



# Teldio Edge Gateway

## Configuration Guide

*The Teldio Edge Gateway (TEG) is an integration platform which automatically dispatches alarms/notifications to people and devices by integrating to existing or Teldio provided alarm devices.*

*The TEG operates by making connections to systems and devices via its included Modules and using Behaviors and Dispatch Rules to bridge those Modules together to handle events and generate notifications.*

*This guide will walk you through the basic configuration of your TEG.*

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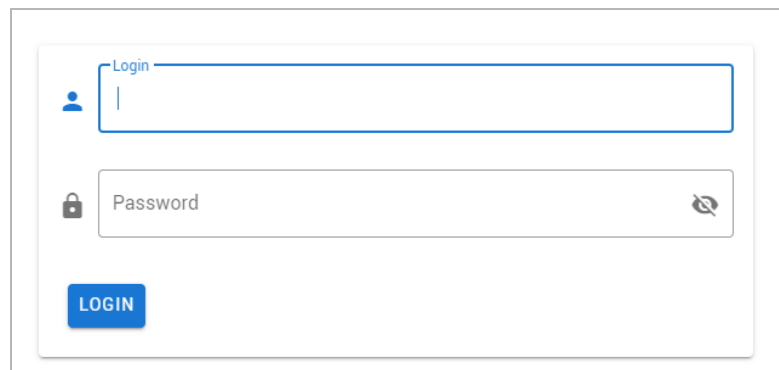
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## Accessing the Teldio Edge Gateway (TEG)

The configuration interface for the TEG is accessed on a web browser via an IP connection to the TEG device. The TEG has a default IP of 192.168.100.250 on the Eth0 port.

Please refer to the [Teldio Edge Gateway - Getting Started Guide](#) for more details on accessing the Gateway via a web browser

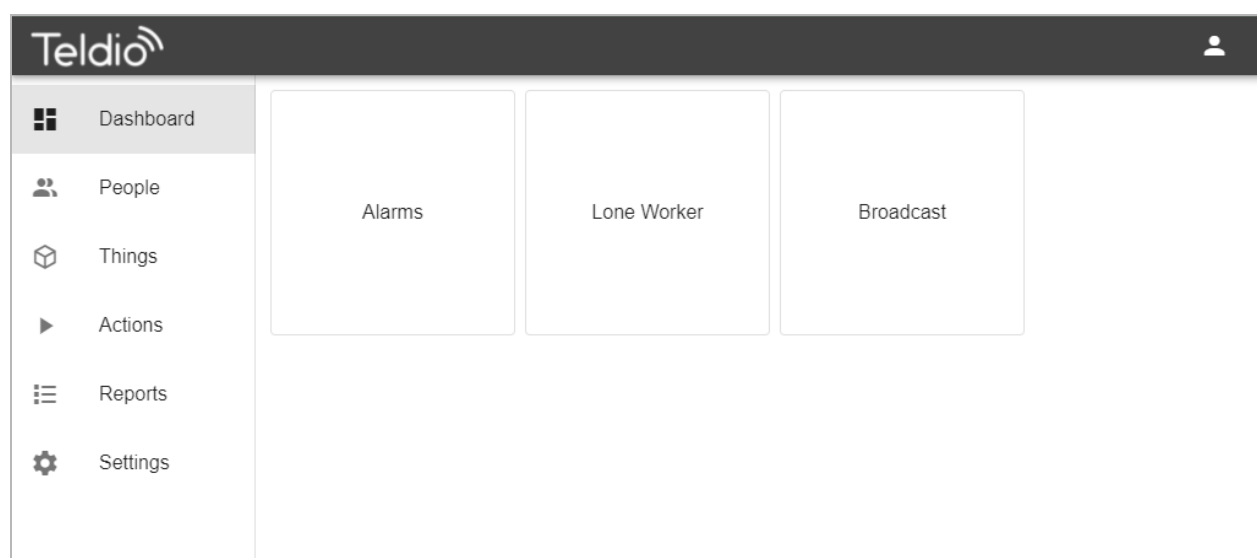
Open a web browser and go to <http://192.168.100.250> which will take you to the login page.



The login form is contained within a light gray border. It features a 'Login' label above a text input field with a blue border and a user icon. Below this is a 'Password' label above a text input field with a gray border, a lock icon, and a toggle eye icon. A blue 'LOGIN' button is positioned at the bottom left of the form area.

Log in to the Gateway using the credentials provided with the Teldio Edge Gateway package. If you do not have the login credentials, please contact [support@teldio.com](mailto:support@teldio.com) to obtain the details.

Once you have logged in, it will direct you to the Teldio Edge Gateway home page.



## Changing the IP address

You will need to change the IP of the Gateway's Ethernet port(s) to be able to access it at a customer site and in some cases, to allow the Gateway to communicate with other systems.

Unless required for integration purposes, Teldio recommends that Eth0 is left at its default IP of 192.168.100.250 and only Eth1 is changed to be on the customer Network.

Follow the steps below to change the IP address.

1. Click on '**Settings**' on the Gateway menu
2. On the menu on the Settings page, click on '**Network**'
3. Go to the '**Ethernet 1**' section and change the drop down value to **Fixed**
4. Enter in the IP address, Netmask and Gateway IP information.
5. Add the applicable DNS settings and remove any that are not valid. Enter one DNS entry per line.
6. Click on '**Save**'

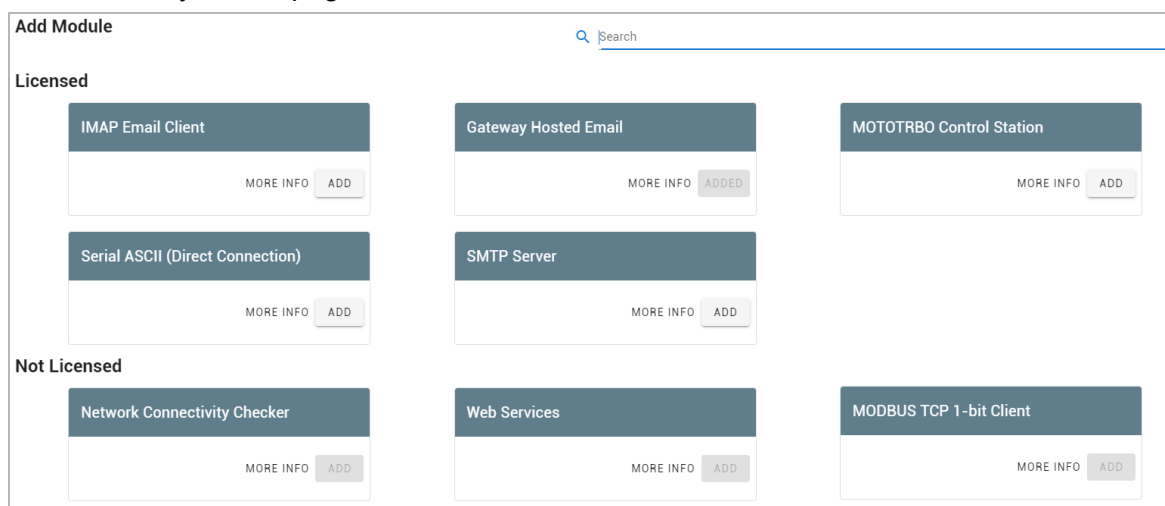
## Modules

Modules are where devices/protocols to which the Gateway integrates are configured. The Modules allow the Gateway to communicate with the devices/protocols to facilitate the parsing and flow of information.

Follow the steps below to create and manage Modules.

### Adding a Module

1. Click on '**Settings**' on the Gateway menu
2. On the menu on the Settings page, click on '**Add Module**'
3. This will take you to a page that shows all available Modules.



The screenshot shows the 'Add Module' page with a search bar at the top right. The page is organized into two main sections: 'Licensed' and 'Not Licensed'. Each section contains a grid of module cards. Each card has a title, a 'MORE INFO' link, and an 'ADD' button. The 'Licensed' section includes IMAP Email Client, Gateway Hosted Email, MOTOTRBO Control Station, Serial ASCII (Direct Connection), and SMTP Server. The 'Not Licensed' section includes Network Connectivity Checker, Web Services, and MODBUS TCP 1-bit Client.

4. To add a Module, click on the '**Add**' button on the Module and then enter in the fields.

*Example:*

*In this scenario, a SMTP Module is being created to listen to events from a BMS. It will listen for any emails that come in to the system on TCP port 2525 and have a size of 500 kb or lower.*

### Configure Module

Name  
BMS - SMTP Server

Listen on TCP port  
2525

Maximum body size (kb)  
500

Server name  
Teldio Gateway - SMTP Server

- Press **'Save'**.

Once you add a Module, they will show up on the main menu in the 'Modules' section. If applicable, an icon to the right of the Module Name will display the Module's connection status.

Fire Panel	
Gateway Hosted Email	
MOTOTRBO Control Station	✗
TCP Client	✗
Teldio Twilio	✓

Please see **Modules - Detailed Information** section of this document for information on the configuration fields of each Module.

## Editing a Module

- Click on **'Settings'** on the Gateway menu
- On the menu on the Settings page, click on any existing Modules
- Make any changes as necessary and press **'Save'**

## Deleting a Module

1. Click on '**Settings**' on the Gateway menu
2. On the menu on the Settings page, click on any existing Modules
3. Click on '**Delete Module**' on the top right. Please note that deleting any Modules used in the Behaviors section will cause the Behavior to stop working.



## Behaviors

The Behaviors allow for the bridging of different TEG Modules to react to event triggers and perform related actions.

Follow the steps below to create and manage Behaviors.

### Adding a Behavior

1. Click on '**Actions**' on the Gateway menu
2. If not already selected, click on the '**Behaviors**' menu tab at the top.
3. Click on '**New Behavior Group**' and add a name. Behavior groups are purely for management purposes and do not affect the actual processing of messages
4. Click on '**Add Behavior**'
  - a. Under **Trigger**, select a Module and its associated event which would trigger an action.

*Example:*

*In this scenario, an event is triggered when an email is received in to the SMTP Server Module*

☒ **Trigger**  
Choose the event that will trigger this behavior

Module  
SMTP Server

Event  
Received email

**CONTINUE**

- b. Click on '**Continue**'. A Trigger Module and Event must be selected before continuing.
- c. If applicable, add any Filters to filter certain triggers in or out depending on the content of the received message. The available filter properties and operators will auto adjust depending on the selected Trigger.

*Examples:*

*In this scenario, any emails that have the word 'Fire' in the subject will be processed.*

☒ **Filter**  
Optionally provide conditional logic

Only events that  will trigger the action.

Property  
Subject

Operator  
Contains

Value  
Fire

- d. Once you've added any filtering rules, click on '**Continue**'. It is possible to continue without adding any filtering rules.
- e. Under **Action**, select the Module that should handle the action that is triggered by the initial event.

*Example:*

*In this scenario, the action is to send a Text Message via the MOTOTRBO control station.*


**Action**  
Choose the action to take

Module

MOTOTRBO Control Station


Event

Send a text message

- f. Click on '**Continue**'. An Action Module and Event must be selected before continuing.
- g. Fill out the fields under **Configure Action** to configure the output destination and content. Contents of the message will be shown under the Action form as clickable entries and can be clicked to be inserted to the outbound message. The Action properties and the available alarm content will change depending on the selected Trigger and Action Module.

*Example:*

*In this scenario, the message will go to Radio Group 100. The message will include the subject of the email as the Text Message subject and the Text message content will be the body of the email and the 'from' email address.*


**Configure Action**  
Configure the fields for the action

Set **Ident** to:

G100

Set **Text message subject** to:

{{topic}}

Set **Text message** to:

{{payload}}

from: {{email-from}}

Data from Trigger

Click to enter into current field

Body HTML

Body text

From email

Remote address


Subject

To email

To email 'user'

To email full name

- h. Click **'Save'**. This will create the Behavior and provide a summary.

BMS Alarms 

DELETE GROUP ADD BEHAVIOR

When Received email from SMTP Server  
 If Subject Contains "Fire"  
 Then Send a text message via MOTOTRBO Control Station

Ident	G100
Text message subject	{{topic}}
Text message	{{payload}} From: {{email-from}}

DELETE
DUPLICATE
EDIT

Please see **Modules - Detailed Information** section of this document for information on available Trigger and Action events of each Module.

## Editing a Behavior

1. Click on **'Actions'** on the Gateway menu
2. If not already selected, click on the **'Behaviors'** menu tab at the top.
3. Click on **'Edit'** below any Behavior to Edit the Behavior and make changes as necessary
4. Click **'Save'**.

## Deleting a Behavior

1. Click on **'Actions'** on the Gateway menu
2. If not already selected, click on the **'Behaviors'** menu tab at the top.
3. Click on **'Delete'** below any Behavior to Delete that particular Behavior.
4. Click on **'Delete Group'** next to the Behavior Group name to delete the entire Behavior Group.

## Duplicating a Behavior

1. Click on **'Actions'** on the Gateway menu
2. If not already selected, click on the **'Behaviors'** menu tab at the top.
3. Click on **'Duplicate'** below any existing Behavior to make a copy of it. The copy will be added to the bottom of the Behavior list. Go to that Behavior and click 'Edit' to make any changes.

## Disabling a Behavior

1. Click on **'Actions'** on the Gateway menu
2. If not already selected, click on the **'Behaviors'** menu tab at the top.
3. Click on **'Disable'** below any existing Behavior to temporarily disable the Behavior. To re-enable it, press **'Enable'**.

## Dispatch Rules

In the TEG, Dispatch Rules can be used along with Behaviors to send alerts to multiple contacts and devices using Radios and email or SMS capable devices.

Follow the steps below to create and manage Dispatch Rules.

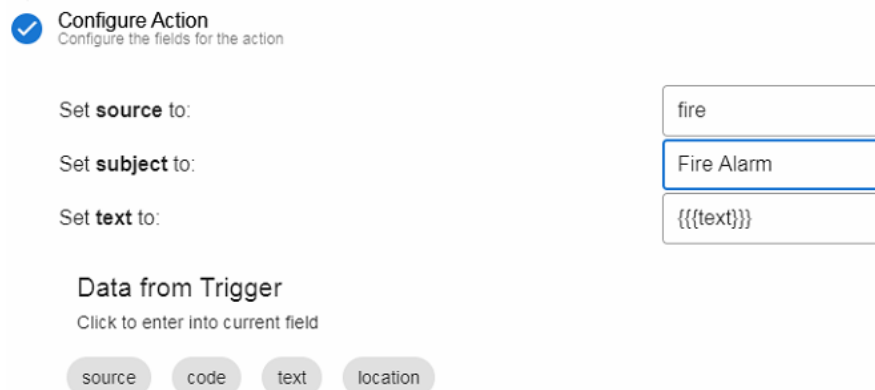
*You can also send alarms to the Alarm Dashboard and use that as the Alarm Trigger for many other types of outputs, including Radios, email and SMS. See the 'Alarm Dashboard' section for more information.*

### Setting up a Behavior to output to a Dispatch Rule

1. Create a Behavior by following the steps in the previous section.
2. In the **Action** section:
  - a. Select '**Teldio Events**' as the Module.
  - b. Select '**dispatch**' as the Event.



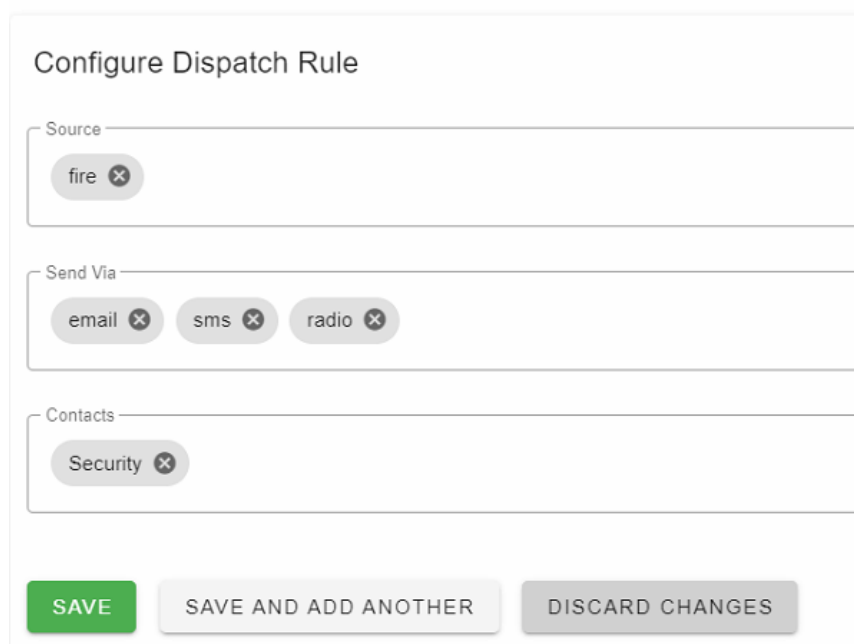
3. In the **Configure Action** section:
  - a. Set the 'source' to be your intended dispatch rule name. This can be manually set or derived from the available properties
  - b. Set the Subject and the Text to be the content of the alarms that you would like sent as a Radio Text, Email or SMS message.



4. Press '**Save**'.

## Adding a Dispatch Rule

1. Click on '**Actions**' on the Gateway menu
2. Click on the '**Dispatch Rules**' menu tab at the top.
3. Click on '**New Dispatch Rule**'
4. Set up your Dispatch Rule as below:
  - a. **Source:** Type in the name you assigned for the Dispatch rule.
  - b. **Send via:** From the drop down menu, select the desired dispatch methods.
  - c. **Contacts:** Select individual contacts and/or Contact groups from the drop down.



Configure Dispatch Rule

Source

fire

Send Via

email sms radio

Contacts

Security

SAVE SAVE AND ADD ANOTHER DISCARD CHANGES

5. Press '**Save**'.

## Editing a Dispatch Rule

1. Click on '**Actions**' on the Gateway menu
2. Click on the '**Dispatch Rules**' menu tab at the top.
3. Click on the Edit icon next to any Dispatch Rule and make changes as necessary
4. Click '**Save**'.

## Deleting a Dispatch Rule

1. Click on '**Actions**' on the Gateway menu
2. Click on the '**Dispatch Rules**' menu tab at the top.
3. Click on the Delete icon next to any Dispatch Rule to delete that particular Dispatch Rule.

## Contacts

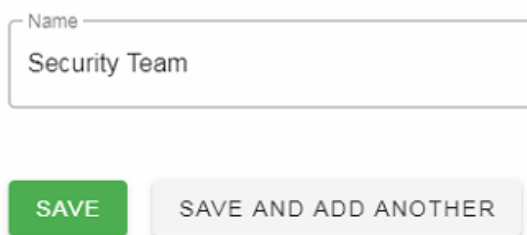
Email, SMS and Radio Contacts can be set up on the Teldio Edge Gateway to be utilized in its applications and integrations. These contacts can also be grouped as Contact Groups to be utilized as a collective recipient list.

Follow the steps below to create and manage Contacts and Contact Groups. Ideally Contact groups are created before creating Contacts. Contact Groups can be thought of as different groups of alarm recipients.

### Adding a Contact Group

1. Click on '**People**' on the Gateway menu
2. Click on the '**Groups**' menu tab at the top.
3. Click on '**New Contact Group**'.
4. Enter the name for the Contact Group.

#### Configure Contact Group



5. Press '**Save**'.

### Editing a Contact Group

1. Click on '**People**' on the Gateway menu
2. Click on the '**Groups**' menu tab at the top.
3. Click on the Edit icon next to any Contact Group and make changes as necessary
4. Click '**Save**'.

### Deleting a Contact Group

1. Click on '**People**' on the Gateway menu
2. Click on the '**Groups**' menu tab at the top.
3. Click on the Delete icon next to any Contact Group to delete that group. Associated contacts will not be deleted.
4. Click '**Save**'.

## Adding a Contact

1. Click on '**People**' on the Gateway menu
2. If not already selected, click on the '**Contacts**' menu tab at the top.
3. Click on '**New Contact**'.
4. Set up the contact as listed below. Please note that certain fields will only show if you have the associated module enabled in your TEG instance.
  - Name: Enter the Contact's Full Name
  - Email: Enter the Contact's Email
  - Phone: Enter the Contact's SMS number.
  - Sign In Code: Enter the Contact's radio's unique sign in Code.\*
  - Radio ID: Enter the Contact's numerical radio ID.\*
  - Radio Group ID: Enter the Contact's numerical Group ID.\*
  - Contact Groups: From the drop down, select one or more Contact Groups.
5. Press '**Save**'

\* For Motorola Radios only. Only one of the 3 values can be filled in per contact.

## Editing a Contact

1. Click on '**People**' on the Gateway menu
2. If not already selected, click on the '**Contacts**' menu tab at the top.
3. Click on the Edit icon next to any Contact and make changes as necessary
4. Click '**Save**'.

## Deleting a Contact

1. Click on '**People**' on the Gateway menu
2. If not already selected, click on the '**Contacts**' menu tab at the top.
3. Click on the Delete icon next to any Contact to delete that Contact.
4. Click '**Save**'.

## Importing Contacts

If there is a large number of Contacts in a system, they can be imported in bulk via a CSV file. The first line in your csv should be as follows:

```
id,name,email,phone,radio_id,radio_group_id,sign_in_code,lw_authorized
```

New contacts must have an empty 'id' value.

1. Click on '**People**' on the Gateway menu
2. If not already selected, click on the '**Contacts**' menu tab at the top.
3. Click on '**Import**' and Select the prepared CSV file.

## Updating Contacts

If updating contacts in bulk:

1. Click on '**People**' on the Gateway menu
2. If not already selected, click on the '**Contacts**' menu tab at the top.
3. Click on '**Export**' and save the file that will download.
4. Make the changes in that Contacts.csv file
  - Do NOT change the 'id' field for any existing contact that you want to change
  - If adding new contacts, add them with a blank 'id' field.
5. Click on '**Import**' and Select the updated CSV file.



## Accounts

The Teldio Edge Gateway comes with a built-in Administrator account that gives you access to all the functionalities of the Gateway. The Gateway includes two other user roles which can be assigned to users that may need to access the Gateway. The Administrator user can create accounts for other users under these roles.

The Roles Are:

- **Administrator:** Has access to everything including all management functions.
- **Operator:** Has access to manage day-to-day operations. Cannot access anything under Gateway Settings.
- **User:** Has access to view all dashboards and reports. Cannot change any data.

Follow the steps below to create and manage User Accounts.

### Creating an Account

1. Click on '**People**' on the Gateway menu
2. Click on the '**Accounts**' menu tab at the top.
3. Click on '**New Account**'
4. Set up the Account as listed below:
  - Name: Enter the name of the account holder
  - Login: Enter a username for the account.
  - Password: Use the suggested password, or enter in a password for the user
  - Role: Select one of the 3 roles.
5. Press 'Save'.

The newly created users will now be able to login to the Teldio Edge Gateway via the main login screen.

### Editing an Account

1. Click on '**People**' on the Gateway menu
2. Click on the '**Accounts**' menu tab at the top.
3. Click on the Edit icon next to any Account and make changes as necessary. Please note that the login name cannot be changed.
4. Click '**Save**'.

### Deleting an Account

1. Click on '**People**' on the Gateway menu
2. Click on the '**Accounts**' menu tab at the top.
3. Click on the Delete Icon next to any Account to delete the Account.
4. Click '**Save**'.

## Alarm Dashboard

Users can set up the TEG to show active incidents on an Alarm Dashboard and use new alarms on the dashboard and their status to initiate other events. The dashboard highlights new alarms and can be set up to auto update.

Follow the steps below to set up the Alarms Dashboard.

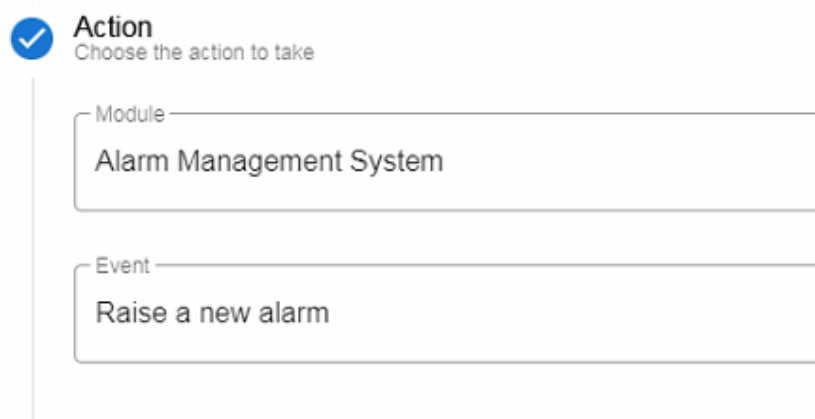
Please see **Modules - Detailed Information** section of this document for information on available Trigger and Action events of each Module, including the Teldio Events Module.

### Creating the Alarms Application

1. Click on '**Settings**' on the Gateway menu
2. Underneath the 'Applications' section, click on '**Add Application**'
3. Click on the 'ADD' button on the 'Alarm Management System' section
4. Click '**Save**'.

### Sending Alarms to the Alarms Dashboard

1. Follow the steps in the Behaviors and Modules - Detailed Information sections to create a Behavior with a Trigger
2. For the Action, select:
  - Module: Alarm Management System
  - Event: Raise a new alarm



**Action**  
Choose the action to take

Module  
Alarm Management System

Event  
Raise a new alarm

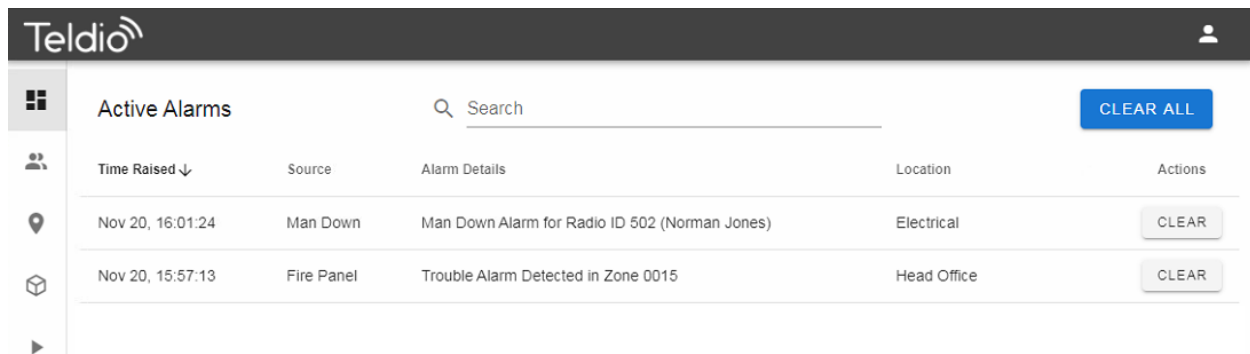
3. For the Configure Action:
  - Set the Source, Code, Text and Location manually or choose from the available alarm properties that will appear below the fields.
  - Under Set Audio, choose 'Alarm Text Field' if you would like the Dashboard to read out new alarms. This feature requires the Text to Speech module.

## Using Alarms on the Dashboard to send out alarms

1. Create a Behavior
2. In the **Action** section:
  - a. Select '**Alarm Management System**' as the Module.
  - b. Select '**Alarm Triggered or Updated**' as the Event.
3. In the **Configure Action** section setup the output module which you would like to Trigger upon the raising of that new alarm.

## Accessing the Alarm Dashboard

1. Click on 'Dashboard' on the Gateway menu.
2. Click on 'Alarms'



The screenshot shows the Teldio Alarm Dashboard. At the top, there's a header with the Teldio logo and a user profile icon. Below the header, there's a sidebar with icons for various functions. The main content area is titled 'Active Alarms' and includes a search bar and a 'CLEAR ALL' button. The table below lists active alarms with columns for Time Raised, Source, Alarm Details, Location, and Actions.

Time Raised ↓	Source	Alarm Details	Location	Actions
Nov 20, 16:01:24	Man Down	Man Down Alarm for Radio ID 502 (Norman Jones)	Electrical	<button>CLEAR</button>
Nov 20, 15:57:13	Fire Panel	Trouble Alarm Detected in Zone 0015	Head Office	<button>CLEAR</button>

## Alarm Dashboard Settings

1. Click on '**Settings**' on the Gateway menu
2. Underneath the '**Applications**' section, click on **Alarm Management System**

### Alarm Status Codes

- If you want to set up your alarms so that users can acknowledge them or you can escalate the alarms, you can use Alarm Status Codes. Please contact Teldio Support to set up this feature

### Web Dashboard Text-to-Speech

- Set the 'Max TTS Repeat' values to the maximum number of times the Alarm text-to-speech audio will repeat before automatically being silenced.

## Modules - Detailed information

The Modules in the Teldio Edge Gateway are the starting point of setting up your integrations. The following sections cover how you can create and use the most commonly used Modules of the Teldio Edge Gateway.

Each Module section outlines:

- **Description** of the module
- Information on the **Type** of Module (Input and/or Output) and if multiple modules can be set up.
- The applicable Module creation **properties** with some recommended/required values.
- The applicable **Triggers** and **Actions** for each module when it is used in Behaviors

**Please note that only the applicable Properties, Triggers and Actions are listed per section.**

### MOTOTRBO Control Station

**Description:** This module is used for receiving and sending MotoTRBO Text and Audio messages

**Module Type:** Input and Output. 2 instances.

#### Module Properties

- **Name:** <name of the Module>
- **Radio IP address:** <IP address of the Radio>
- **CAI Prefix:** 12 <change if necessary>
- **Wait for ACK Interval (seconds):** <How long to wait for an acknowledgement from a receiving radio. Leave at default or set to 10>

#### Module use in Behaviors

- Valid **Triggers**:
  - Emergency
  - Receive Text Message
  - System Offline
- Valid **Actions**:
  - Send a Text Message
    - If sending to an individual radio, enter ID in the Ident field.
    - If sending to a radio group, enter G then the ID of the group in the Ident field (Ex: G100 to send to group ID 100).
  - Revive
  - Set Zone/Channel
  - Stun

## SMTP Server

**Description:** This module is used for receiving emails via an SMTP relay over the Local Area Network

**Usage:** Input. Unlimited instances.

### Module Properties

- **Name:** <name of the Module>
- **Listen on TCP Port:** <the port on which the Gateway listens for emails>
- **Maximum body size (kb):** <maximum size of the email - leave as default>
- **Server Name:** <name of server - leave as default>

### Module use in Behaviors

- Valid **Triggers:**
  - Received Email
- Valid **Actions:**
  - N/A

## IMAP Email Client

**Description:** This module is used for receiving emails via a hosted IMAP server over an Internet connection.

**Usage:** Input. Unlimited instances.

### Module Properties

- **Name:** <name of the Module>
- **Server/Host:** <IMAP Server URL>
- **Server Port (TLS):** <IMAP Port>
- **UserName:** <Email username>
- **Password:** <Email password>
- **Methodology:** <**Required:** Set to 'Processed by Received Timestamp'>
- **Poll Interval (secs):** <how often to check email. **Recommended:** Set to 10>
- **Folder to Scan:** <which folder to scan for email. **Recommended:** leave as INBOX>

### Module use in Behaviors

- Valid **Triggers:**
  - Received Email
  - System Offline
  - System Online
- Valid **Actions:**
  - N/A

## Outbound SMTP

**Description:** This module is used for sending emails via a customer's SMTP server. May require an Internet connection depending on the SMTP Server set up

**Usage:** Output. Unlimited instances.

### Module Properties

- **Name:** <name of the Module>
- **Host Server URL:** <SMTP Server>
- **Port:** <SMTP port>
- **Login:** <SMTP Login, if applicable>
- **Password:** <SMTP Password, if applicable>
- **From:** <The email address from which to send email>
- **Security:** <The security level with which to access the account. **Recommended:** start with 'Automatic' and change to Relax or Strict if necessary>

### Module use in Behaviors

- Valid **Triggers:**
  - N/A
- Valid **Actions:**
  - Send an Email

## Gateway Hosted Email

**Description:** This module is used for sending emails from a hosted email service handled by the TEG over an Internet connection. Only recommended for demos and staging.

**Usage:** Output. 1 instance.

### Module Properties

- **Name:** <name of the Module>

### Module use in Behaviors

- Valid **Triggers:**
  - N/A
- Valid **Actions:**
  - Send an Email

## SMS

**Description:** This module is used for sending and receiving SMS text messages via a Twilio account. An Internet connection and a Twilio account is required. [Twilio Setup Instructions](#)

**Usage:** Input and Output. Unlimited Instances.

### Module Properties

- **Name:** <name of the Module>
- **Account SID:** <Twilio Account SID>
- **Auth Token:** <Twilio Authentication Token>
- **From:** <The cell phone number from which the messages should be sent>

### Module use in Behaviors

- Valid **Triggers:**
  - Receive text Message
  - Online
  - Offline
- Valid **Actions:**
  - Send a Text Message

## USB SMS Gateway

**Description:** This module is used for sending and receiving SMS text messages via a SIM card installed on a Teldio provided USB Gateway. The SIM card is provided by the customer and must have a valid SMS plan with a GSM carrier (AT&T/T-Mobile/Rogers).

**Usage:** Input and Output. 1 Instance.

### Module Properties

- **Name:** <name of the Module>

### Module use in Behaviors

- Valid **Triggers:**
  - Receive Text Message
- Valid **Actions:**
  - Send a Text Message

## Serial ASCII (Direct Connection)

**Description:** This module is used for receiving and sending Serial ASCII data via a direct connection to the TEG's RS-232 port, or its USB port via a Serial to USB cable.

**Usage:** Input and Output. 2 Instances.

### Module Properties

- **Name:** <name of the Module>
- **Serial Port:** <port connection method. **Choose RS232 Port if connected to the TEG's Serial ASCII port. Choose USB Serial 0 if connected to the USB port.**>
- **Baud:** <connection information>
- **Data Bit:** <connection information>
- **Parity:** <connection information>
- **Stop Bit:** <connection information>

### Module use in Behaviors

- Valid **Triggers:**
  - Raw Data
- Valid **Actions:**
  - Raw Data

## TCP Client

**Description:** This module is used for dual purposes:

- Receiving and sending data to the Teldio provided Moxa NPort device to communicate with Serial ASCII data over IP. Configuration guide: [Moxa NPort Configuration](#)
- Receive TCP IP data over a network from alarm panels.

**Usage:** Input and Output. Unlimited Instances.

### Module Properties

- **Name:** <name of the Module>
- **Connect to TCP Port:** <TCP Port. **For Moxa NPort connections:** Set this to **4001**>
- **Host (IP or URL):** <IP to which the Client should bind. **For Moxa NPort connections:** Set this to the IP of the Moxa NPort>

### Module use in Behaviors

- Valid **Triggers:**
  - Raw Data
  - System Offline
  - System Online
- Valid **Actions:**
  - Raw Data



## MODBUS TCP 1-bit/16-bit Client

**Description:** This module is used for dual purposes:

- Receiving and sending data to the Teldio provided Moxa E2210 device to communicate with contact closures over IP. Only the Modbus TCP 1-bit client should be used for this purpose. Configuration Guide: [Moxa E2210 Configuration](#)
- Receive Modbus data over IP from alarm panels. Depending on the alarm panel, either the 1-bit or 16-bit client can be used.

**Usage:** Input and Output. Unlimited Instances.

### Module Properties

- **Name:** <name of the Module>
- **Host IP or URL:** <IP of Host Device>
- **Mode:** <**For Moxa E2210 connections:** set at 'Read status 1-bit registers. **For Modbus alarm connections:** set the applicable mode>
- **Send Values on Startup:** <select if values should be sent on startup. **Recommended:** None>
- **Port:** <The port on which to listen for messages. **For Moxa E2210 connections:** Leave at 502>
- **Slave ID:** <**For Moxa E2210 connections:** leave at 0. **For Modbus alarm connections:** set the applicable ID>
- **Starting Register:** <Set starting register number. **For Moxa E2210 connections:** only applicable for alarm inputs. Corresponds to Digital Input (DI) number. **For Modbus alarm connections:** set the applicable starting register.>
- **Register Names:** <Enter Alarm Text mapped to each register, one line per alarm. Starting Register value determines Alarm order>
- **Polling Interval (milliseconds):** <how often to poll for alarms>

### Module use in Behaviors

- Valid **Triggers:**
  - Register Changed
  - Register Cleared
  - Register Set
  - System Offline
  - System Online
- Valid **Actions:**
  - Set Output

## Avigilon

**Description:** This module is used for receiving and sending alarm data to/from an instance of Avigilon Control Center. Detailed instructions on setting up the Avigilon integration can be found here: [Avigilon Integration](#)

**Usage:** Input and Output. 1 Instance.

### Module Properties

- **Name:** <name of the Module>
- **The hostname/IP of the ACC Server:** <The IP address of the ACC Server computer>
- **The port of the ACC server:** <leave as 8443>
- **The username of the ACC user account:** <The TEG's ACC username>
- **The password of the ACC user account:** <The TEG's ACC password>
- **Secure Connection:** <check against the secure connection setting of the ACC and change accordingly>

### Module use in Behaviors

- Valid **Triggers:**
  - ACC alarm triggered
- Valid **Actions:**
  - Create or update an alarm

## TruFleet

**Description:** This module is used for receiving and sending location and message data to/from an instance TruFleet. When this connection is set up, the TEG can use TruFleet's radio connection for any radio text messaging.

**Usage:** Input and Output. 1 Instance.

### Module Properties

- **Name:** <name of the Module>
- **Host running TruFleet:** <The IP address of the TruFleet Server computer>
- **Port for the host running TruFleet:** <leave as 7521>
- **Unique Client ID:** <Set to the TruFleet Client ID that is associated with the Gateway>

### Module use in Behaviors

- Valid **Triggers:**
  - Radio Location Update
  - Receive Beacon Report
  - Receive Emergency
  - Receive GeoFence Report
  - Receive GPS Report
  - Receive Text Message

- Valid **Actions**:
  - Raise Emergency
  - Request Radio GPS Update
  - Send Text Message

## Phone Alerts

**Description:** This module is used to automatically call phones with a pre-recorded message in the event of an alarm. Using this module requires the SIP Telephony module and where applicable, the SIP Telephony Client module.

**Usage:** Input and Output. Unlimited instances.

### Module Properties

- **Name:** <name of the Module>
- **Asterisk Module:** <Select the SIP Telephony module through which the calls should be made>
- **Telephone numbers to call:** <List out the numbers that should be called, one per line>
- **Audio File to play:** <Go to the Setting/Files section, and copy the path of the sound file that should be played and paste in the field, but remove the .wav extension>
- **Channeltech/resource prefix:** <If using a custom SIP configuration, change the sip0 portion of the text to be the name of that SIP instance as set up in the SIP Telephony section >
- **Mode:** <Select one of the 3 options depending on how you would like the phone alarms to behave>
- **Repeat Audio Message:** <Enter how many times the audio file should repeat once the phone user picks up the call>
- **Attempts:** <Enter how many times the phone number should be attempted in case of failure to pick up or no acknowledgement>
- **Accept Digit:** <Select a number that will be used as the 'Acknowledgement' of the message or choosed 'Disabled' to turn that option off>
- **Pause between dials (secs):** <Enter how long to wait between calling numbers, in seconds>

### Module use in Behaviors

- Valid **Triggers**:
  - Accepted
  - DTMF Digit
  - Progress
- Valid **Actions**:
  - Start (play default file)
  - Start (play file)
  - Start (text to speech)
  - Cancel

## Network Connectivity Checker

**Description:** This module is used to monitor the connection of a URL at a set interval

**Usage:** Input. Unlimited instances.

### Module Properties

- **Name:** <name of the Module>
- **HTTP(s) to Check:** <URLs to check, one per line>
- **Interval Between Checks (minutes):** <how often to check the URLs. **Recommended:** more than 60 seconds>
- **Timeout (seconds):** <how long to wait for a response>

### Module use in Behaviors

- Valid **Triggers:**
  - Connectivity Offline
  - Connectivity Online
- Valid **Actions:**
  - N/A

## Text to Speech

**Description:** This module is used to read out text and play it on the Alarm Dashboard or be used along with Radio Audio Alerts or Phone Alerts

**Usage:** Output. 1 Instance.

### Module Properties

- **Name:** <name of the Module>
- **Default Engine/Voice:** <Select a voice from the list. **Recommendations:** Nano TTS en-US, Nano TTS en-GB>
- **Speed (%):** <Set the speed in which the text will be read. **Recommended:** 80%>
- **Substitutions:** <set any words that should be substituted. Ex: PTT = Push to Talk>

### Module use in Behaviors

- Valid **Triggers:**
  - N/A
- Valid **Actions:**
  - With Radio Audio Alerts
    - Radio\_audio\_alert\_text\_to\_speech
  - With Phone Alerts
    - Start (text to speech)

## Teldio Events

**Description:** This module is automatically included for usage in Behaviors and allows for a variety of features and options. Please note that only the Teldio Event Triggers and Actions listed below should be used. The actions are listed per applicable integration or feature.

**Usage:** Input and Output.

### Module Properties

- Not Applicable. The Teldio Events module is automatically included with the TEG.

### Module Use in Behaviors

- Feature: Dispatch Rules
  - **Description:** The Dispatch Rules allow you to connect Behaviors with Contacts for alarm dispatch as described in the 'Dispatch Rules' section of this document.
    - Valid **Triggers:**
      - N/A
    - Valid **Actions:**
      - Dispatch
- Integration: Sensors
  - **Description:** For use with Teldio provided Wireless Sensors
    - Valid **Triggers:**
      - ncd\_alert
      - ncd\_contact\_closure
    - Valid **Actions:**
      - N/A
- Integration: Radio Messaging MOTOTRBO
  - **Description:** An alternative to the MOTOTRBO Control Station module with more options
    - Valid **Triggers:**
      - receive\_radio\_created\_ticket
      - receive\_radio\_text\_message
      - receive\_radio\_ticket
    - Valid **Actions:**
      - send\_radio\_text\_message
      - Send\_radio\_ticket
- Integration: Radio Audio Alerts
  - **Description:** To play Radio Audio Alerts in the event of an alarm
    - Valid **Triggers:**
      - N/A
    - Valid **Actions:**
      - Radio\_audio\_alert
      - Radio\_audio\_alert\_text\_to\_speech

- Integration: Radio Text 'Panic', Motorola Emergency or Teldio Man Down
  - **Description:** To initiate alarms in the event of one of the above events
    - Valid **Triggers:**
      - emergency
    - Valid **Actions:**
      - N/A
- Integration: SMS Text
  - **Description:** An alternative to the Twilio module with more options
    - Valid **Triggers:**
      - receive\_sms\_message
    - Valid **Actions:**
      - send\_sms

## Reports

In addition to the live logs, the Reports feature allows you to see all messages that have been sent out through the TEG.

Follow the steps below to view Reports

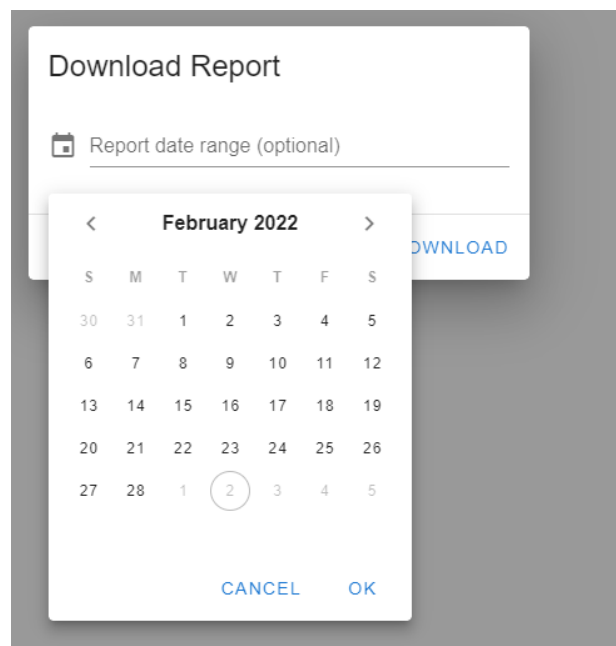
1. Click on '**Reports**' on the Gateway menu
2. From the drop down menu at the top, select the report that you would like to view.

This action will display the last 1000 entries in this report.

## Downloading the Reports

To download the all or part of the report:

1. Click on the 'Download Data as CSV' button on the top right of the page
2. On the pop up that appears, select a start and end date to set a date range



3. Press OK and then 'Download' to download the report

We recommend that you only download a maximum of one month of data at a time. Larger reports will take longer to download.

## Logs

Once the Modules and Behaviors are created, the TEG is active. You can test the system by triggering an event that is configured in the Behaviors.

Follow the steps below to keep track of the events as they are handled by the system.

1. Click on '**Settings**' on the Gateway menu
2. On the menu on the Settings page, click on '**Debug**' under the 'Tools' section.

This will take you to the Event Log page which shows a live stream of activities being performed on the Teldio Edge Gateway. By default, Error, Warning and Info level messages are enabled and will show high level information about events that are being processed.

- Click on '**Enable Debug**' to see more information
- Click on '**Pause**' to temporarily stop the live stream to examine information.

## Further Information

For any further information or support please contact Teldio Support at [support@teldio.com](mailto:support@teldio.com).