

1. **Click on the “Alarm”** in the alarm list.
2. **Enter a comment** to explain the reason why you acknowledge this alarm and click **OK**.



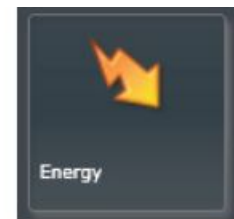
Triggered alarm screen

You may also want to:

- **Sort the alarms by priority** by clicking on the “Priority” header.
- **Sort the alarms by alphabetical order** of any of the displayed column by clicking on the header of the column.
- **Display only active alarms** by clicking on the  icon.

How to display the “Energy” WebApp

Action – To display the “Energy” WebApp, click on the “Energy” selectable rectangle on the desktop.

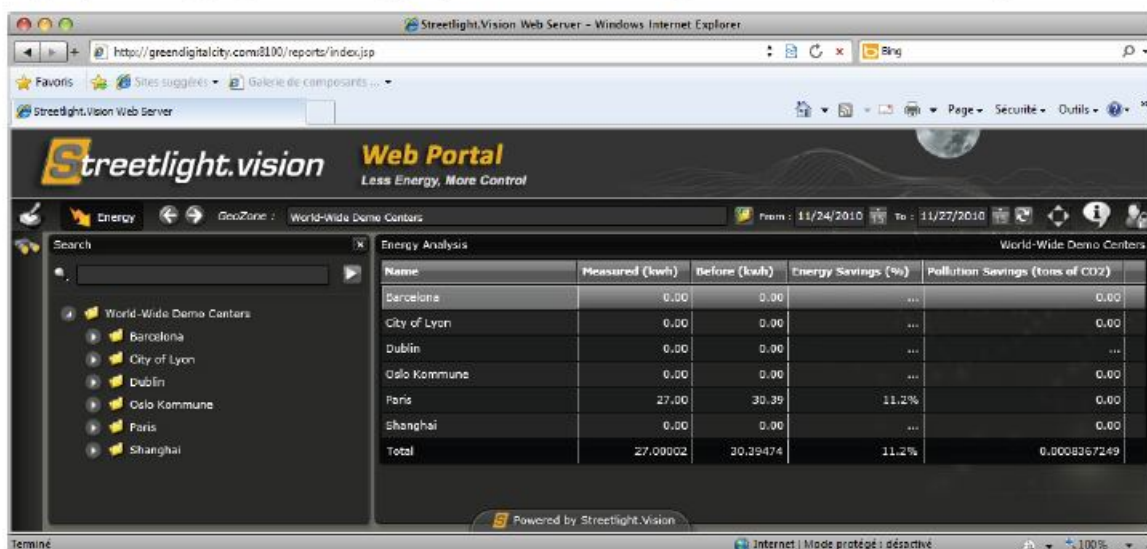


“Energy” rectangle

How to display “Aggregated Energy Report” for a particular geozone

Action – To display an “Aggregated Energy Report” for a particular geozone:

Nota – When launching the “Energy” WebApp, the “Energy” WebApp automatically displays the aggregated energy report for the “root” geozone for the last 3 days.



The “Energy” WebApp Screen

1. Click on the geozone of your choice in the geozone tree, on the left side of the screen.
The aggregated energy report corresponding to the newly selected geozone is displayed.

How to Drill down in the Energy Reports

Action – To drill down into the energy reports and get the energy report (aggregated or detailed energy report) for a sub-geozone:

- **Click on the name of the sub-geozone** in an aggregated energy report.
- As a result, the Energy WebApp displays:
 - an aggregated energy report if there is at least one sub-geozone in the newly selected geozone.
 - A “detailed energy report” otherwise.

How to display “Detailed Energy Reports” for a particular geozone

Action – To display the detailed energy report for a particular geozone:

1. **Click on a geozone** that does not contain any sub-geozone but only light points, in the geozone tree on the left side of the screen.
2. The detailed energy report is then displayed. It provides the following information:

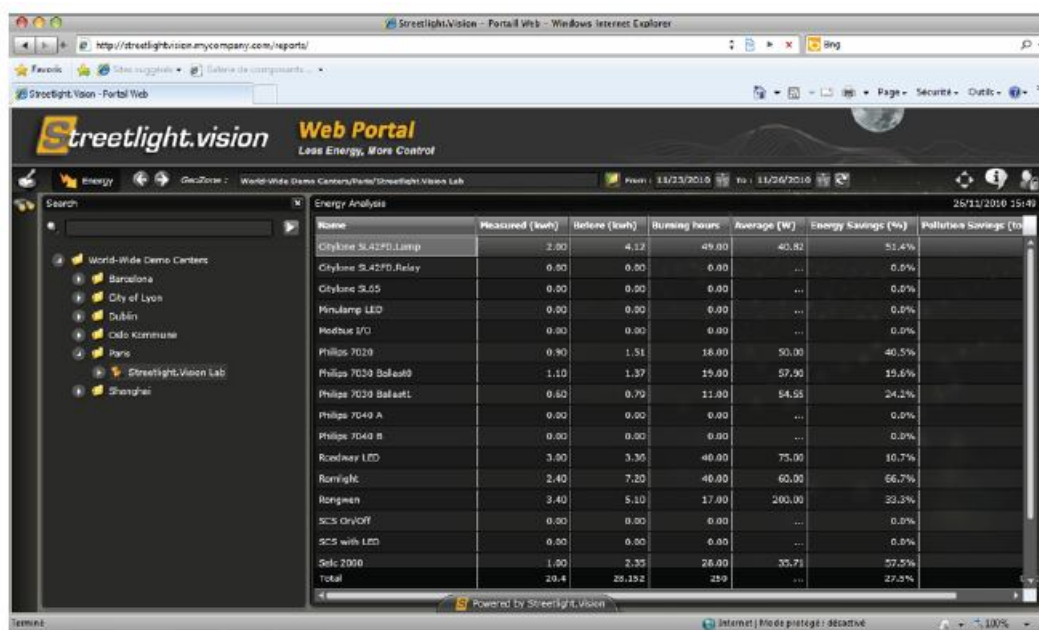
The aggregated energy report fetches the data aggregated by the Streetlight.Vision Web Server from the energy data collected from all OLCs in the selected geozone to display the following aggregated informations for each sub-geozone:

- **NAME:** sub-geozone name.
- **MESURED:** sum of the kilo-watt.hours that were measured between the two selected dates (first date at 00:00 and last date à 23:59).

Nota – Each day, the Energy Plug-In of the Streetlight.Vision Data Collect computes the energy value of each geozone and stores it in the database. The number in this column is calculated based on these aggregated values. Due to this mechanism, you may find some minor discrepancies between the energy consumption in the aggregated energy report and the energy consumption in the detailed energy report. In case discrepancies are significant, please ask your administrator to check whether the Energy Plug-In is correctly activated and running.
- **BEFORE:** sum of the kilo-watt.hours that would have been consumed by all the lamps in this sub-geozone (same lamp wattage + old ballast wattage as indicated in the Streetlight.Vision Equipment WebApp) during the same number of running hours (as measured by each OLC). The Energy Plug-In of the Streetlight.Vision Data Collect software aggregates and calculates the saved energy every day.
- **ENERGY SAVING:** percentage of energy saving between the number indicated in column 2 (energy measured by the OLC) and the number indicated in column 3 (estimated old energy consumption).
- **POLLUTION SAVINGS:** equivalent number of tons of CO² that have been emitted to produce this energy. Each Light Point is assigned to an electricity provider in the database (refer to your administrator). Each electricity provider that is recorded in the database has a “CO² emission ratio per kWh”.

The following information are displayed in the detailed energy report for each light point:

- **NAME:** light point name.
- **MESURED:** number of kilowatt.hour that were consumed during the selected timeframe (first day at 00:00 and last day at 23:59), as measured by the OLC.
- **BEFORE:** estimated energy consumption of the same light point (same lamp wattage + old ballast consumption as indicated in the Streetlight.Vision "Equipments" WebApp) for the same number of running hours (as measured by the OLC), if there were no dimming scheme in place.
- **BURNING HOURS:** number of running hours during the selected timeframe, as measured by the OLC
- **ENERGY SAVING:** percentage of energy saving between the number indicated in column 2 (energy measured by the OLC) and the number indicated in column 3 (estimated old energy consumption).
- **POLLUTION SAVINGS:** equivalent number of tons of CO² that have been emitted to produce this energy. Each Light Point is assigned to an electricity provider in the database (refer to your administrator). Each electricity provider that is recorded in the database has a "CO² emission ratio per kWh".



| Name | Measured (kwh) | Before (kwh) | Burning hours | Average (W) | Energy Savings (%) | Pollution Savings (t) |
|-----------------------|----------------|--------------|---------------|-------------|--------------------|-----------------------|
| Cityline SL42FD.Lamp | 2.00 | 4.12 | 49.00 | 40.82 | 51.4% | ... |
| Cityline SL42FD.Relay | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Cityline SL45 | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Hindlamp LED | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Hofbus I/O | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Philips 7029 | 0.90 | 1.51 | 16.00 | 50.00 | 40.5% | ... |
| Philips 7029 Ballast | 1.10 | 1.37 | 19.00 | 57.90 | 19.6% | ... |
| Philips 7029 BallastL | 0.60 | 0.79 | 11.00 | 54.55 | 24.2% | ... |
| Philips 7049 A | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Philips 7049 B | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Roadway LED | 3.00 | 3.36 | 40.00 | 75.00 | 10.7% | ... |
| Romnight | 2.40 | 7.20 | 40.00 | 60.00 | 66.7% | ... |
| Rongmen | 3.40 | 5.10 | 17.00 | 200.00 | 33.3% | ... |
| SCS On/Off | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| SCS with LED | 0.00 | 0.00 | 0.00 | ... | 0.0% | ... |
| Sels 2000 | 1.00 | 2.35 | 26.00 | 35.71 | 57.5% | ... |
| Total | 20.4 | 25.152 | 259 | ... | 27.5% | ... |

Detailed Energy Reports example

How to display the “Monthly Energy Saving” WebApp

Action – To display the “Monthly Energy Saving” WebApp, click on the “Monthly Energy Saving” selectable rectangle on the desktop.

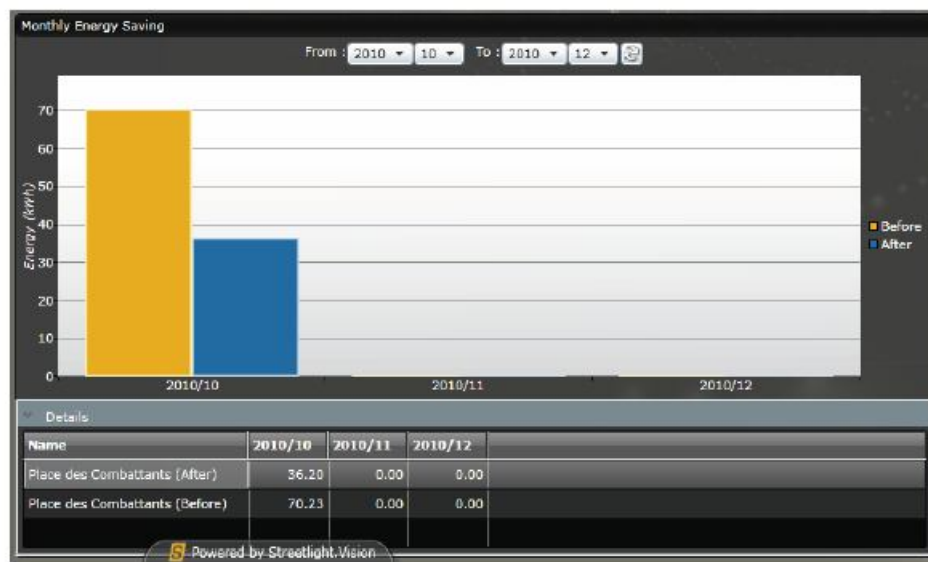


: “Monthly Energy Saving” rectangle

How to display the “Monthly Energy Saving” chart for a particular geozone

Action – Click on the geozone of your choice in the geozone tree, on the left side of the screen.

Nota – The Monthly Energy Saving chart for the root geozone is automatically displayed for the last three months, as in the example below.



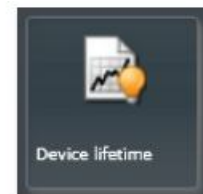
“Monthly Energy Saving” graph screen

You may also – Change the timeframe in the “From” and “To” entry fields at the top of the chart to get the report for another timeframe.

Nota – The numbers in the columns “After” and “Before” are the one aggregated by the Energy Aggregation Plug-In, as explained in the “Energy Report WebApp” section.

How to display the "Lamp lifetime" WebApp

Action – To display the "Device lifetime" WebApp, click on the "Device lifetime" selectable rectangle on the desktop.

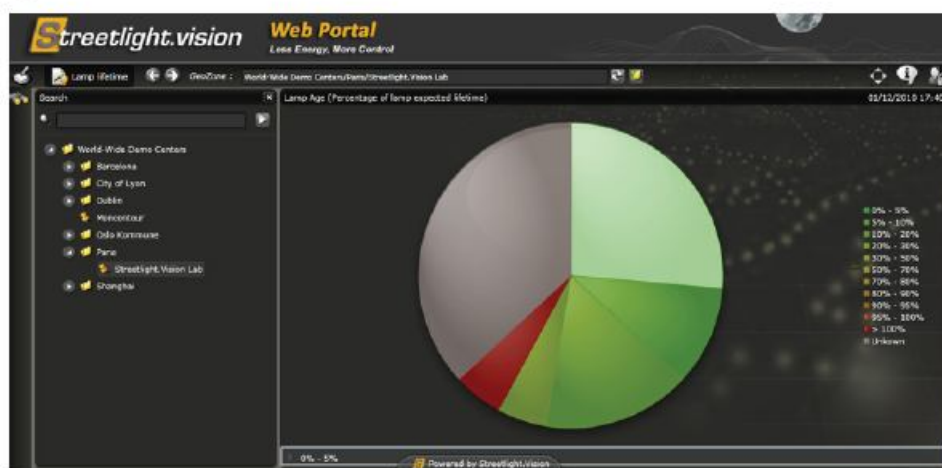


The "Device lifetime" rectangle

How to display the "Device Lifetime" pie chart for a particular geozone

Action - To display a Lamp lifetime pie chart for a particular geozone, click on the "Device Lifetime" selectable rectangle on the end-user desktop.

The Lamp Lifetime analysis pie chart for the root geozone is automatically displayed, as in the example below.




"Lamp lifetime" pie chart of the root geozone

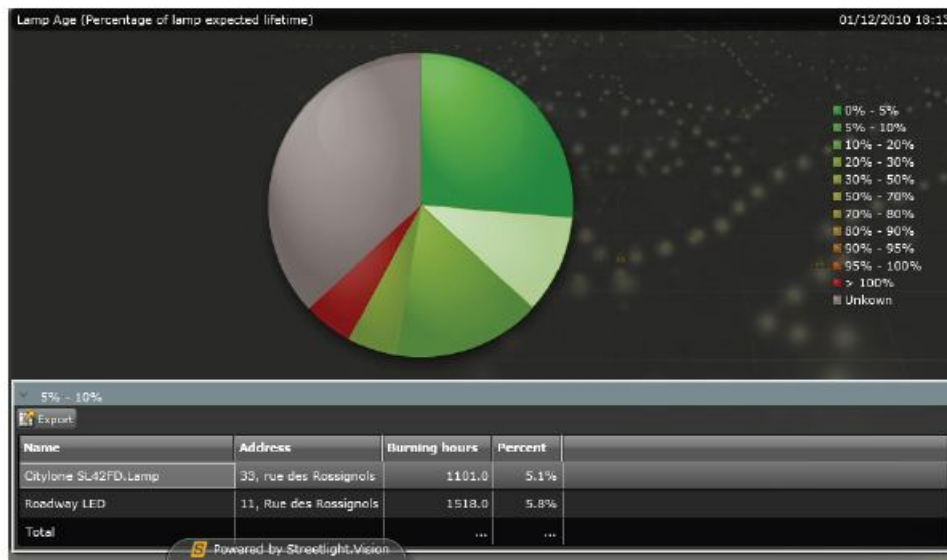
Nota – Each slice of the pie chart represents the list of Light Points which percentage of expected lifetime is comprised between the slice limits. The percentage of expected lifetime is measured by comparing the number of running hours measured by the OLC that drives this



light point to the expected lamp lifetime as mentioned in the associated lamp type in the "Equipments" WebApp.

You may also:

4. **Get the number of light points and the percentage of light points** (compared to total number of light point in this geozone) in each slice by mousing over the pie slice.
5. **Display the list of light points in a pie slice** by clicking on the pie slice.
6. **Export the list of light points and other information** from the above table, by clicking on the  **Export** button.



"Lamp lifetime" pie chart a particular geozone

How to display the “Scheduling Manager” WebApp

Action – To display the “Scheduling Manager” WebApp, click on the “Scheduling Manager” selectable rectangle on the desktop.



“Scheduling Manager” rectangle

Nota – The “Scheduling Manager” WebApp does not allow to modify existing schedulers already commissioned on a particular Segment Controller. The WebApp aims at creating new schedulers (from scratch) and then commissioning them into one or several Segment Controllers.

When launching the “Scheduling Manager” WebApp, the WebApp automatically displays the schedulers tab and the schedulers already created on STREETLIGHT.VISION Web Server on the schedulers list on the left of the screen (circled in green below).

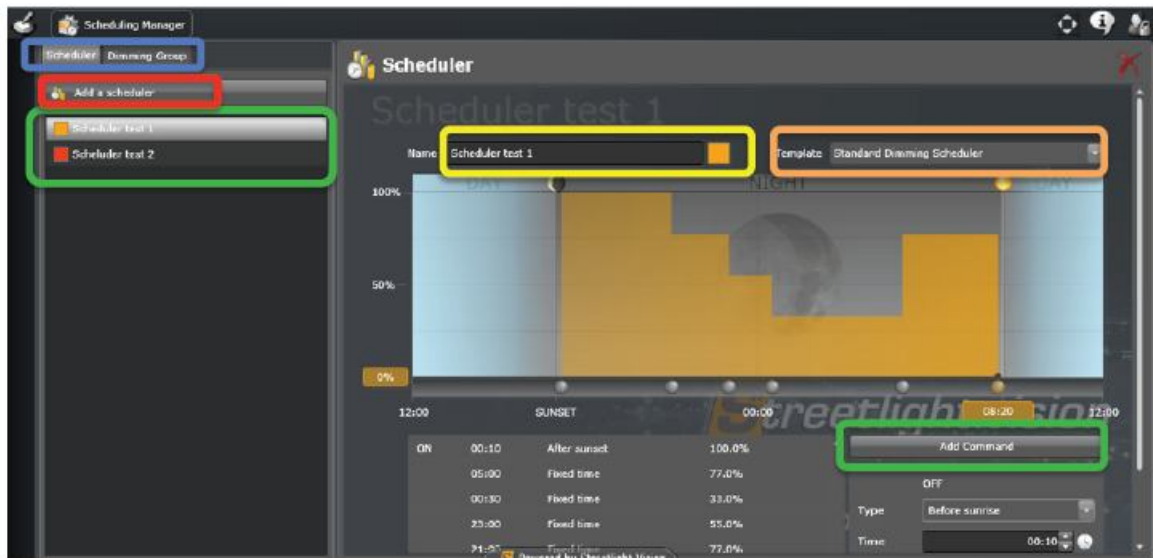
The “Scheduling Manager” provides two different tabs:

- **The Schedulers tab**, allowing the creation and the modification of the schedulers.
- **The Dimming groups tab**, displaying all the devices groups already created in the “Equipments” WebApp, and a calendar on the central part of the screen. Here, you can add schedulers to chosen groups and then commission the corresponding Segment Controllers.

How to create a scheduler

Action – To create a new scheduler:

1. **Click on the “Add scheduler” button** on the top left of the screen (circled in red below)
2. **Enter a name** in the “Name” entry field (circled in yellow below). This name will be displayed in the list of schedulers in the left side of the screen, when saved.
3. **Click on the colored rectangle in front of the name entry field to select a color** to represent your dimming shape (circled in yellow below).
4. **Select a dimming shape template using the scroll bar** (circled in orange below). The template chosen will be the base of the new scheduler.



the "Scheduling Manager" Scheduler tab screen

5. Add some additional specific commands:

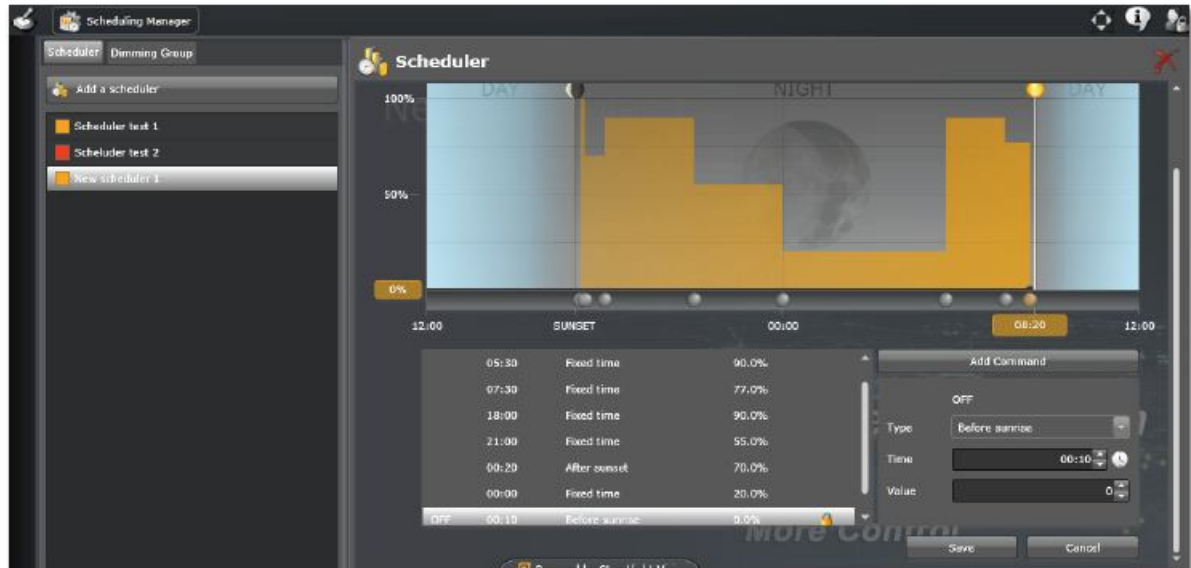
- Click on the "Add command" button (circled in green above).
- Select the command type you'd like to create (fixed time, before sunrise, after sunrise, before sunset, after sunset).
- Edit its properties:
 - Time** (for example, 00:10, meaning 10 minutes after sunrise, before sunset... depending on the type of command chosen)
 - Value** (for example 20, meaning dimming down to 20%)



Adding a specific command to a scheduler

6. Click on the "Create" button (circled in red above).

The new command is displayed at the bottom of the commands list and the scheduler is displayed on the schedulers list.




Scheduler creation

How to modify a scheduler

Action – To modify a scheduler:

1. Click on the scheduler to be modified on the left side of the screen.
2. Change its name in the "Name" entry field.
3. Or delete a specific command.

| | | |
|-----------|----------------|-------|
| 07:30 | Fixed time | 77.0% |
| 18:00 | Fixed time | 90.0% |
| 21:00 | Fixed time | 55.0% |
| 00:20 | After sunset | 70.0% |
| 00:00 | Fixed time | 20.0% |
| OFF 00:10 | Before sunrise | 0.0% |

Nota – If the  icon is displayed on the command line, it means that you can't delete it because it corresponds to the mandatory "ON" or "OFF" commands of the dimming shape. A dimming shape always begins with an "ON" command, and ends with an OFF command.

4. Or modify the properties of a specific command. The Graph on the top of the screen, representing the dimming shape is updated in real-time.

In the example below, we have modified the value (from 0 to 31). A black line is displayed on the graph to represent the modification.



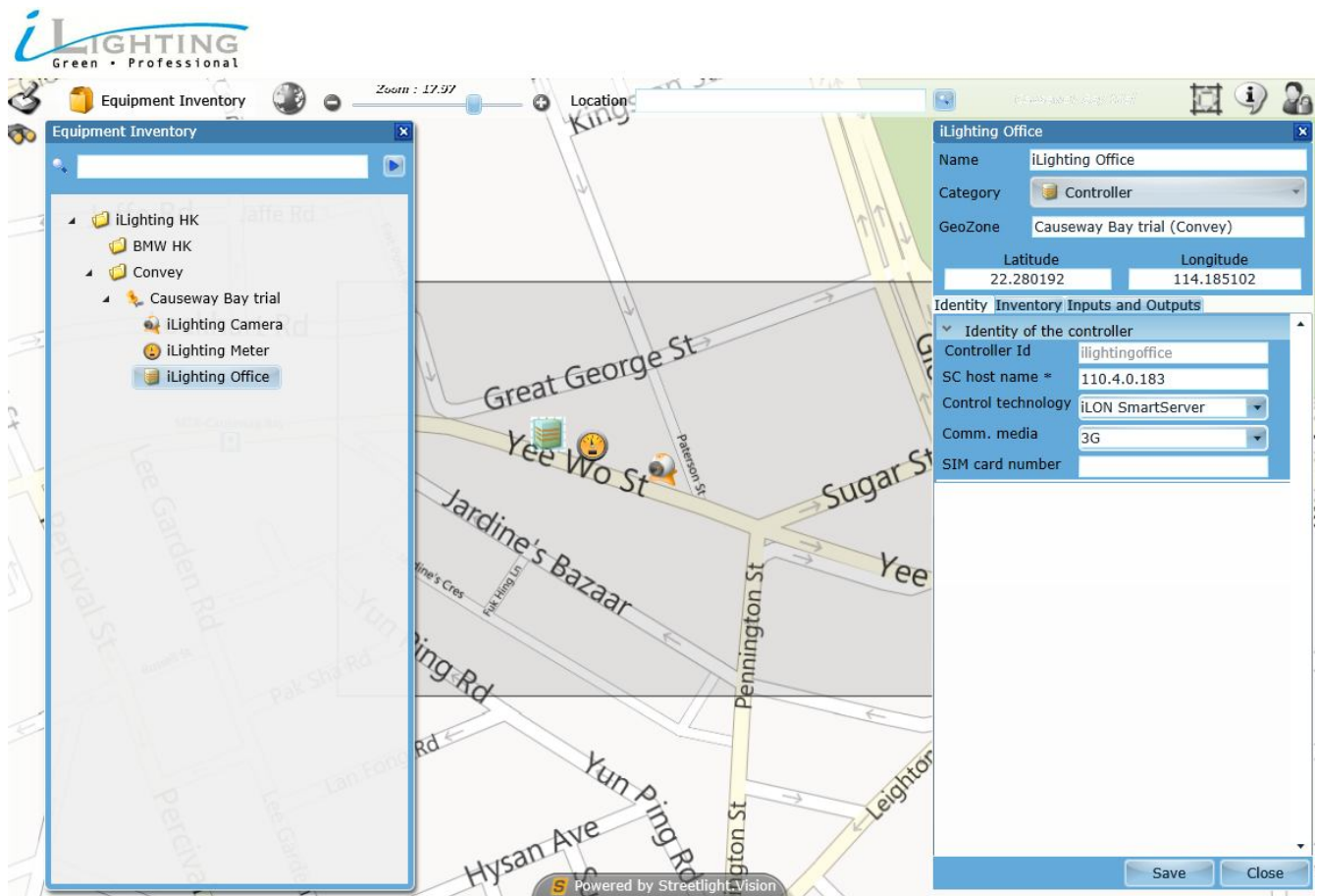
Modifying a command properties

5. Or modify the dimming shape directly in the graph, using the  icons at the bottom of the graph. Each icon represents the beginning of a specific command.

For example, if you move right the last icon on the example below, the command requiring to dim down to 31% will be executed after 8:20. If you move left the first icon, the command requiring to dim up to 100% will be executed earlier.

6. Click on the “Save” button.

Application Data From Causeway Bay Site



Site Location Map

Application Data From Causeway Bay Site

The screenshot shows a software window titled "iLighting Office" with a close button in the top right corner. The form contains the following fields and values:

- Name:** iLighting Office
- Category:** Controller (indicated by a folder icon and a dropdown arrow)
- GeoZone:** Causeway Bay trial (Convey)
- Latitude:** 22.280192
- Longitude:** 114.185102

Below these fields are three tabs: "Identity", "Inventory", and "Inputs and Outputs". The "Identity" tab is selected, showing a section titled "Identity of the controller" with a collapse arrow. This section contains the following fields:

- Controller Id:** ilightingoffice
- SC host name *:** 110.4.0.183
- Control technology:** iLON SmartServer (dropdown menu)
- Comm. media:** 3G (dropdown menu)
- SIM card number:** (empty text field)

Intelligent Smart Server Inventory Detail

Application Data From Causeway Bay Site

The screenshot shows a software window titled "iLighting Meter" with a close button in the top right corner. The form contains the following fields:

- Name:** iLighting Meter
- Category:** Electrical Meter (indicated by a yellow smiley face icon and a dropdown arrow)
- GeoZone:** Causeway Bay trial (Convey)
- Latitude:** 22.280142
- Longitude:** 114.185315

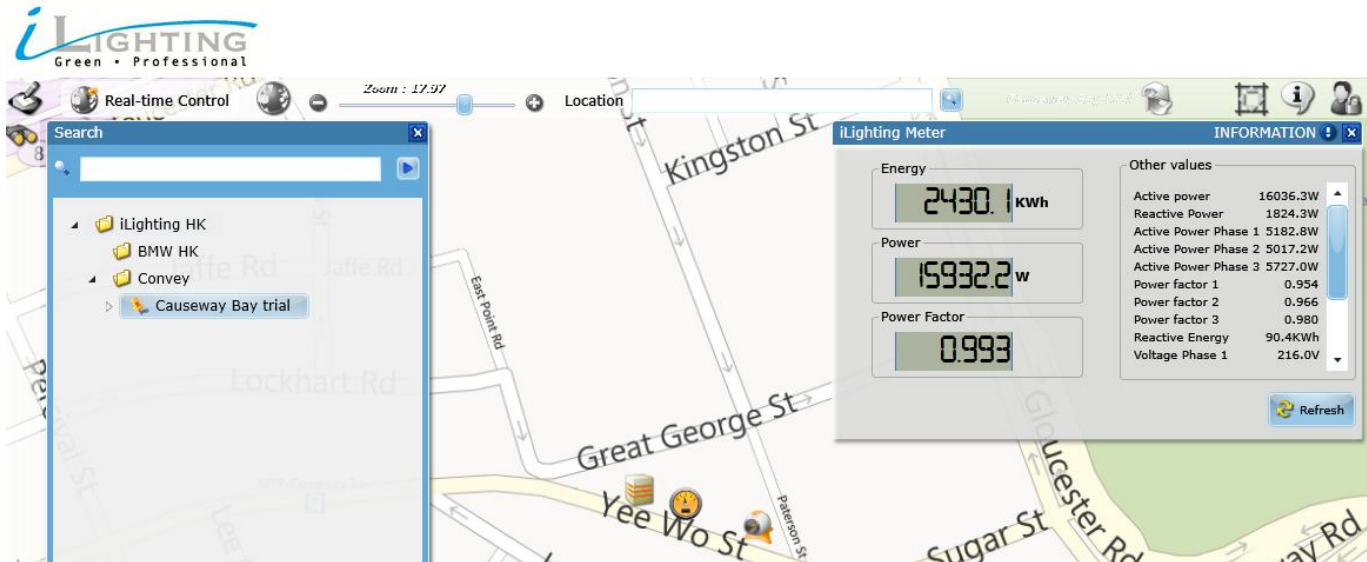
Below these fields are two tabs: "Identity" and "Inventory". The "Inventory" tab is currently selected. Under the "Inventory" tab, there is a section titled "Identity of the energy meter" with a dropdown arrow. This section contains the following fields:

- Controller Id *:** ilightingoffice (dropdown menu)
- Identifier *:** ilightingmeter
- Type of equipemen:** CARLO GAVAZZI Modbu: (dropdown menu)
- Unique address:** 1

Intelligent Meter Inventory Detail

Application Data From Causeway Bay Site

10/6/2013 11:15 pm



Real Time Monitoring Information

Up to 10/6/2013

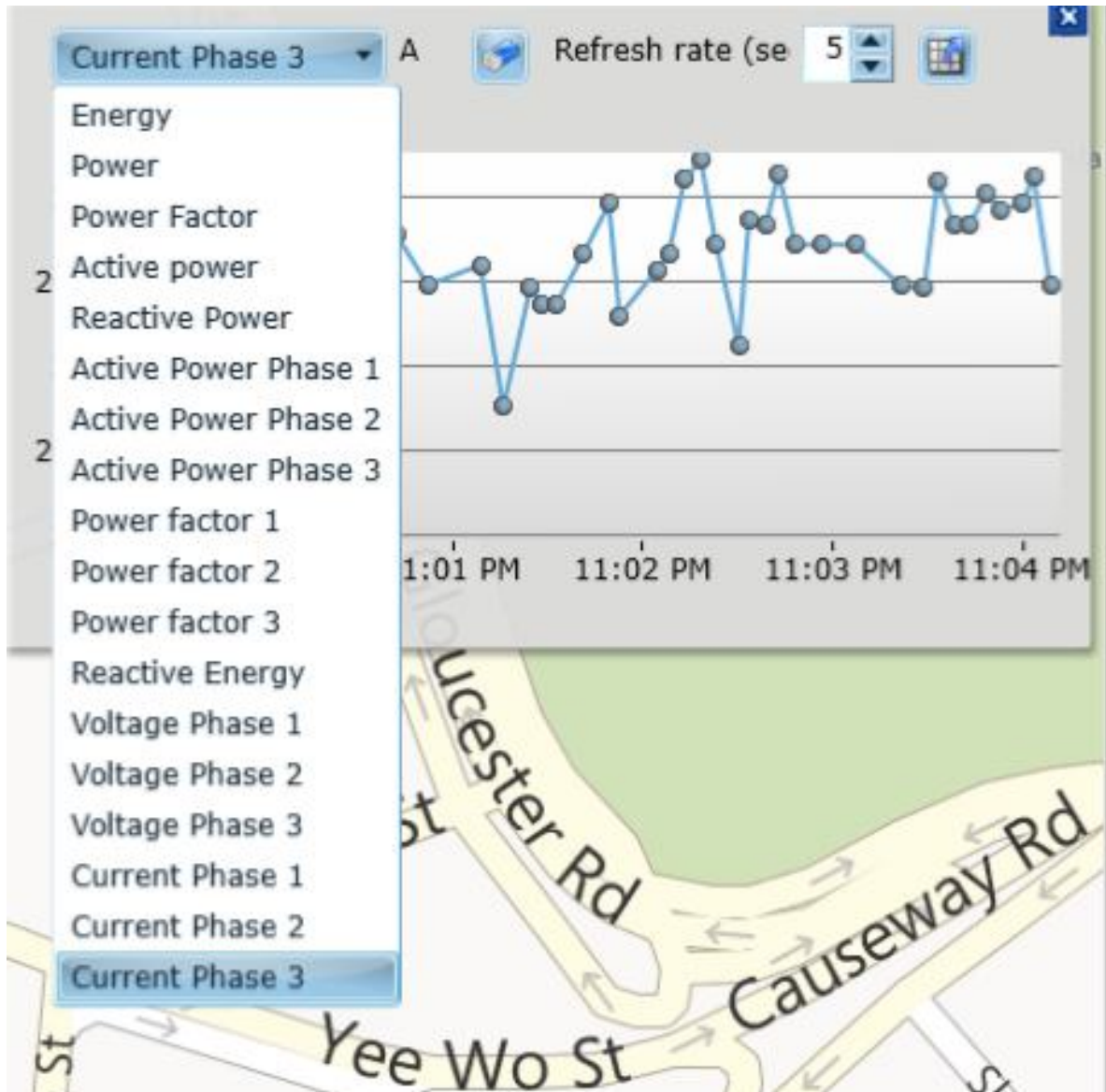
Total energy consumption is 2430 KWh

(Energy charge = 2430KWh x HK\$1.2/KWh = HK\$2916)

Total power consumption is 15.93 KW

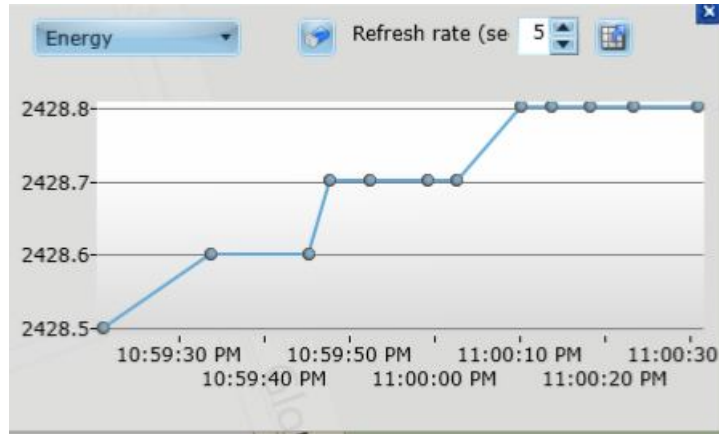
Power Factor is 0.993

Application Data From Causeway Bay Site

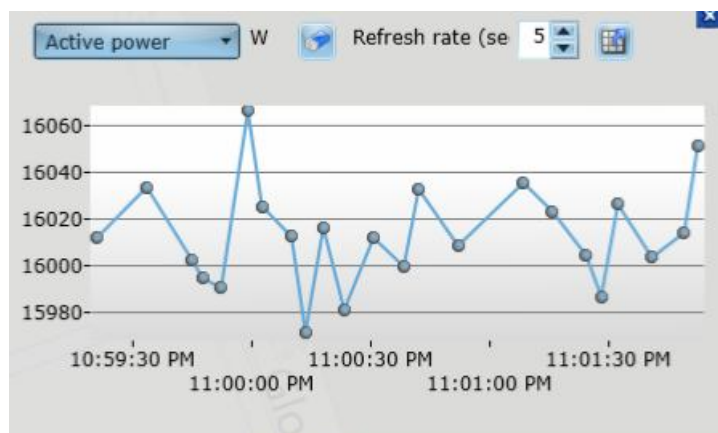


Intelligent Meter Information Selected

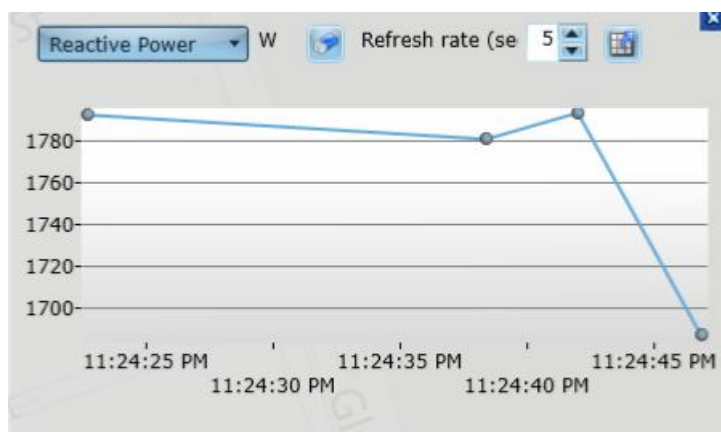
Application Data From Causeway Bay Site



Energy

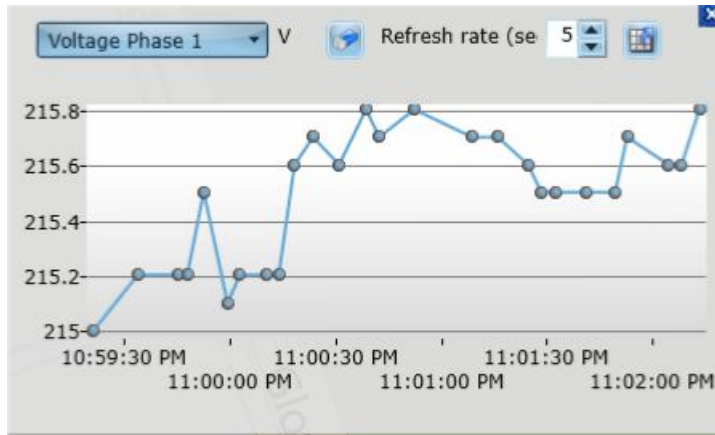


Active Power



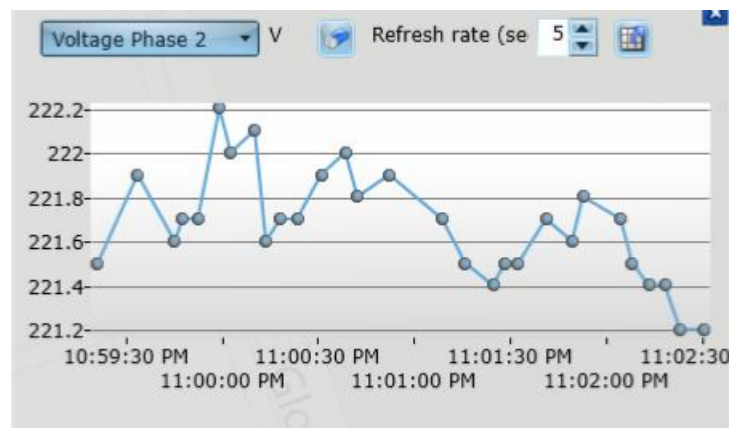
Reactive Power

Application Data From Causeway Bay Site

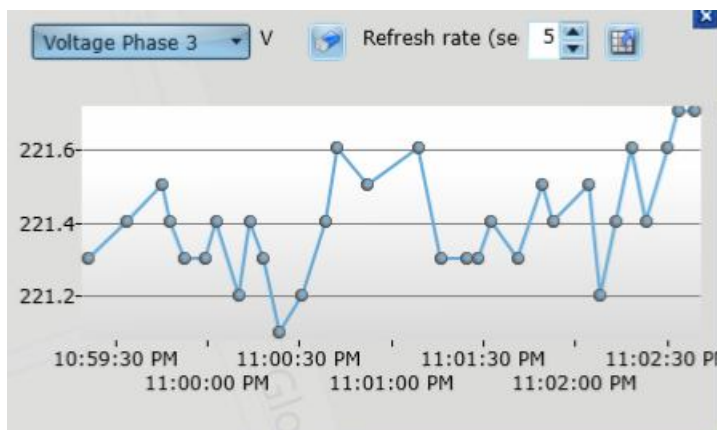


Voltage Phase 1

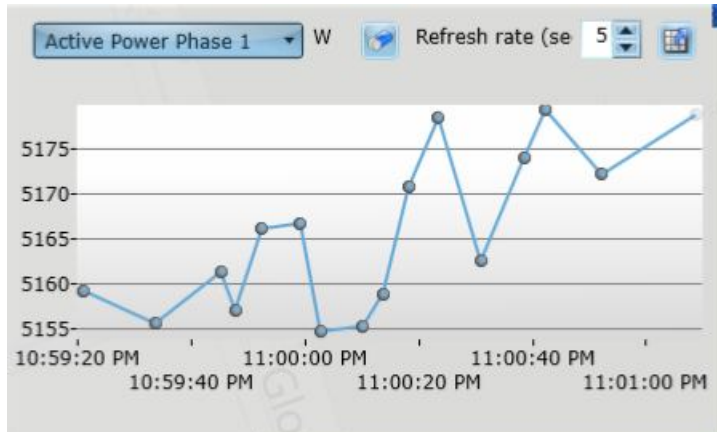
Voltage Phase 2



Voltage Phase 3

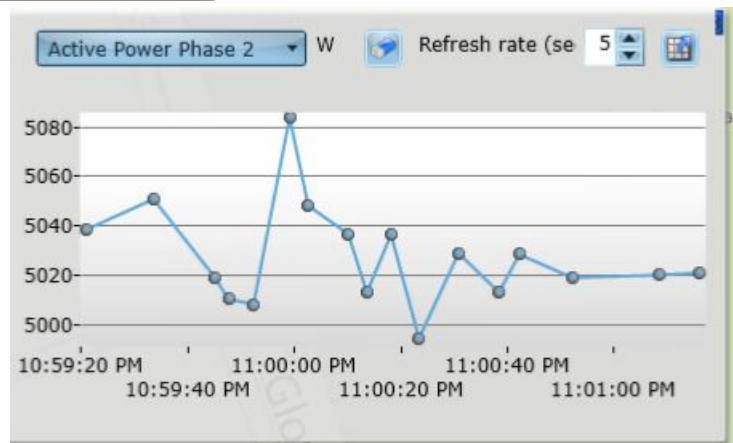


Application Data From Causeway Bay Site

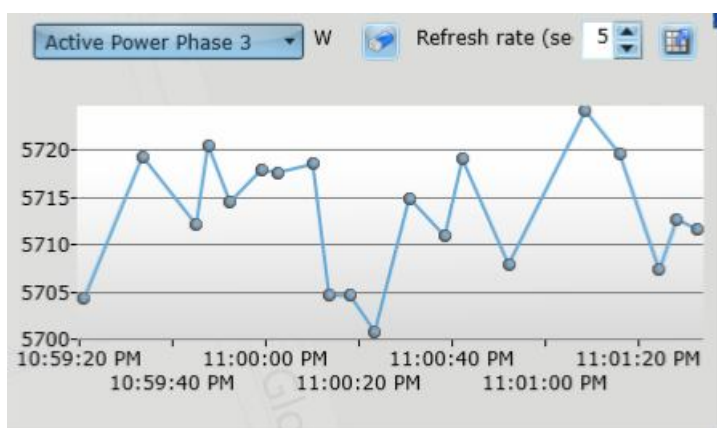


Active Power Phase 1

Active Power Phase 2



Active Power Phase 3



Application Data From Causeway Bay Site



Current Phase 1

Current Phase 2



For any enquiry, please

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852-35863418

Or

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