

# CLEAN Software

## User Guide



# Table of Contents

CLEAN Mobile App Overview .....	3
Logging in to the CLEAN Web Portal.....	4
Logging in to the CLEAN Mobile App .....	4
Fullness Information Page & Collection List.....	6
How To: Create Notifications.....	8
Asset Management .....	9
How To: Set up Stations in CLEAN .....	110
How To: Customize Fullness and Age Thresholds.....	11
How To: Reset Station Data .....	11
How To: Set Up Multi-Compactor Stations.....	12
How To: Create Groups .....	13
How To: Add 'Traditional Collection' Baseline Data .....	13
User Administration .....	14
How To: Create New Users .....	14
How To: Edit Existing User Information.....	14
How To: Reset Passwords for Existing Users .....	14
How To: Edit Your User Preferences .....	15
Alerts & Maintenance .....	16
How To: Create A Security Event .....	17
Reports & Action .....	
Report: Collection Summary.....	18
Report: Collection Efficiency.....	2019
Report: Daily Collection Activity .....	20
Report: Heatmaps.....	21
Report: Ready to Collect Frequency .....	22
Report: Collection Response Time.....	23
Report: Account Overview.....	24
Report: Group Benchmarking .....	25
Export Feature .....	26
Tips for Bigbelly Distributor Users .....	27
Mobile App.....	29
Fullness & Alert Tools .....	29
Install Tool .....	30
Service Tool – Report Issue.....	31
Service Tool – Maintenance .....	33
Service Tool – Inspection .....	34
Service Tool – Photos.....	35
CLEAN API .....	36
Bigbelly Support Portal .....	37
Additional Support from Bigbelly.....	37

## CLEAN Management Console Overview

### Cloud-Connected Platform for Smart Waste Management



CLEAN Management Console Software is the cornerstone of the Bigbelly Smart Waste & Recycling System, providing full visibility into an entire operation. This is the centralized location from which the system is managed and operational analysis can be done. It includes a set of tools for system setup, management, monitoring, and optimization from either a web-based software or mobile app.



Smart stations communicate real-time status directly into the CLEAN Management Console. Auto-generated email, text, and online notifications indicate which stations need to be collected to drive increased productivity while eliminating overflows and unnecessary collections. Users can optimize collection routines, measure and benchmark operations, and realize location based waste patterns (volume, fill rate, collection activity) across a Bigbelly smart waste fleet.



- Centralized Dashboard with Real-Time Collection Requirements & Metrics
- Real-Time Station Status Based on Percent Fullness and Age
- Auto-Generated Notifications Trigger Collections Exactly When Needed
- Reliable and Easy-to-Use Web-Based Software; No IT Setup Required
- Exportable Data & Reports for Easy Download and Integration
- API to Push System Data to Centralized Dashboards
- Suite of Reports to Analyze and Benchmark Waste & Recycling Operations Over Time
- Measure and Report on Recycling Diversion Rates per Waste Stream
- Customizable Asset Management & Role-Based User Administration
- Anytime, Anywhere Access via Mobile App for iOS and Android Devices



## CLEAN Mobile App Overview

The CLEAN Mobile App informs and guides collection staff in optimizing operations on-the-go. The app provides real-time station collection readiness status and service alerts; filtering and group functions make it easy to focus on the stations that need collection or service. Download **CLEAN Mobile** for iOS and Android, and login in with your CLEAN username and password.

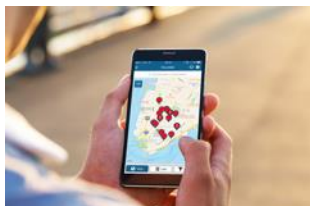


iOS App Store

<https://itunes.apple.com/us/app/cleanmobile/id530771826?mt=8>

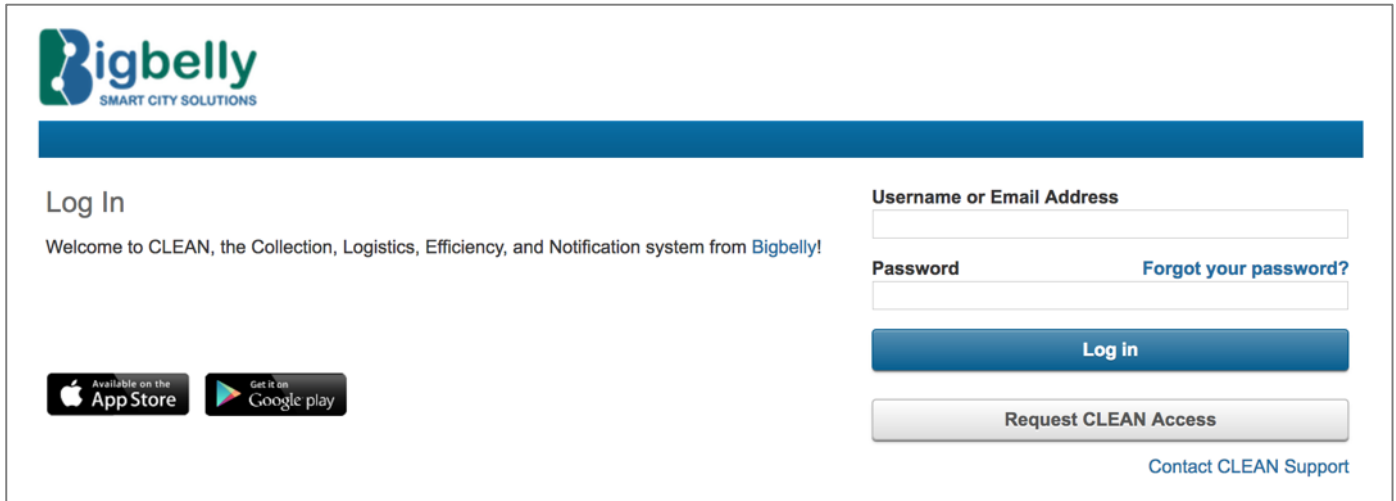
Google Play Store

<https://play.google.com/store/apps/details?id=com.bigbelly.cleanmobile>



## Logging in to the CLEAN Web Portal

- During the initial setup, Bigbelly will help create your CLEAN account users...
- A CLEAN welcome email will be sent to those individuals including:
  - Username
  - Temporary password
  - Link to Access CLEAN (<https://clean.bigbelly.com/>)
- Upon first log in, CLEAN will ask for your username and temporary password. It will then prompt you to change your temporary password to a personal password. *Reminder: All passwords are case sensitive.*



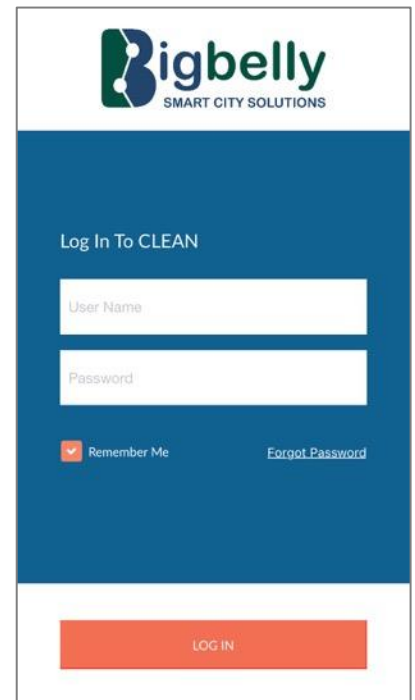
The screenshot shows the Bigbelly CLEAN Web Portal login interface. At the top left is the Bigbelly logo with the tagline 'SMART CITY SOLUTIONS'. Below the logo is a blue horizontal bar. The main heading is 'Log In'. Below this is a welcome message: 'Welcome to CLEAN, the Collection, Logistics, Efficiency, and Notification system from Bigbelly!'. On the left side, there are two app store badges: 'Available on the App Store' and 'Get it on Google play'. On the right side, there are two input fields: 'Username or Email Address' and 'Password'. Below the password field is a link that says 'Forgot your password?'. There are two buttons: a blue 'Log in' button and a grey 'Request CLEAN Access' button. At the bottom right, there is a link that says 'Contact CLEAN Support'.

## Logging in to the CLEAN Mobile App

- Logging into the Mobile App requires the same CLEAN username and password as the web portal.
- Your first CLEAN log in with the temporary password from your welcome email must be completed in the Web Portal, not the Mobile App.

**Pro Tip:** Select the checkbox for 'Remember Me' to save time from logging in each time you use the app.

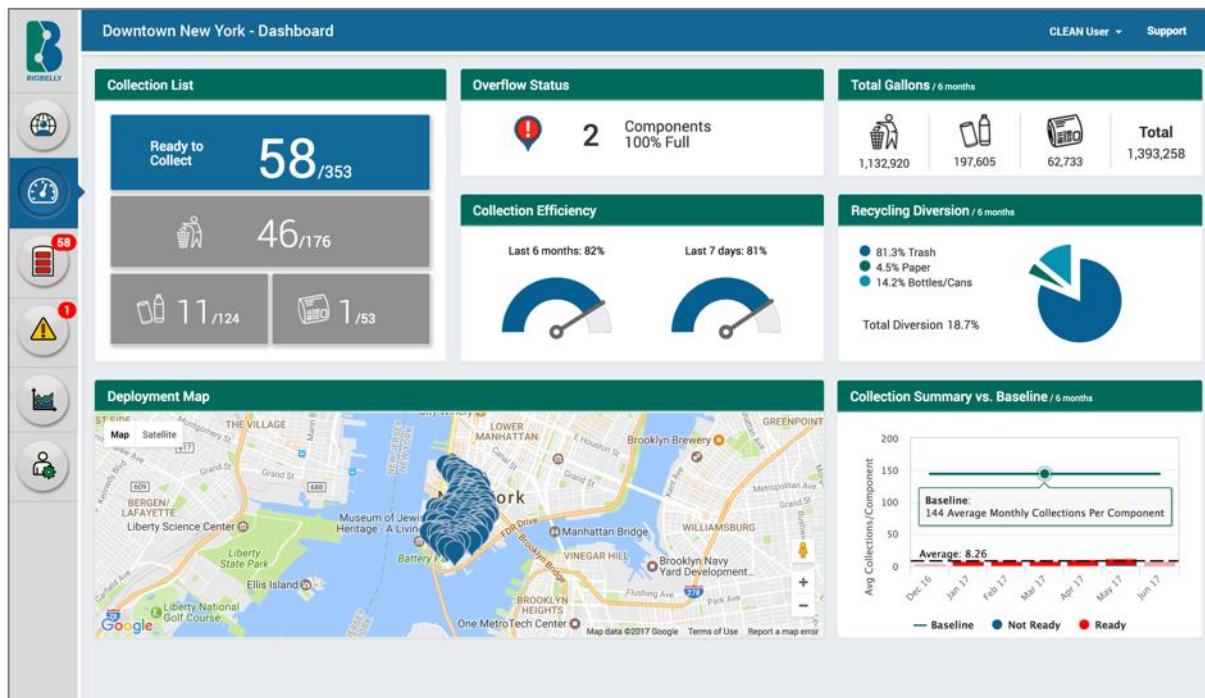
**Pro Tip:** Make sure your phone is updated with the latest version of CLEAN Mobile, and you have enabled access to your camera for the app (see your phone's System Settings).



The screenshot shows the Bigbelly CLEAN Mobile App login screen. At the top is the Bigbelly logo with the tagline 'SMART CITY SOLUTIONS'. Below the logo is a blue header area with the text 'Log In To CLEAN'. There are two input fields: 'User Name' and 'Password'. Below the password field is a checkbox labeled 'Remember Me' and a link that says 'Forgot Password'. At the bottom, there is a large orange button labeled 'LOG IN'.

## CLEAN Dashboard

The CLEAN dashboard provides real-time fleet status, collection requirements, and highlights key metrics.



### What is on this page?

- This is a summary page specific to your current active, 'in service' deployment. Modular widgets display a variety of information regarding your Bigbelly smart waste and recycling fleet.
- The **Collection List** (top, left) quantifies the number of components which require collection.
- The **Overflow Status** (top, middle) alerts on how many stations are at risk of an overflow (100% full).
- **Total Volume** collected and **Recycling Diversion** (top, right) display values for these common metrics.
- Are you optimizing collections with the system? **Collection Efficiency** (middle) is calculated as the percentage of collections made when a component is ready for a collection vs. when it has remaining capacity.
- **Deployment Map** (bottom, left) pinpoints every stations' location as determined by the onboard GPS.
- The **Collection Summary** (bottom, right) displays a month-by-month activity report of total collections per month, average collections per month per component, and before-Bigbelly baseline number of collections.
- Red Notification Bubbles on the Navigation Bar indicate the total number of components across a fleet requiring collection (fullness page icon), or under active alert (alerts page icon).

### Taking Action:

- **Collection List:** Identify the number of components which need to be collected per waste stream.
- **Overflow Alert:** Identify the number of components that are 100% full (potential overflow) and need immediate collection.
- **Efficiency Metric:** Are you optimizing your collection routine? Always aim for at least a 70% efficiency rating! Two different time frames enable you to assess how the recent operations compare to a longer-term average.
- **Total Volume, Recycling Diversion, and Collection Summary** give you a snapshot of data for a given timeframe. Access the full set of reports to further analyze operations.

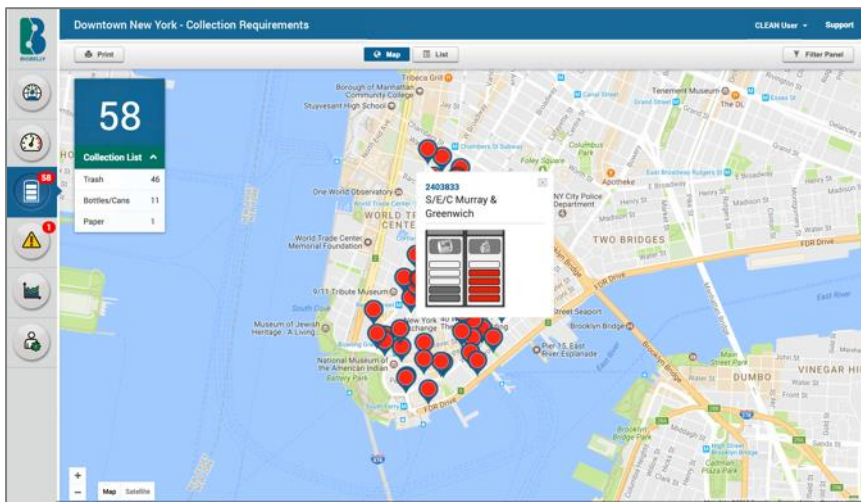
**Pro Tip:** Want to display a different time frame? If you'd like a different view than 6 months' worth of data, adjust your view by clicking on your name, navigate to **User Preferences**, and select a 3, 6, 9, or 12 month views.

## Fullness Information Page & Collection List

CLEAN's Fullness Information page delivers the real-time fullness level for an entire Bigbelly deployment. Individual station fullness status will match the LED lights on the front of the stations on the street.

### What is on this page?

- This **Fullness Information** page indicates which stations in a fleet require collection.
- By default, CLEAN will help you focus only on stations requiring action!
- Components can be '**Ready for Collect**' for four reasons:
  - Fullness Threshold Met (fullness indicated in 20% increments)
  - Overflow Risk (100% Full)
  - Age (Days) Since Last Collection
  - Active Alert Where Fullness Cannot Be Determined
- Use the **Filter Panel** (top right corner) to filter the collection view. Filter options include 'ready for collection' reason, waste streams, or groups/locations to show only the desired stations. Use the **Print** button (top left) for a print-friendly or **Export** button for a CSV version of your view (map with markers, or detailed list) based on applied filters.

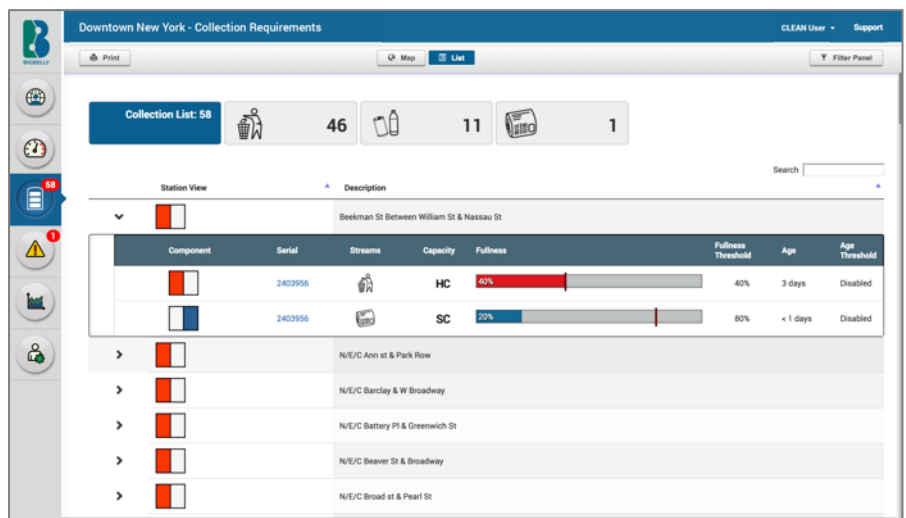


The **Map View** displays map markers with icons to identify a station that is 'Ready to Collect'. The reason for collection is indicated by the icon within the map marker. See the next page for examples. Click on the map marker for the 'as seen on street' view for station details (serial number, description, waste stream, etc.) and fullness level depicted.

Toggle between Map and List views by clicking the buttons at the top, middle.

The **List View** displays the same information as the Map view, but in a table. Each station that is ready to collect is displayed with the component triggering collection highlighted in red.

Click the down arrow in the left-most column to open station details. This view provides additional component details such as capacity, fullness and age thresholds, and age since last collection (if activated). Click the serial number to navigate to the Station Details Page.



## Taking Action: When to Collect

The Bigbelly smart waste and recycling system tells you exactly when to collect each station in your fleet. Customers who make a meaningful change in operational routine take advantage of both increased capacity and real-time notification of which stations need collection. **There are FOUR ways to know when stations are ready for collection:**

1. CLEAN Website	2. Notifications	3. CLEAN Mobile App	4. Station LEDs
------------------	------------------	---------------------	-----------------

### 1. Determine what needs to be collected on the CLEAN Website

1. Log into CLEAN
2. Use the **Dashboard** page to get a quick count of how many components are 'Ready to Collect' or at 'Overflow Status'
3. Look for a **Red Notification Bubble** on the Fullness Information icon
4. Navigate to **Fullness Information** page and check the **Map** for:
  - a. Stations that have met Fullness Threshold
  - b. Stations with Potential Overflows
  - c. Stations that have met Age Threshold
  - d. Stations under Alert where Fullness cannot be determined
5. Click the **List View** for a more detailed report



**Pro Tip:** Use **Print** or **Export** (top left) for a print-friendly or CSV version to take on-the-go!

### 2. Determine what needs to be collected via Notifications (Email & SMS)

Set up auto-generated notifications to tell collection crews exactly what needs collection, exactly when needed. Notifications can be set up for receipt either by email or SMS, on a regularly scheduled basis or immediately as needed. [See Notifications section of this CLEAN User Guide for additional information about notifications.](#)

### 3. Determine what needs to be collected on the CLEAN Mobile App



1. Log into the Mobile App
2. Navigate to Fullness Information (icon in top right) - This will have a Red Notification Bubble with the number of stations that need to be collected.
3. Click the List View for Location Descriptions

### 4. Determine what needs to be collected via LEDs

Each station's fullness status is reported on the LED lights on the front of the stations. Since the station reports its real-time status into CLEAN, stations flashing red LEDs will appear in your collection list in CLEAN.

**Flashing RED? Collect Now!**

**Flashing GREEN? Not Ready to be Collected!**



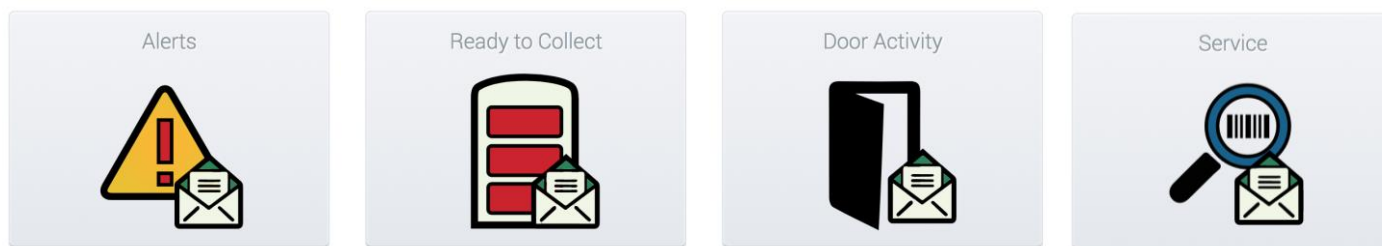
**Ready to be Collected**

**Not Ready to be Collected**

**Pro Tip:** Make collections when stations are 'Ready for Collection' (reached fullness or age since last collection thresholds) to optimize your collection efficiency in an effort to reduce cost and take full advantage of the CLEAN Management Console.

## System Notifications

Set up auto-generated notifications to tell collection crews exactly what needs collection, exactly when needed. Notifications can be set up for receipt either by email or SMS, on a regularly scheduled basis or immediately as need.



### What is on this page?

- **Existing notifications** are displayed with description, type, frequency, send-time, recipients.
- To **edit a notification**, click the pencil icon in the rightmost "Actions" column. To **delete**, click the 'x'.
- Users can turn ON/OFF an existing notification without deleting it. To **activate a notification**, click the checkbox in the leftmost column. To **deactivate**, click to uncheck.
- **Create a new notification via an easy wizard** (top left) - Set up email or SMS notifications to indicate when stations are ready for collection, need maintenance, or to provide door-opening activity.

## How To: Create Notifications

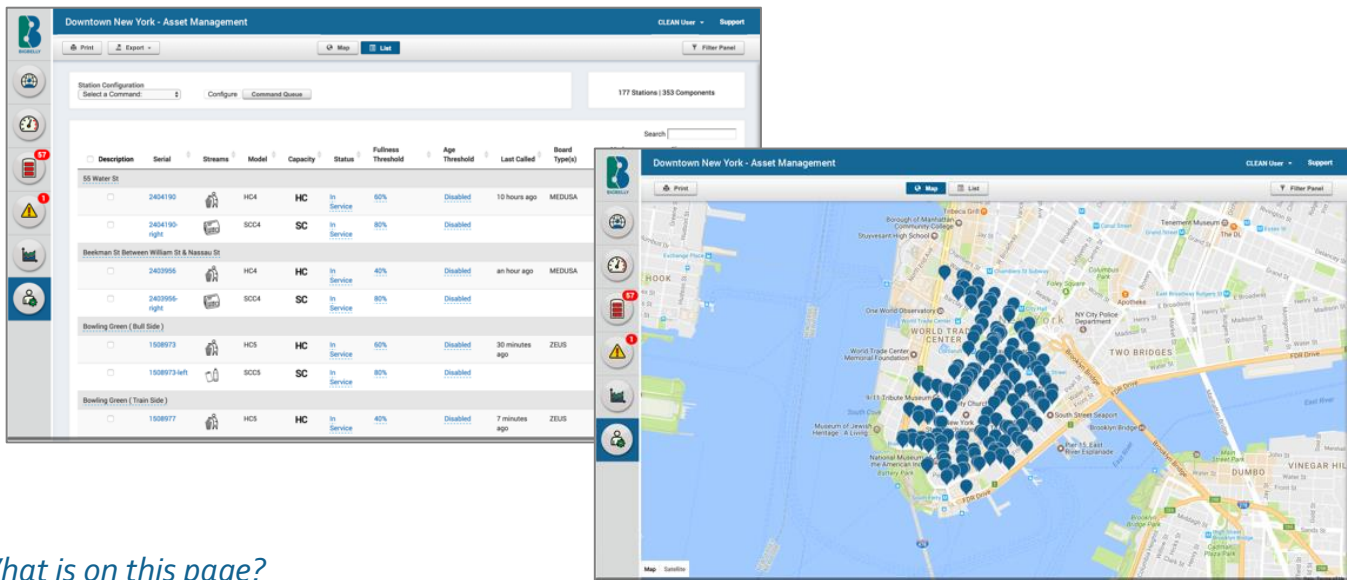
1. Log into CLEAN
2. Click the **Administration** icon
3. Click on the **Notifications** icon
4. Click the 'Create a New Notification' button (top left)
5. Choose and click which type of Notification you would like to set up...
  - a. **Alerts:** Notifies recipients if, when, and which stations are under an active maintenance alert including which type of alert and how long that alert has been active.
  - b. **Ready to Collect:** Notifies recipients which stations are 'Ready to Collect' based on reaching a fullness or age threshold, or are under alert where the fullness cannot be determined.
  - c. **Door Activity:** Notifies recipients of door opening activity at a station, group, or fleet level.
  - d. **Service Tool:** Notifies recipients when a photo or note has been added to a station via the mobile app.
6. Follow the seven-step wizard for each notification set-up. Detail the user provides include recipient(s) (email or email-to-SMS), description, notification schedule, group filtering, etc.

**Pro Tip:** 'Account Administrator' user types are the only CLEAN users which have the rights to add and update notifications.

**Pro Tip:** SMS text notifications can only be set up at an 'Immediate' Frequency. Once "Immediate" is chosen, the SMS check box appears on the set-up wizard page. When adding recipients to an SMS notification, you must compose their mobile number as an email (for example: the Verizon phone number 617-123-4567 is 6171234567@vtext.com). Each carrier has their own email-to-text address that can be easily searched online.

## Asset Management

The Account Assets page in CLEAN provides the master overview of the components in a Bigbelly deployment.



### What is on this page?

- The Account Assets page is where you **manage the inventory of your Bigbelly smart waste and recycling fleet**. Both **Map** and **List** views display an account's 'in service' assets (components) by default.
- Assets are **itemized in a table in the list view**. Each station location is sorted by 'Description' field by default; each station will include the components located there with a summary of details. Assets are pinpointed on the **Map view** based on each components' reported location via stations' onboard GPS.
- Collection thresholds** can be edited ([per station](#) or [in bulk](#)) for fullness and age since last collection.
- The **filter panel** (top right) allows users to filter their view of the Account Assets page by waste stream, component types, station status, groups, etc.
- The **total number of stations and components in a fleet** ('in service' count by default, changes with filters) is displayed in the top left corner. Use the **search field** to search and sort assets. Search by serial number, description, stream, capacity, etc.

### Taking Action:

- Manage Inventory:** Set up, Edit, or Remove components and details.
- In-line edit key station details and settings:** Including location description, status, fullness and age thresholds.
- Click on any station serial number to navigate to the **individual station detail page** for more in-depth information.
- Print or Export** (top left) a deployment list either in map or list view. Applied filters will carry over to the printed page or CSV.
- Select components (via checkbox) to select a station command (ex: 'Force GPS Check' or to select Photo Eye).
- How To: Bulk Edit Settings (List View)** - Click the checkboxes to the left of desired station serial numbers to select multiple components to edit at once. To select all stations in view, click the checkbox at the top of the table, leftmost of the 'Description' column. Whenever more than one component is checked off, two new buttons appear at the top of the page: **Bulk Change Fullness** and **Bulk Change Age**. Select desired threshold to change, click button, update the settings from dropdown, and press save.

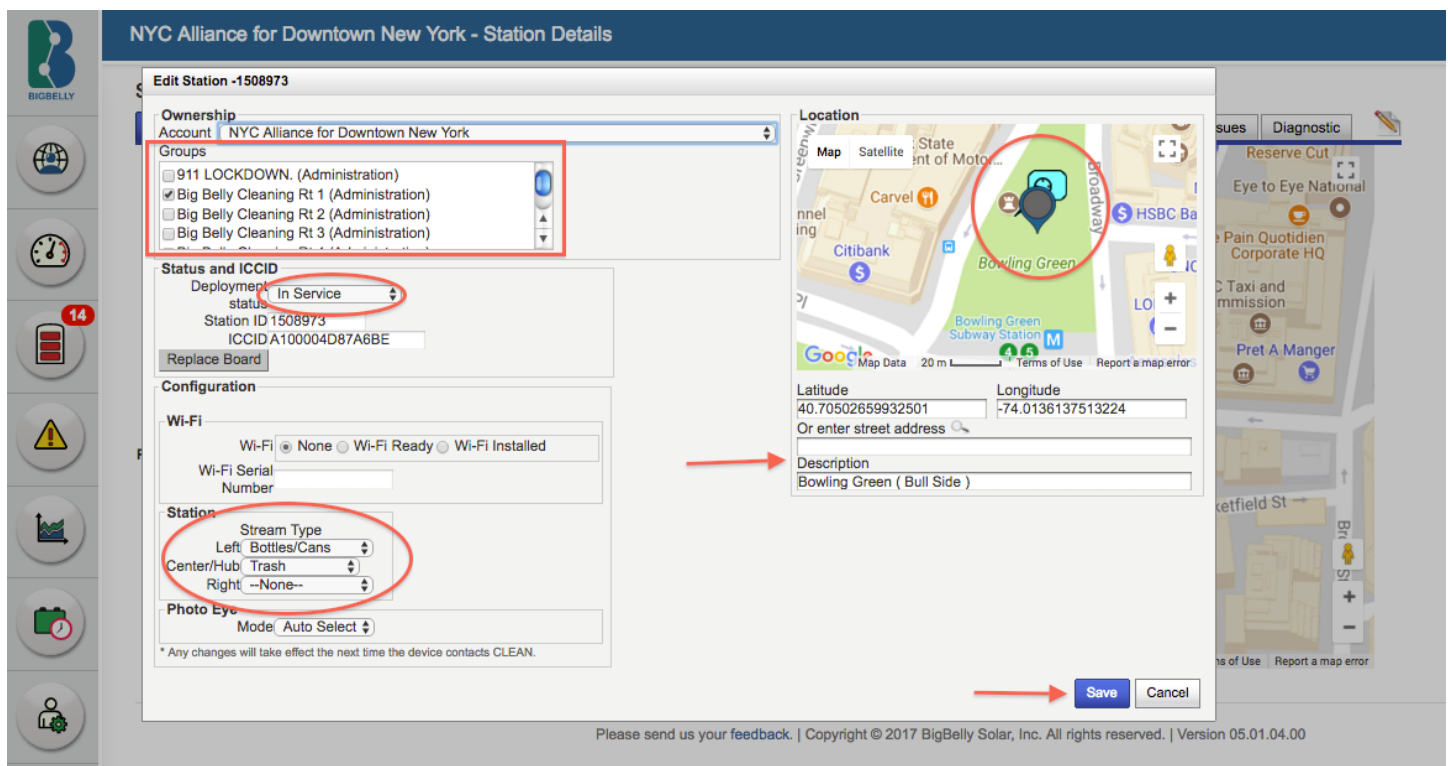
Bulk Change Fullness

Bulk Change Age

**Pro Tip:** Pull your Account Asset data into Excel – Click the 'Export' button (top left) in List View to download all data in view. A CSV will be generated and download automatically!

## How To: Set Up Stations

1. Click the Administration icon
2. Click on the Assets icon
3. Click the Filter Panel button
4. Click the Filter By Status row to see the dropdown options
5. Check off the Manufactured status row and uncheck the 'In Service' status
6. Click Apply at the top of the Filter Panel
7. Click the Serial Number link for the station you would like to set up (A new internet tab will open)
8. Click the Edit Station Button (Pencil & Paper Icon) on the right side of the page
9. Fill out the necessary fields
  - a. Check off the group(s) the station should be associated with (If applicable)
  - b. Click the Deployment Status drop down menu to move the station into "In Service"
  - c. Update the station configuration (If Applicable). Note: A double station companion is always on the left.
  - d. Click, hold, drag and drop the Gray Pin on the map to the install location. Note: Use the Blue GPS Bubble as a reference, but be aware that the GPS marker is not 100% accurate
    - i. If no GPS Marker is available, you may enter the GPS coordinates (In Decimal format) or enter the Street Address and then click the Magnifying Glass icon.
  - e. Enter the Location Description
10. Click Save



**NYC Alliance for Downtown New York - Station Details**

**Edit Station -1508973**

**Ownership**  
Account: NYC Alliance for Downtown New York

**Groups**  
☐ 911 LOCKDOWN. (Administration)  
☒ Big Belly Cleaning Rt 1 (Administration)  
☐ Big Belly Cleaning Rt 2 (Administration)  
☐ Big Belly Cleaning Rt 3 (Administration)

**Status and ICCID**  
 Deployment Status: **In Service**  
 Station ID: 1508973  
 ICCID: A100004D87A6BE  
 Replace Board

**Configuration**  
 Wi-Fi: ☒ None ☐ Wi-Fi Ready ☐ Wi-Fi Installed  
 Wi-Fi Serial Number:   
 Station:   
 Stream Type: **Left Bottles/Cans**  
 Center/Hub: **Trash**  
 Right: **None**  
 Photo Eye:   
 Mode: **Auto Select**

**Location**  
 Map Satellite Street View  
 Latitude: 40.70502659932501 Longitude: -74.0136137513224  
 Or enter street address:   
 Description: **Bowling Green ( Bull Side )**  
 Save Cancel

Please send us your feedback. | Copyright © 2017 BigBelly Solar, Inc. All rights reserved. | Version 05.01.04.00

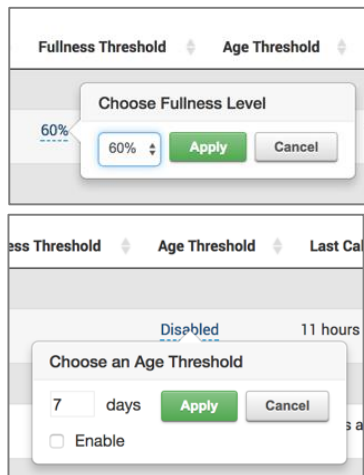
## How To: Edit Station Details

Depending on what station information you would like to edit, you can either in-line edit on the main asset page, or follow the same steps under the “How To: Set Up Stations” section above. Information that you can in-line edit on the Account Assets page will have a blue dotted underline. Click once to open editable fields.

Station information that you can in-line edit:

- 1) Location Description
- 2) Status
- 3) Fullness Threshold
- 4) Age Threshold

<input type="checkbox"/> Description	Serial	Streams	Model	Capacity	Status	Fullness Threshold	Age Threshold
1st Vessel Bridge Entrance (P/I Side)							
<input type="checkbox"/>	1505038		HC5	HC	In Service	60%	Disabled



## How To: Customize Fullness and Age Thresholds

1. Click the Administration icon
2. Click the Assets icon
3. To edit the **Fullness Threshold**:
  - a. Click the Fullness Threshold (%) in the component's row
  - b. Choose the desired percentage fullness from the dropdown
  - c. Click Apply button to save
4. To edit the **Age Threshold**
  - a. Click the Age Threshold in the component's row
  - b. Click the “Enable” checkbox to activate, then enter the number of days (only round digits accepted)
  - c. Click Apply button to save

## How To: Reset Station Data

- 1) Click the Administration icon
- 2) Click on the Assets icon
- 3) Find the station serial number that you would like to edit
- 4) Using the In-line editing feature under the Status column, change the station's status to Manufactured (Moving it to Manufactured will clear all previously collected data)
- 5) Find the station serial number again under the Manufactured status and move it back to In Service at the new install location

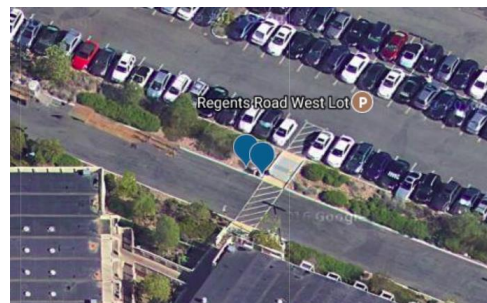
**Pro Tip:** Want to edit multiple stations' thresholds at once? Click here for [How To: edit in bulk](#).

## How To: Set Up Multi-Compactor Stations

There are two ways to set up these types of station; Using the CLEAN Website and using the CLEAN Mobile App.

**CLEAN Website:** When setting up multi-compactor stations on the website, each station serial number must be set up separately because compactors have their own electronics board and communication chip.

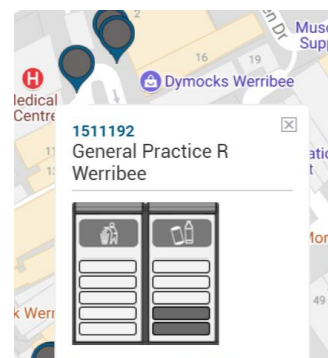
- 1) Start in your Global Overview page
- 2) Select the CLEAN Account with the stations you want to set up
- 3) Click the Assets Icon
- 4) Use the search function on the right side of the page to find the serial numbers (Separate the serials with commas, no spaces)
  - i. If the Serial numbers do not appear, use the Filter panel to include Manufactured Status stations.
- b. Click Apply. Your serials should then appear
- 5) To set up the first compactor, follow Steps 8-11 from the *How To: Set up Stations* Section of the CLEAN User Guide (Page 10)
- 6) To set up the second compactor follow the same *How To* steps, but when placing the location pin on the map, try to place it directly next to the first location.



**CLEAN Mobile App:** When setting up multi-compactor stations on the Mobile app's install tool, you are able to set up both compactors together at one map pin placement.

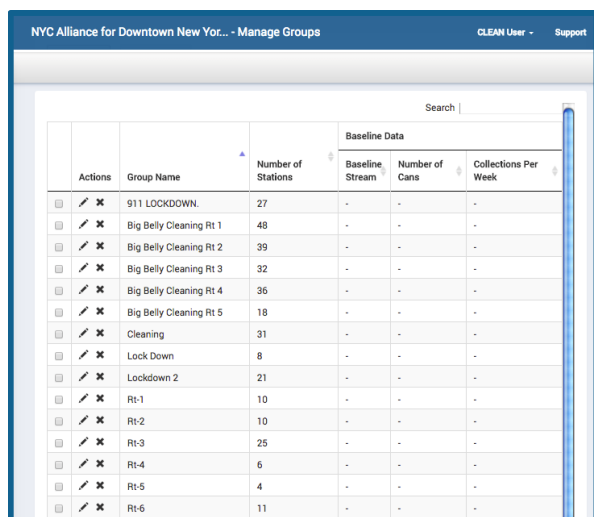
- 1) Open the CLEAN Mobile App
- 2) Select the CLEAN Account with the stations you want to set up
- 3) Click the Install Tool icon
- 4) Follow Steps 1-6 from the *Taking Action: Using the Mobile App's Install Tool* Section of the CLEAN User Guide (Page 24)

Note: Setting up a Duo station on the CLEAN mobile app will look different on the maps than if you set them up on the CLEAN website. This is because the Mobile app sets up both stations at the same GPS coordinates. For example, when you click the station pin on the Fullness Information Page, you will see the fullness status on both components, but only one station serial number will appear.

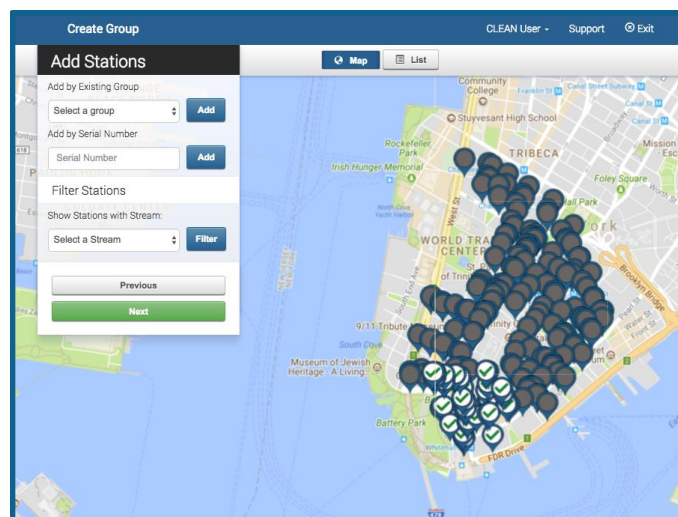


## Group Administration

The Groups Administration tool provides a listing of all groups of stations in a CLEAN account. Groups are commonly used to divide routes and neighborhoods of a municipality, areas of college campuses, public transit routes or stops, store branches for retailers, contracted collectors by area, etc. There is no limit to how many groups you can have.



Actions	Group Name	Number of Stations	Baseline Stream	Number of Cans	Collections Per Week
<input type="checkbox"/>	911 LOCKDOWN	27	-	-	-
<input type="checkbox"/>	Big Belly Cleaning Rt 1	48	-	-	-
<input type="checkbox"/>	Big Belly Cleaning Rt 2	39	-	-	-
<input type="checkbox"/>	Big Belly Cleaning Rt 3	32	-	-	-
<input type="checkbox"/>	Big Belly Cleaning Rt 4	36	-	-	-
<input type="checkbox"/>	Big Belly Cleaning Rt 5	18	-	-	-
<input type="checkbox"/>	Cleaning	31	-	-	-
<input type="checkbox"/>	Lock Down	8	-	-	-
<input type="checkbox"/>	Lockdown 2	21	-	-	-
<input type="checkbox"/>	Rt-1	10	-	-	-
<input type="checkbox"/>	Rt-2	10	-	-	-
<input type="checkbox"/>	Rt-3	25	-	-	-
<input type="checkbox"/>	Rt-4	6	-	-	-
<input type="checkbox"/>	Rt-5	4	-	-	-
<input type="checkbox"/>	Rt-6	11	-	-	-



## What is on this page?

- The Manage Groups Administration page provides the ability to create new, edit or delete existing account groups.

## Taking Action:

- Create and manage groups** for your Bigbelly deployment. Consider how you want to organize your deployment: streets, downtown, individual parks, campus locations, collection or cleaning routes, etc.
- To create a group you need to add a name, users and select the components.
- Groups can be used throughout CLEAN notifications, reports, and collection details to filter data and views.

## How To: Create Groups

- Log into CLEAN
- Click the **Administration** icon
- Click on the **Groups** icon
- Click the 'New' button (top left)
- Follow the four-step wizard for each group set-up. Details the user provides are the group name, traditional collection data, users, and the components.

## How To: Add 'Traditional Collection' Baseline Data

- Log into CLEAN
- Click the Administration icon
- Click on the Manage Groups icon
- Click the 'New' button (top left) or Edit an existing Group by clicking the pencil icon
- Enter a Group Name
- Click the "Enter Traditional Collection Data" Check Box ☒ Enter Traditional Collection Data
- The Baseline Data field will pop up. Fill out the necessary Data (Waste Stream, Number of Cans, Collections Per Week)
- Click Save

**Pro Tip:** It is critical to enter your before-Bigbelly baseline data in order to fully analyze savings with the Bigbelly smart waste system! This enables you to quantify collection reduction and associated savings.


## User Administration

Users are the individuals who receive log in credentials to CLEAN. Bigbelly includes role-based user administration to provide relevant CLEAN access to different members of your team. Customers have unlimited CLEAN user licenses and account credentials valid for both web and mobile apps.

### What is on this page?

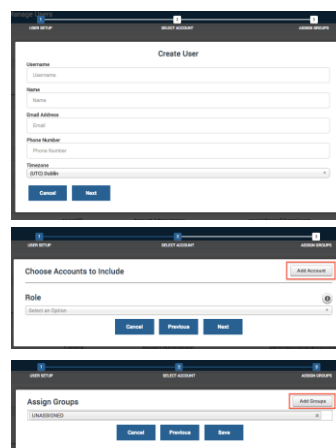
- The **User Administration** page displays a list of all registered users that have been created for a given account. This table includes a summary of information for each user: name, username, email address, phone number, and last log in timestamp data (log ins from website only). **Managing Users** includes Set up, Edit, or Remove users and their details.
- CLEAN offers **role-based user administration** with the following **User Types**:

Role Permissions								
Role	Multi- Account	Admin	Dashboard	Fullness	Alerts	Reports	Inventory	Support
Account Administrator	✓	✓	✓	✓	✓	✓	✓	✓
Service	✓	—	✗	✓	✓	✗	✓	✓
User	✓	✗	✗	✓	✗	✗	✗	✓
Dispatcher	✓	—	✓	✓	✓	✓	✓	✓
Distributor	✓	✓	✓	✓	✓	✓	✓	✓
Support	✗	✗	✗	✗	✗	✗	✗	✓

- Click the pencil icon  to the left of each user personal details, time zone, and associated groups. to edit
- Click the checkbox next to each user to individually or bulk delete user(s).

## How To: Create New Users


- Log into CLEAN
- Click the Administration icon
- Click the Manage Users Icon
- Click the 'New' button (Pop-up window will appear)
- Enter the following details: Username, Name, Email Address, phone number, time zone
- Click 'Save' (Page 2 will appear)
- Choose the Account and User Role
- Click 'Save' again (Page 3 will appear)
- Remove/Add Groups for the User to see
- Click 'Save'



## How To: Edit Existing User Information

- Navigate to the Manage Users Page
- Click the pencil icon next to the User that you would like to edit (Pop-up window will appear). You cannot edit your own information. Any changes to your account must be done in the User Preferences page (see page 15).
- Edit User information details: username, name, email address, phone number, time zone; add user to additional accounts (if applicable), change user role; add or remove groups from user visibility.

## How To: Reset Passwords for Existing Users

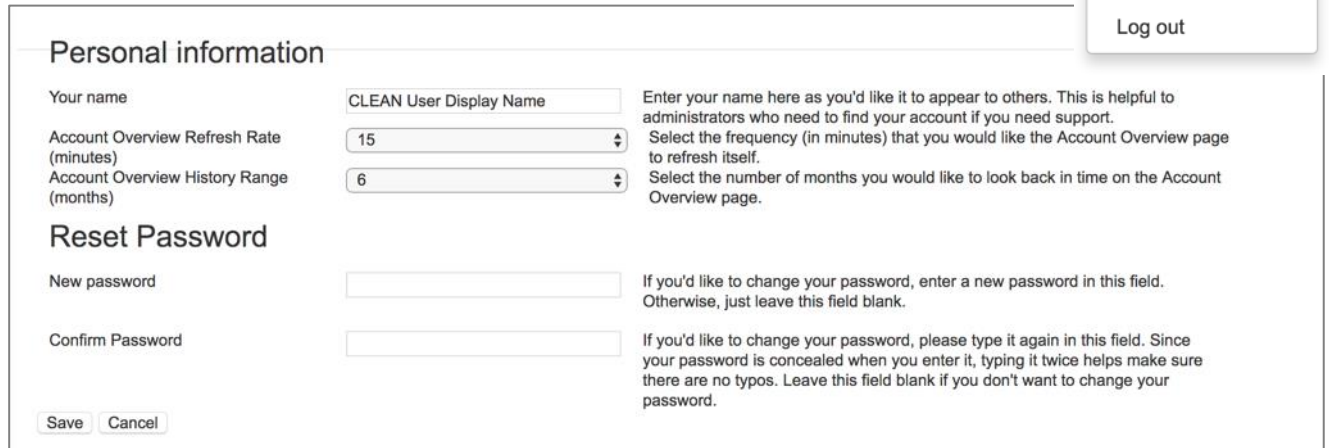
- Navigate to the Manage Users Page
- Click the circular icon  next to the User that you would to reset the password for
- A pop-up message will confirm that you would like to reset – Click 'Yes'
- An email will be sent with a temporary password to initiate reset of personal password

## How To: Delete Users

1. Navigate to the Manage Users Page
2. Click the checkbox next to the User(s) which you would like to delete from CLEAN
3. Click 'Delete' button at the top of the page
4. A pop-up message will confirm that you would like to delete – Click 'OK'

*Note: When a user is deleted, the associated email address will no longer receive notifications.*

## How To: Edit Your User Preferences



The screenshot shows the 'User Preferences' dropdown menu in the top right corner, with options for 'User Preferences' and 'Log out'. Below the menu is a form titled 'Personal information' with the following fields:

- Your name:** A text input field containing 'CLEAN User Display Name'. To the right, a note states: 'Enter your name here as you'd like it to appear to others. This is helpful to administrators who need to find your account if you need support.'
- Account Overview Refresh Rate (minutes):** A dropdown menu set to '15'. To the right, a note states: 'Select the frequency (in minutes) that you would like the Account Overview page to refresh itself.'
- Account Overview History Range (months):** A dropdown menu set to '6'. To the right, a note states: 'Select the number of months you would like to look back in time on the Account Overview page.'

Below these fields is a section titled 'Reset Password' with two text input fields:

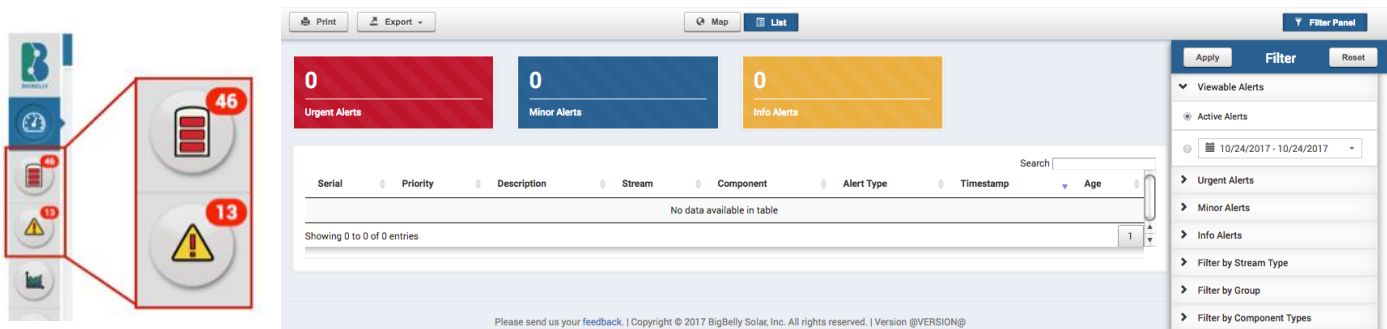
- New password:** A text input field. To the right, a note states: 'If you'd like to change your password, enter a new password in this field. Otherwise, just leave this field blank.'
- Confirm Password:** A text input field. To the right, a note states: 'If you'd like to change your password, please type it again in this field. Since your password is concealed when you enter it, typing it twice helps make sure there are no typos. Leave this field blank if you don't want to change your password.'

At the bottom left of the form are two buttons: 'Save' and 'Cancel'.

1. Log into CLEAN
2. Click on your Name (top right corner in blue heading)
3. Click **User Preferences** in the dropdown
4. Select the field(s) to edit – Either type or select from drop-down options for:
  - a. 'Your Name' = Display name (shown in the top right corner when you are logged in to CLEAN)
  - b. 'Account Overview Refresh Rate' = Rate at which Dashboard page refreshes
  - c. 'Account Overview History Range' = Number of months shown for long-term data on Dashboard
    - i. Select from 3, 6, 9, or 12 months
5. Click 'Save'

## Alerts & Maintenance

CLEAN includes a real-time maintenance alert center for an entire Bigbelly deployment.



### What is on this page?

- The **Alerts Page** is a centralized location that lists any active alerts in the fleet, sorted by alert urgency. The total number of active alerts is also displayed in a **Red Notification Bubble** on the Alerts icon of the left-hand navigation. Users can view alerts via **List** (default) or **Map** views. **The Bigbelly System has three types of maintenance-based Alerts:**
  - Urgent Alerts:** Serious issues that require immediate attention. Impact core function of the system.
  - Minor Alerts:** Less serious issues that need to be addressed before it impacts system function.
  - Informational Alerts:** Not a serious issue impacting function but something that may need attention.
- If there are any components under alert, each will be displayed in the table with key alert details.
  - 'Station' Serial Number & 'Description' indicate which component is under alert.
  - 'Alert Type' matches the complete set of alerts listed on the left filter panel.
  - 'Age' tells users how long the alert or warning has been active.
- A **Filter Panel** (right) allows you to select which alert types you would like to view.
  - By default, the Alerts Page will load all Alert types.
  - The number of active alerts in the Alert Category bucket is noted at the top of the screen.
  - Users may also filter by Waste Stream, Timeframe, Component Types and Groups to view details relevant to their use.
- Use **Print** button (top left of map or list panel) for a print-friendly version of your view (w/ applied filters).
- Use **Export** button (top left of map or list panel) to export your list to PDF/CSV or map to PDF.

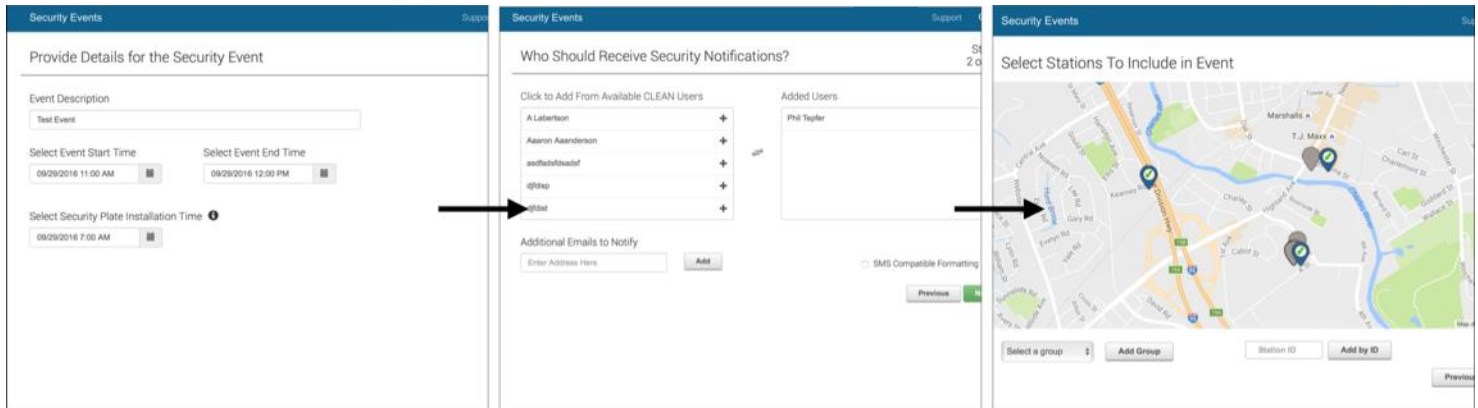
**Pro Tip:** Click the 'Alert Type' field (blue text with underline) for any active alert to open an alert technical support document for an explanation and troubleshooting steps. These documents are also available at any time in the [CLEAN Support Portal](#).

### Taking Action:

- Take note when there is a red notification bubble over the Alerts Page icon on CLEAN web portal or mobile app.
- Set up Alert [Notifications](#) to send an email when a maintenance alert becomes active. Click directly from the email notification to CLEAN web portal to learn more and take action.
- Keep up with any active alerts – Do not let them linger, as it may compromise core station function.
- [Contact](#) Bigbelly Customer Service (or your local Bigbelly Distribution Partner) for hardware and technical support, after using the self-help documentation available.

## Security Management

For high profile public space events, Bigbelly offers a complete security package for your system.



### What is on this page?

- The Bigbelly Security System consists of two components: (1) the Security Management Module within CLEAN that enables operations to set up and manage security events and (2) manually installed Security Plates that restrict physical access to stations. When active, CLEAN alerts authorities via email or text if a station is breached. The system saves operational time and costs by eliminating the need to remove stations during special events.
- The **Security Management** page displays an overview of all scheduled, active, or previous security events. This tool allows users to secure individual stations, groups, or full deployments for a selected period of time during a high-security public space event.
- The Security Management Module provides the following functionality via an easy-to-use set up wizard:
  - Event Creation:** Create and easily add or delete stations from a security event via interactive map
  - Event Scheduling:** Stations are automatically placed into and removed from Secure Mode based on the specified event start and end time
  - Security Notifications:** Alerts and Notifications can be sent to any staff or law enforcement personnel
  - Security Dashboard:** Easily monitor and manage security events directly within CLEAN

## How To: Create A Security Event

To begin securing stations, create a new event by clicking the 'New Event' button at the top of the page.

This will lead you through an easy-to-use set up wizard including the following steps:

- Enter a name for the event, select users involved and to be notified in case of a system breach, select the timeframe of the event, and add when the prep work will begin for locking down the physical stations.
- Add stations to be locked down by either: (1) clicking desired pinpoints on the map, (2) selecting a group(s) of stations, or (3) selecting individual station serial numbers. Note: A blue map marker represents a station added to the secured list
- Selected stations will be added to the security event. It is important to note each stations' status and any alerts before scheduling your event. Finalize and schedule the event by clicking the green 'Create Event' button.
- Security Event details can be edited on the Security Management page after creation.

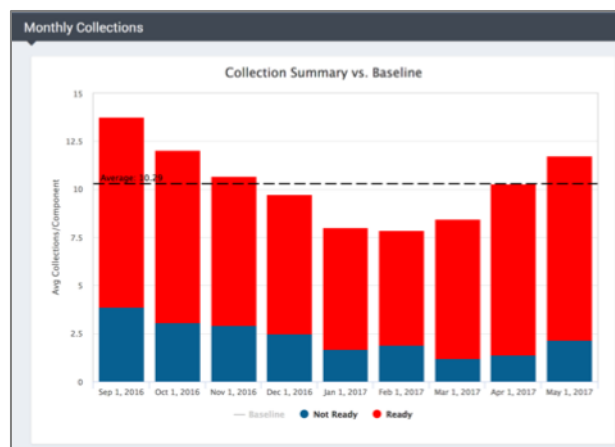
New Event

Create Event

**Pro Tip:** Bigbelly is here for you! We recommend that you consult with the Bigbelly Team when using the Security Management tool. We will help you properly set up the event to ensure it is activated during scheduled time. Contact us in advance: [cedept@bigbelly.com](mailto:cedept@bigbelly.com).

## Report: Collection Summary

The Collection Summary Report displays average number of collections per component and the station collection readiness status at the time of collection.



### What is on this page?

- The **Collection Summary vs. Baseline bar chart** presents the average collections per component (per day, week, or month depending on timeframe selected) and the ratio of readiness status at time of collection (Ready for Collection = Red, Not Ready for Collection = Blue). Hover over each bar to see the average collections per component per readiness status.
  - The **black dotted line** displays the **average collections per component**, calculated for report timeframe.
  - The chart loads by default with the **Baseline** data displayed as a green line to showcase the comparison of 'Before-Bigbelly' collections vs. Bigbelly collections with a smart waste system.
  - Users can **toggle baseline data On/Off** by clicking the baseline legend below the chart.  
*Note: If the account does not have a Baseline, [we strongly recommend that you add one.](#)*  
*Without a baseline, this chart will load without the comparison (legend will be grayed out).*
- The **Efficiency** pie chart (top right) indicates the ratio of total Ready / Not Ready collections (i.e. Optimized vs. Not Optimized) during the report timeframe. Hover over chart areas for total collections per readiness status.
- The **Collection Reasons** pie chart (bottom right) displays the total number of collections during the selected timeframe, and ratio of collections made per reason (Ready - Fullness, Ready - Alert, Ready - Age, Not Ready).
- The **Filter Panel** contains settings to filter collection data by desired timeframe, waste streams, or groups. The bar chart in the report will change between daily/weekly/monthly views based on the timeframe selected. Use the **Print** button (top left) for a print-friendly, or **Export** button for a CSV version of your view based on applied filters.
- It is important to note **timeframe changes** when dates are changed (in dark gray top bar and the bar chart):
  - Report timeframe fewer than 30 days = **Daily Collections** (1 bar per day)
  - Report timeframe between 31 days and 6 months = **Weekly Collections** (1 bar per week)
  - Report timeframe greater than 6 months = **Monthly Collections** (1 bar per month)

— Baseline  
— Baseline

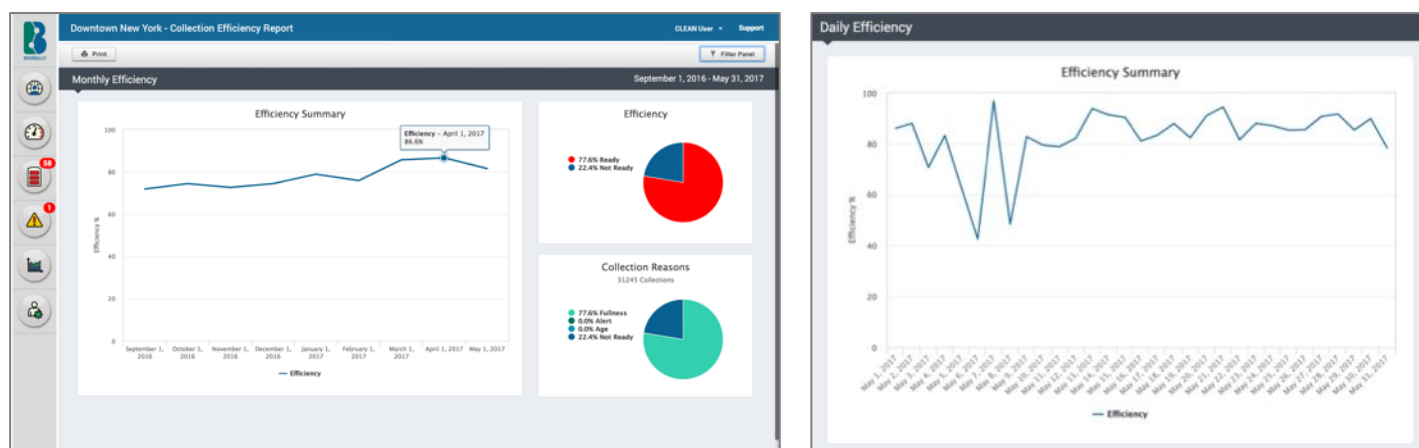
### Analyze & Take Action:

- How much have you reduced collections since deploying Bigbelly?
- Can you reduce your average collection per component by collecting when 'Ready to Collect'?
- Does optimized system use differ between groups or waste streams?
- Do you experience seasonal fluctuation for collection activity that you need to plan for?

**Pro Tip:** The more red you see, the more efficient you are, and the more optimally you are using the system!

## Report: Collection Efficiency

The Collection Efficiency Report displays data related to the efficiency metric – a measurement of optimized use.



### What is on this page?

- Efficiency is the calculated percentage of collections completed after the station reports that it is ready to be collected. **Two key system features contribute to optimized use:** (1) using the full capacity that the smart stations offer, and (2) using the real-time data & notifications to collect stations when they are ready. Stations that meet either fullness or age (when enabled) threshold are considered ready for collection and contribute to your efficiency metric.
- The **Collection Efficiency line chart** presents the collection efficiency (per day, week, or month depending on timeframe selected). Hover over the line chart to reveal the data (shown as a percentage).
- The **Efficiency pie chart** (top right) indicates the ratio of total Ready / Not Ready collections (i.e. Optimized vs. Not Optimized) during the report timeframe. Hover over chart areas for total collections per readiness status.
- The **Collection Reasons** pie chart (bottom right) displays the total number of collections during the selected timeframe, and ratio of collections made per reason (Ready - Fullness, Ready - Alert, Ready - Age, Not Ready).
- The **Filter Panel** contains settings to filter efficiency data by desired timeframe, waste streams, groups. The bar chart in the report will change between daily/weekly/monthly views based on the timeframe selected. It is important to note the timeframe changes in the dark gray top bar when changing the filters / report dates. Use the **Print** button (top left) for a print-friendly version, or **Export** for a CSV version of your view based on applied filters.

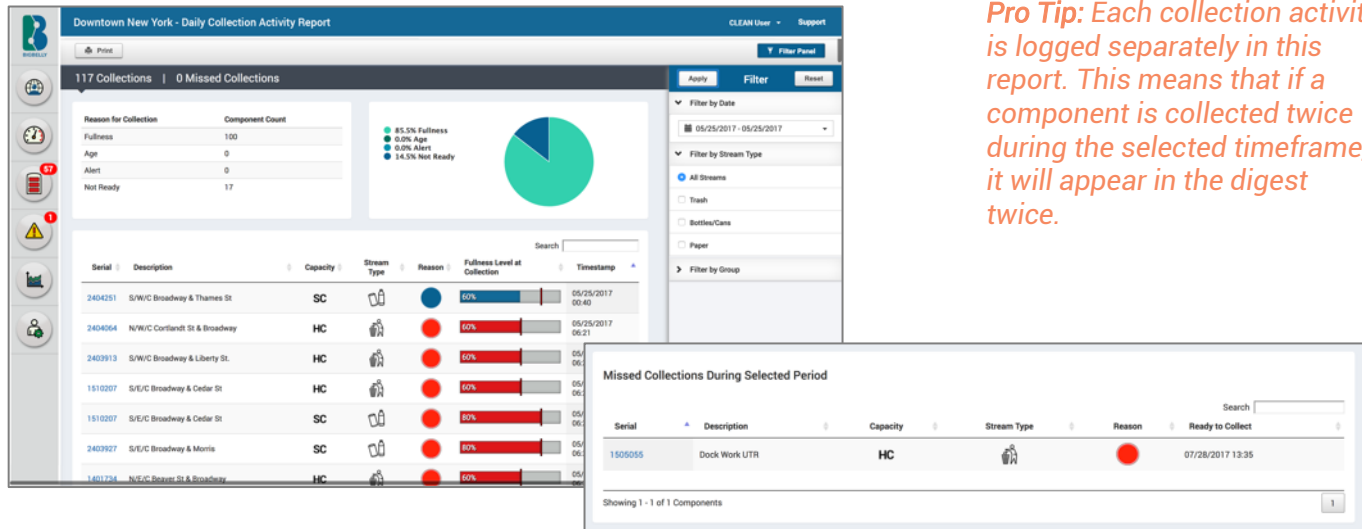
**Pro Tip:** The Bigbelly system's operational gains are very much based on successful implementation of Bigbelly-driven collection practices: leveraging extra capacity coupled with cloud connection to know when to collect.

### Analyze & Take Action:

- Has your efficiency score improved over the selected timeframe? A trend of increasing efficiency showcases system adoption and implementation of Bigbelly smart waste system best practices.
- Do trending efficiency scores differ between groups or waste streams? Do any collectors need training?
- How can you raise your account's efficiency score? Collect your fleet only when needed (when stations are ready). Are you using Service Mode during service visits to ensure those are not counted as collections?
- How are current routines comparing to longer-term averages? [Keep an eye on your efficiency on the Dashboard!](#)

## Report: Daily Collection Activity

The Daily Collection Activity Report details collection information for a selected timeframe - collections made & missed.



### What is on this page?

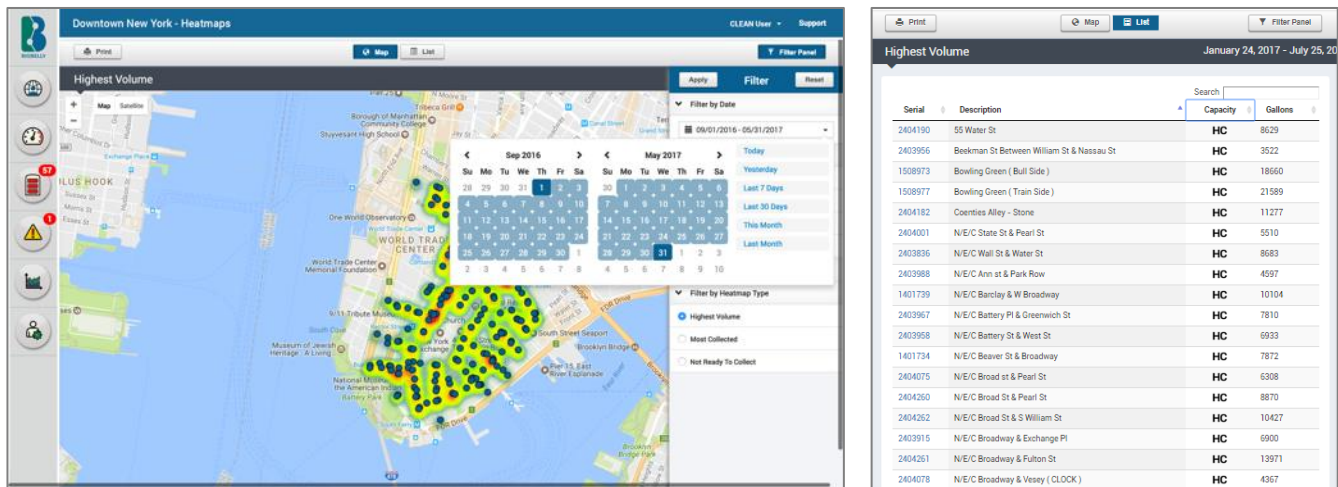
- The **summary bar** in dark gray at the top of the page details the **total number of collections** and total number of missed 'ready to collect' stations during the report timeframe.
- Collection activity **summaries** (top) provide aggregate collection count and display per 'reason for collection.'
- The main section of this page displays a **tabular digest with all collections completed during the timeframe**.
  - Stations (via serial/description) that were collected,
  - Component characteristics: capacity and waste stream,
  - Fullness level at time of collection (compared to fullness threshold),
  - Reason at time of collection (Ready - Fullness, Ready - Alert, Ready - Age, Not Ready),
  - Collection timestamp.
- Missed collections** (stations that were 'ready for collection' during the timeframe, but not collected) are displayed at the bottom of the page.
- The **Filter Panel** contains settings to filter efficiency data by desired timeframe, waste streams, groups. The bar chart in the report will change between daily/weekly/monthly views based on the timeframe selected. Use the **Print** button (top left) for a print-friendly version, or **Export** for a CSV version of your view based on applied filters.

### Analyze & Take Action:

- Leverage this as an operational report to track collection operations. Use the data to understand how efficiently collections are being made, and how labor hours are being used.
- Do you spot any unnecessary collections? These are collections noted in blue – Not Ready to collect!
- Compare the fullness at the time of collection vs. the fullness threshold. How far above or below the threshold were stations when collected?
- If a collection was made when fullness level was far higher than the fullness threshold, use the [Collection Response Time](#) report to understand how long it's taking your staff to respond.

## Report: Heatmaps

The Heatmaps Report details three sets of historical collection information during a specified timeframe.



### What is on this page?

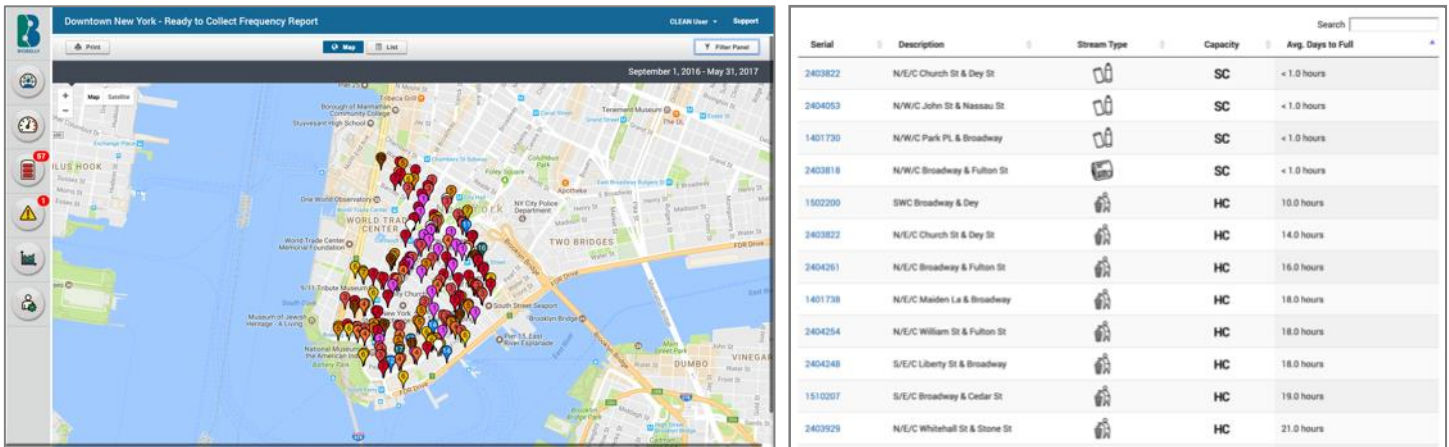
- The **Heatmaps** report is a 3-in-1 report that provides a powerful visualization of historical data gathered from the fleet on the street. It enables you to understand and analyze the data gathered from physical station collections logged in the Bigbelly system. It visualizes three different datasets (select type in Filter Panel):
  - Highest Volume**
  - Most Collected**
  - Most Premature Collections ('Not Ready to Collect')**.
- The **'Map'** view (default view) focuses on trends for a holistic analysis. It visualizes the footprint and showcases valuable insights into the fleet's public space waste volumes and collection habits.
  - Locations that are highlighted in red have a higher volume of waste (or collection frequency, or premature collections before ready) relative to other locations in the deployment. Locations highlighted in yellow/green have the lower volume of waste (or collection frequency, or premature collections).
  - Use the zoom functionality to focus in on an area for more detail, or zoom out to see the bigger picture.
  - The heatmapping resets based on the geographic area shown in the zoom frame.
- The **'List'** view displays a table of the data set from which the map is rendered. Based on the type of heatmap selected, the table details each station location, capacity, total volume collected / total # of collections.
- The **Filter Panel** contains settings to filter heatmap volume or collection data by desired timeframe, waste streams, groups. Use the **Print** button (top left) for a print-friendly version, or **Export** for a CSV version of your view based on applied filters.

### Analyze & Take Action:

- How do your volumes/collection frequency compare with capacity deployed at a given location?
  - Higher volume locations might need additional compactors to balance the volume of waste.
  - Lower volume locations might be candidates to redeploy standard capacity components.
- Do the high and low traffic areas of your fleet match your expectations?
- In which areas can collection routine can be further optimized? These are highlighted by premature collections (red areas on map / highest number of collections in list when 'Not Ready to Collect' heatmap type selected).
- Analyze peaks in collections and capacity needs that may shift with seasonal trends.

## Report: Ready to Collect Frequency

The Ready to Collect Frequency Report details the average time it has taken for a component to be ready for collection.



### What is on this page?

- The **Ready to Collect Frequency** report indicates the fill rate (average number of days until full). The report captures the fill rate / frequency to reach collection readiness for every component in a fleet.
- The default **Map** view pinpoints all station locations with a map marker. The number within the marker indicates the **number of days it takes for the station to reach its 'Ready to Collect' threshold**. For stations with multiple components, the number in the map marker represents an average fill rate of all components within that station.
- The **'List'** view displays a table of the data set from which the map is rendered. This details each station location, stream type, capacity, and the key metric: **Average Days to Fill**.
- The **Filter Panel** contains settings to filter frequency to reach collection readiness data by desired timeframe, waste streams, and groups. Filter by **Fullness Frequency** (days) to refine report for desired use. Use the **Print** button (top left) for a print-friendly version, or **Export** for a CSV version of your view based on applied filters.

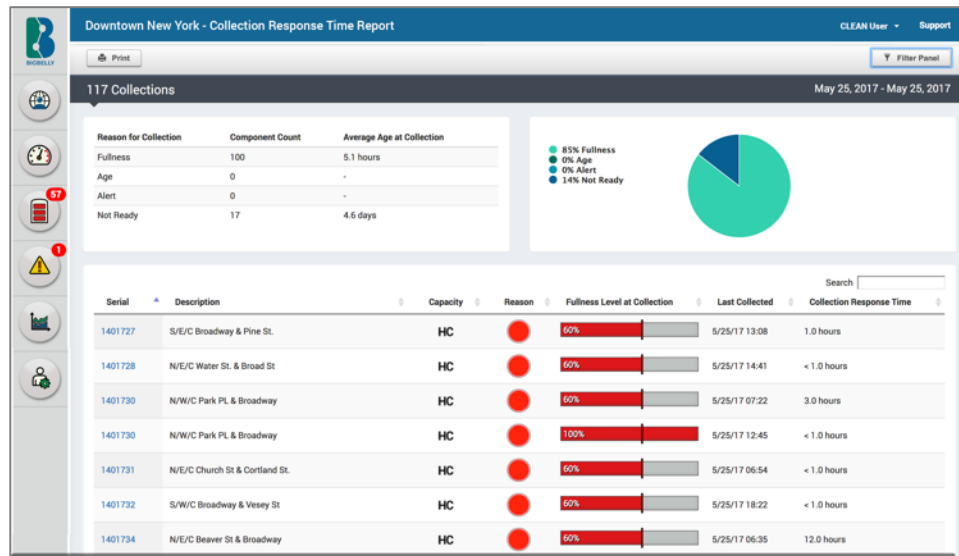
### Analyze & Take Action:

- How can you use this data to assist with route planning and optimization? The average fill rates can assist in predicting which stations will require collection on a typical off-day (weekend, for example) and can be picked up in advance to prevent any overflow risk.
- Use this report in tandem with the [Heatmaps Report](#) to optimize collection activity and allocate resources.
- Do you have the correct capacity in each location? For example, is a Standard Capacity (SC) station filling up every day and thus collected every day? Perhaps this is a candidate to be replaced with a High Capacity (HC) station which would only need to be collected every three or four days!

**Pro Tip:** The frequency to fill data is only as good as your optimized system use. The data will be most accurate when stations are collected when they have reached the threshold for 'ready to collect.' The average fill rate data does not reflect collections made before a station is 'ready to collect'!

## Report: Collection Response Time

The Collection Response Time Report provides collection information regarding elapsed time a station or component remained at a specific fullness event (Fullness threshold, Age based) before being collected.



### What is on this page?

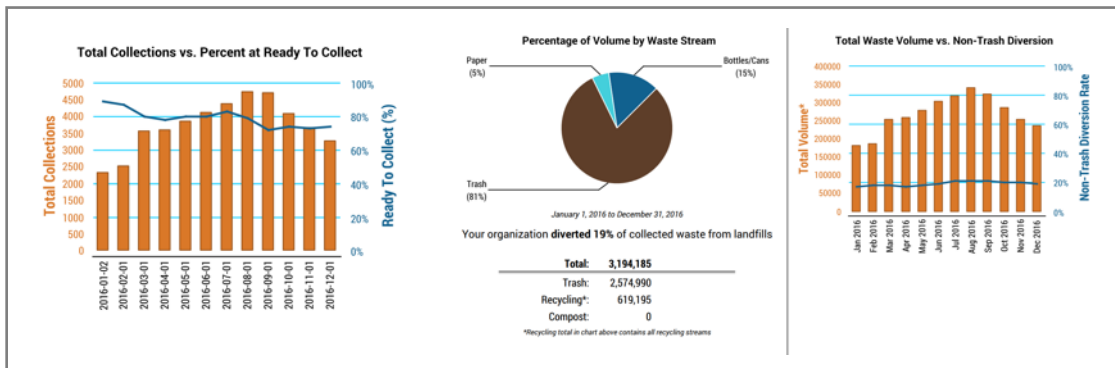
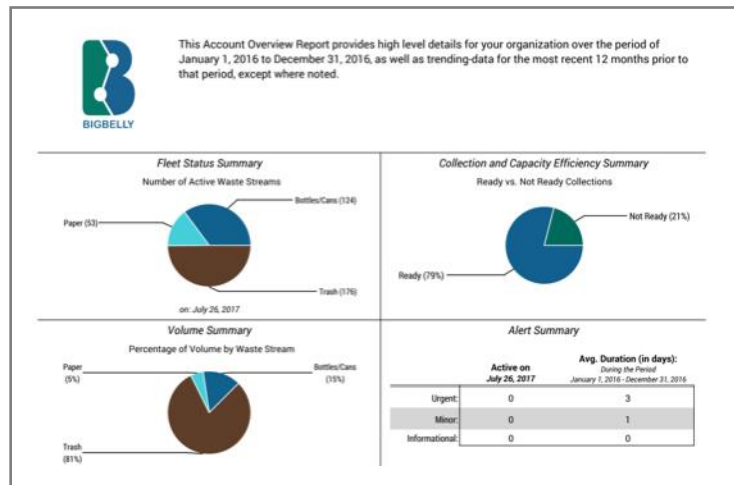
- The **summary bar** in dark gray at the top of the page details the **total number of collections made** during the selected report timeframe.
- Collection activity **summaries** (top) provide aggregate collection count and average age at time of collection for each 'reason for collection' (Ready - Fullness, Ready - Alert, Ready - Age, Not Ready) in the table and pie chart.
- The main section of this page displays a **tabular digest with all collections completed during the timeframe**.
  - Stations (via serial/description) that were collected,
  - Component characteristics: capacity,
  - Reason at time of collection (Ready - Fullness, Ready - Alert, Ready - Age, Not Ready),
  - Fullness level at time of collection (compared to fullness threshold),
  - 'Last Collection' timestamp,
  - Collection Response Time (elapsed time at a specific fullness event before being collected).
- The **Filter Panel** contains settings to filter efficiency data by desired timeframe, collection reason, waste streams, and groups. Use the **Print** button (top left) for a print-friendly version of your view based on applied filters.

### Analyze & Take Action:

- How quickly after stations reach 'ready to collect' are they being collected? Analyze the averages for the timeframe in the activity summaries, then dig in further by filtering the data table as necessary.
- Sort the data table by 'Collection Response Time' (click that phrase to sort). Pinpoint collections that have higher-than-average ages (compared to average in summary at top). These may result in heavier bag weights or higher likelihood for overflow. Filter further by group to determine if any trends exist among collection groups.
- Lengthy collection response time? Create or adjust [notifications](#) to immediately or regularly send/receive an email or SMS when stations are ready for collection. CLEAN's tools can help!

## Report: Account Overview

The Account Overview Report is a downloadable PDF report detailing an at-a-glance account snapshot featuring historical and aggregate data points for a specified time period as well as trending data for selected timeframes.



### What is on this page?

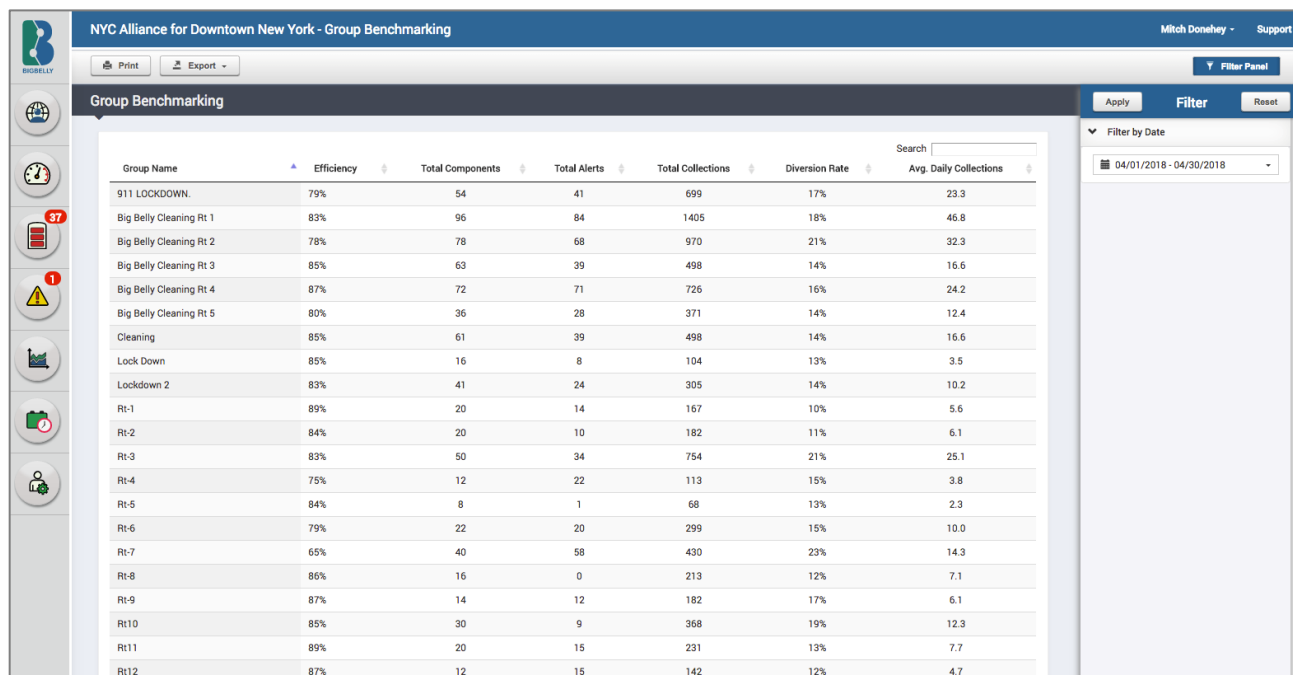
- The **Account Overview** Report offers a snapshot of your Bigbelly operations for a selected timeframe. This PDF report makes it easy to share with relevant stakeholders to show activity, progress and results. Select your desired timeframe: Last 30 Days, Last Month, Last 90 Days, Last 3 Months, Year to Date, Last Year.
- This multi-page PDF report includes a fleet status summary (waste streams and active devices), volume and recycling diversion details, collection and optimized use/efficiency summaries, and system alert summaries

### Analyze & Take Action:

- Set a reminder to download the Account Overview Report every month, or every quarter! This overview allows you to monitor the progress of your account over time, at-a-glance. Use it to determine where you want to dig deeper into other reports to analyze collection, volume, or efficiency trends across groups.
- Print and share this with other stakeholders that may not be involved in the day-to-day operations of your Bigbelly system for an at-a-glance view of the impact of using a smart waste solution!

## Report: Group Benchmarking

The Group Benchmarking Report is a downloadable PDF & CSV report detailing a snapshot of each group in an account, showing their Efficiency, Total Components, Total Alerts, Total Collections, Diversion Rate, & Avg. Daily Collections.



Group Name	Efficiency	Total Components	Total Alerts	Total Collections	Diversion Rate	Avg. Daily Collections
911 LOCKDOWN	79%	54	41	699	17%	23.3
Big Belly Cleaning Rt 1	83%	96	84	1405	18%	46.8
Big Belly Cleaning Rt 2	78%	78	68	970	21%	32.3
Big Belly Cleaning Rt 3	85%	63	39	498	14%	16.6
Big Belly Cleaning Rt 4	87%	72	71	726	16%	24.2
Big Belly Cleaning Rt 5	80%	36	28	371	14%	12.4
Cleaning	85%	61	39	498	14%	16.6
Lock Down	85%	16	8	104	13%	3.5
Lockdown 2	83%	41	24	305	14%	10.2
Rt-1	89%	20	14	167	10%	5.6
Rt-2	84%	20	10	182	11%	6.1
Rt-3	83%	50	34	754	21%	25.1
Rt-4	75%	12	22	113	15%	3.8
Rt-5	84%	8	1	68	13%	2.3
Rt-6	79%	22	20	299	15%	10.0
Rt-7	65%	40	58	430	23%	14.3
Rt-8	86%	16	0	213	12%	7.1
Rt-9	87%	14	12	182	17%	6.1
Rt10	85%	30	9	368	19%	12.3
Rt11	89%	20	15	231	13%	7.7
Rt12	87%	12	15	142	12%	4.7

### What is on this page?

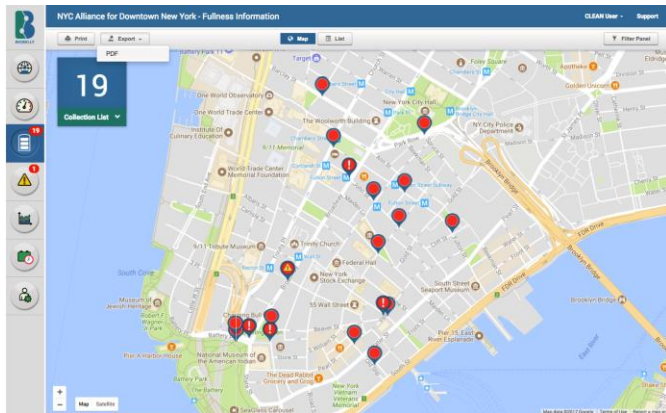
- The **Group Benchmarking** Report offers a snapshot of each one of your groups' Bigbelly operational performances for any selected timeframe. This is the quickest and easiest way to show operational metrics and compare each group.
- View the Collection Efficiency of each group during your selected time period. The Collection Efficiency is the calculation of the percentage of collections users make on 'Ready to Collect' status.
- This report shows the total number of Components in each group. This includes all components (HC, SCC, SCH).
- The total number of Alerts that have been opened during the time period you have selected. This doesn't mean the Alerts are still open. You can check which Alerts are still open by going to the Alerts page and filtering the data by group.
- The Total Collections shows how many times all the stations in each group have been collected.
- The Recycling Diversion Rate is also viewable on this page. The Diversion Rate is the percentage of waste material diverted from the landfill and trash processing facilities
- The Average Daily Collections in this report is different from what is shown in the Collection Summary report. This shows how many total collections on average are made each day. Not the average number of collections that occur per component per day.

### Analyze & Take Action:

- Use this Report to manage each one of your groups, and analyze their performances for comparisons, trends, etc.

## Export Feature

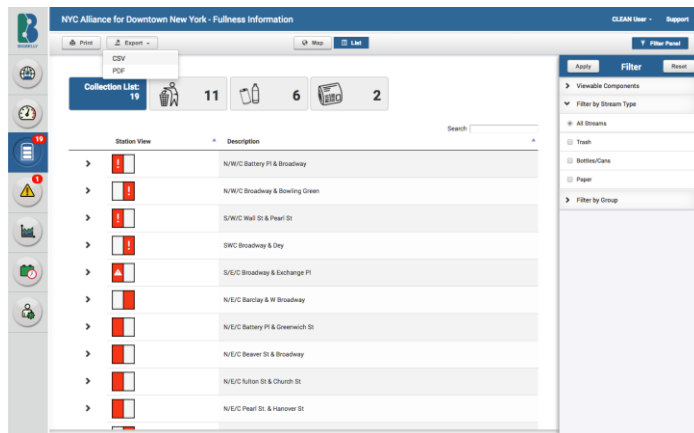
Use the feature to export table data through CSV, maps and reports to PDF, and charts to JPG images.



### PDF export is available on the following pages:

- Fullness Page
- Asset Page
- Daily Collection Activity Report
- Heatmap Report
- Collection Response Time Report
- Group Benchmarking Report

The Collection Summary Report, Ready to Collect Frequency Report, and the Alerts Page can be downloaded as PDFs by pressing "Print" in the top left corner of the page.



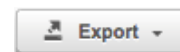
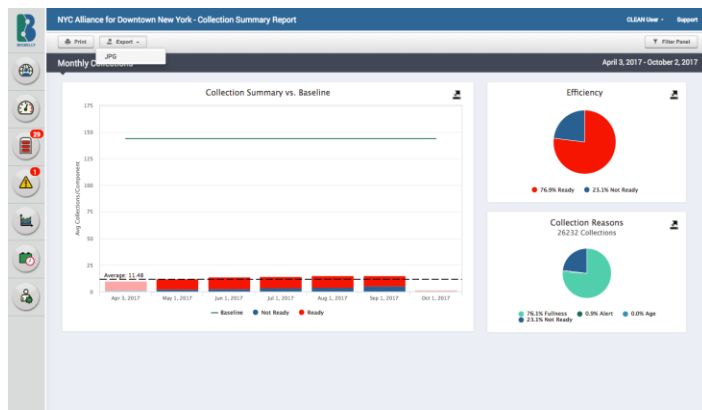
### CSV export is available on the following pages:

- Fullness Page (List View)
- Asset Page (List View)
- Daily Collection Activity Report
- Heatmap Report (List View)
- Ready to Collect Frequency Report (List View)
- Collection Response Time Report
- Group Benchmarking Report

### JPG export is available on the following pages:

- Collection Summary Report
- Collection Efficiency Report

\*Export each chart individually.



## Tips for Bigbelly Distributor Users

This section will help explain areas of the CLEAN software that can be changed to help manage their team as well as their customers' deployments.

### How To: Create a New CLEAN Account

- 1) Start in your Global Overview page
- 2) Click the Administration icon
- 3) Click the Manage Accounts icon
- 4) At the top of the page will be a "Create Account" button.
- 5) A Pop up window will appear where you must fill in the new account details
  - a. Type an Account Name
  - b. Uncheck the "Connect Customer" box
  - c. Leave priority as "Unknown"
  - d. Fill in all customer Address fields
  - e. Choose the customer's Time zone
  - f. Change Volume units to "Liters"
  - g. You do not need to edit the Collection Time Threshold at "6 Hours"
  - h. You do not need to edit the GPS Alert setting
  - i. Fill in all Primary Contact information fields
  - j. You do not need to edit the Default Station Configuration settings.
- 6) Click Save

### How To: Change Account Volume Measurement Preference (Gallons vs. Liters)

1. Start in the Global Accounts Page
2. Navigate to the Manage Accounts Page (access for Account Administrators and Distributors only)
3. Click the pencil icon next to the Account that you would like to edit (Pop-up window will appear)
4. Click the dropdown next to 'Volume Units' and select either Gallons or Liters
5. Click 'Save'

Volume Units Gallons ▾

### How To: Move Stations to Another CLEAN Account

- 1) Find the Station serial number you would like to edit
- 2) Click the Station serial number link (A new internet tab will open)
  - 1) Click the Edit station button (pencil and paper icon) on the right side of the page. (A Pop up window will appear)
- 3) Look for the Account line at the top left side of the new window
- 4) Select the new account from the drop down box (You will only be able to select an account that is assigned to your User Role)
- 5) Click Save





## Mobile App

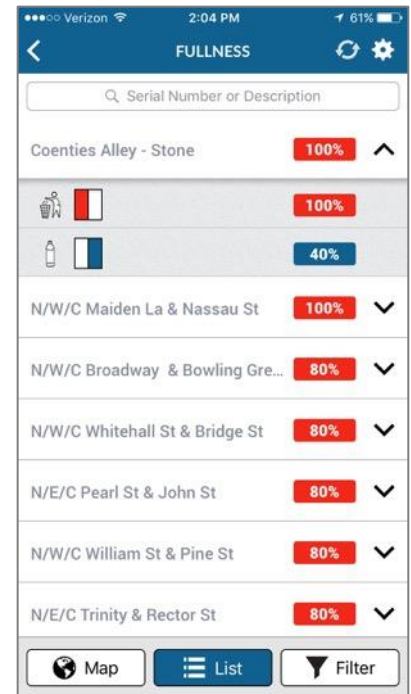
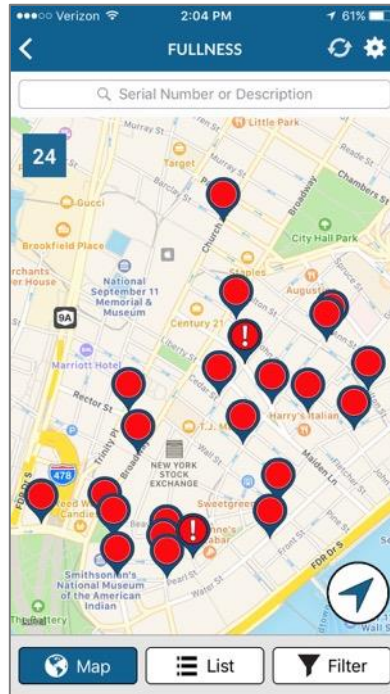
The CLEAN Mobile App ([available for Android and iOS devices](#)) puts the most actionable items and real-time fleet data at your fingertips and directly on your smartphone.

## Collection List


- The **Collection List tool** offers both a Map and List view which display stations in your fleet that need to be collected as well as abbreviated station details. Click a map marker in the Map view to see component-level 'as-seen-on-street' view. Click the location description in List view for the same info.

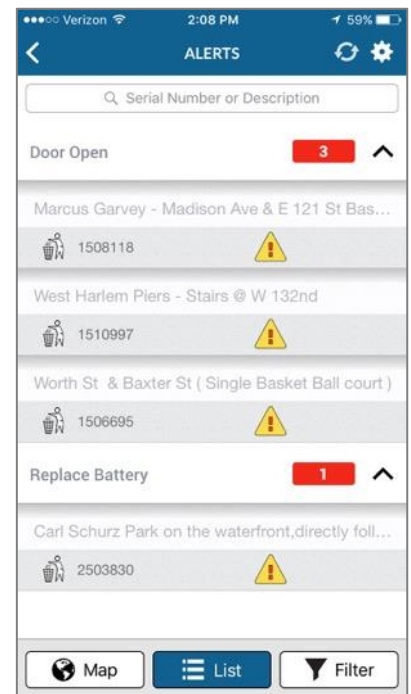
[See the Collection List section for more information on when to collect.](#)

- Click the **GPS navigator button**  when you are on-the-go to re-center the map right around you, and easily locate stations that need collection in your proximity.
- Click on a station then click the **directions button**  to open the Maps app and get directions to the station.
- Apply the **Filter** to sort the Collection List by waste stream, group, and collection readiness reason.



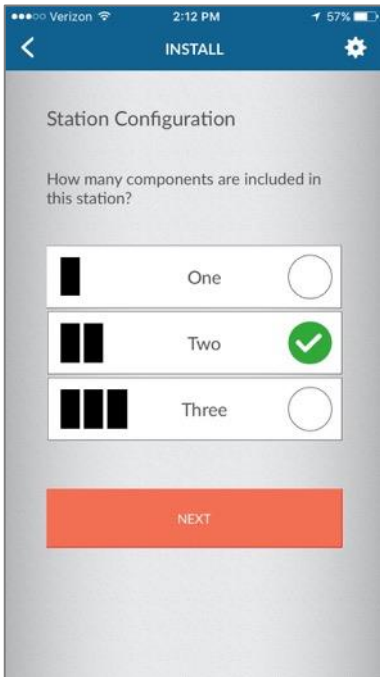
## Alerts

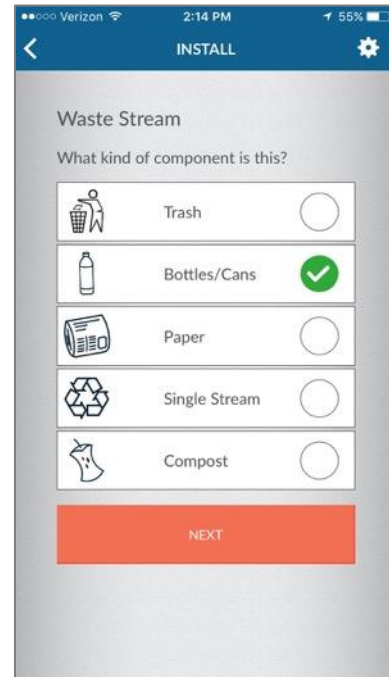
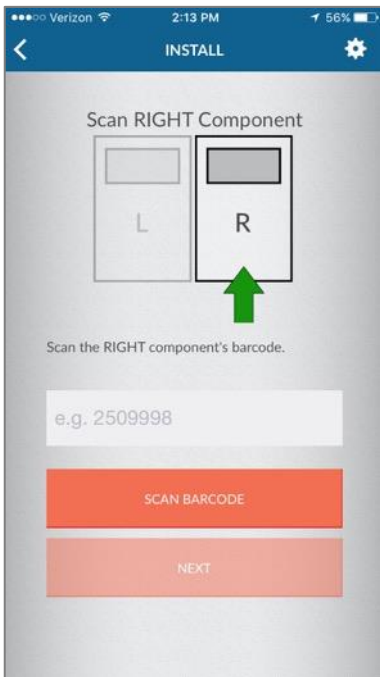
- The **Alerts tool** offers both a Map and List view to determine which stations in your fleet are under active alert and need to be serviced. Click on the map marker in Map view, or location description in List view to show additional alert types and details.
- Click the **GPS navigator button**  when you are on-the-go to re-center the map right around you, and easily locate stations that need service in proximity.
- Apply the **Filter** to sort by alert type (urgent, minor, informational), waste stream, or group.



## Install Tool

Use the CLEAN Mobile App's Install Tool to quickly get your new stations set up in CLEAN.



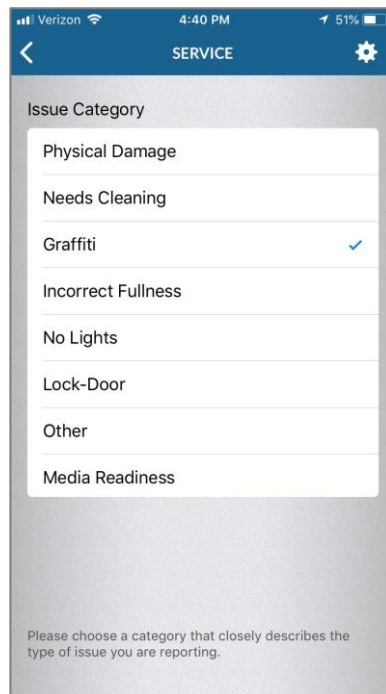
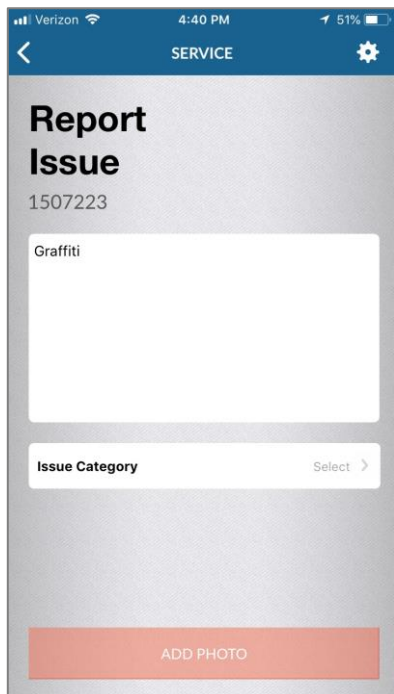
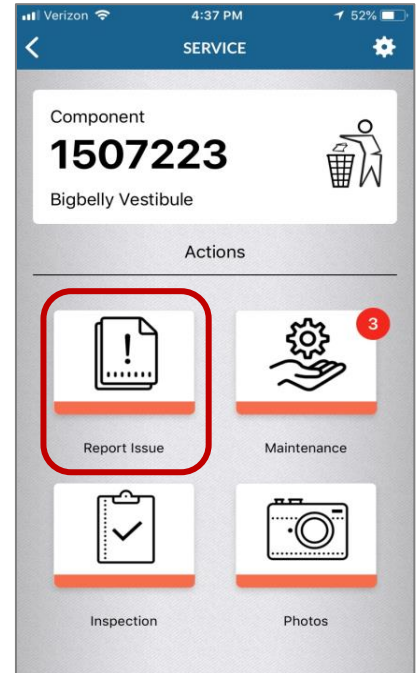
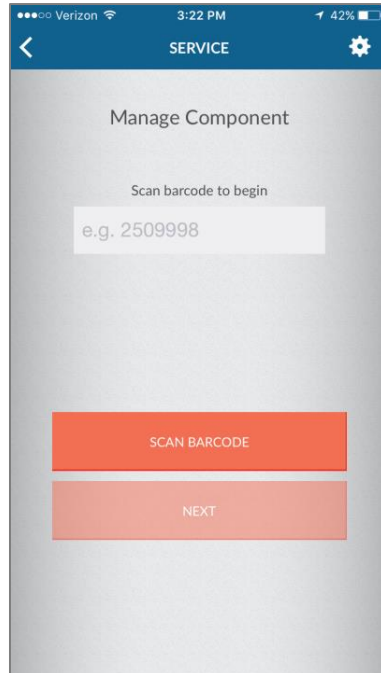

## Taking Action: Using the Mobile App's Install Tool

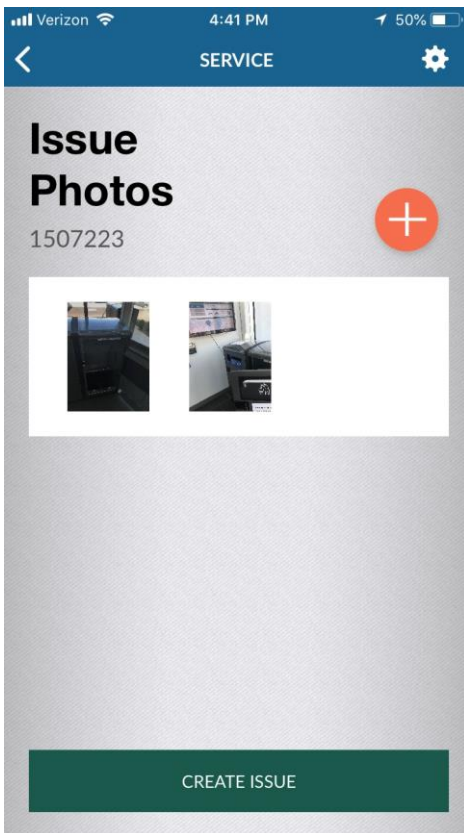


1. Log into the CLEAN Mobile App
2. Click on the Install Tool icon
3. Select the station configuration (number of components)
4. Either scan the barcode on the component (allow access to phone's camera), or type the station serial number
5. Select the waste stream of the component
6. Select the GPS location
7. Enter a location description and add a photo if necessary
8. Select a group for the station
9. Repeat as necessary for the number of components at the station location


## Service Tool – Report Issue

Take a picture or add a note to a component while servicing a station, and have them immediately uploaded to CLEAN.



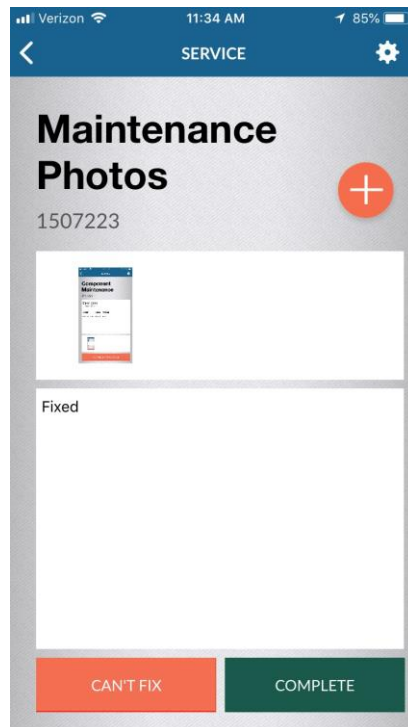
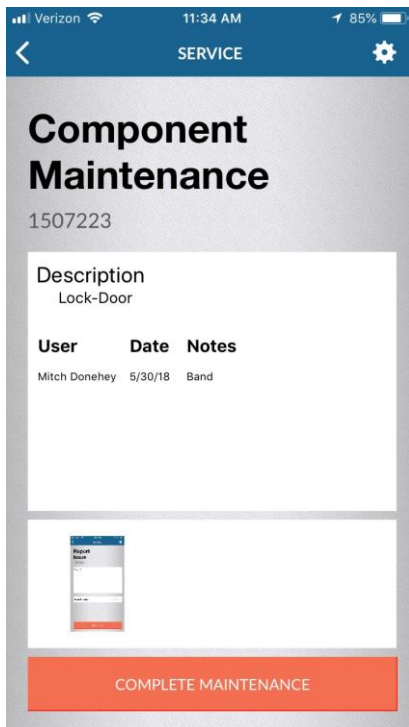
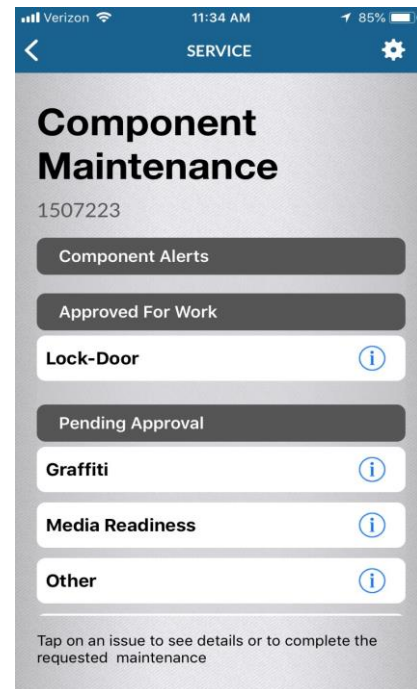
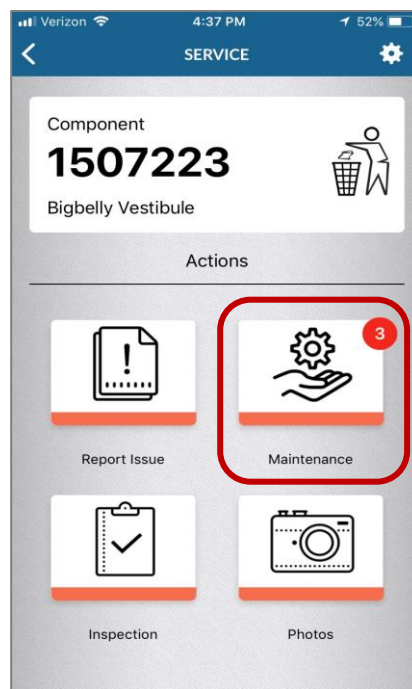
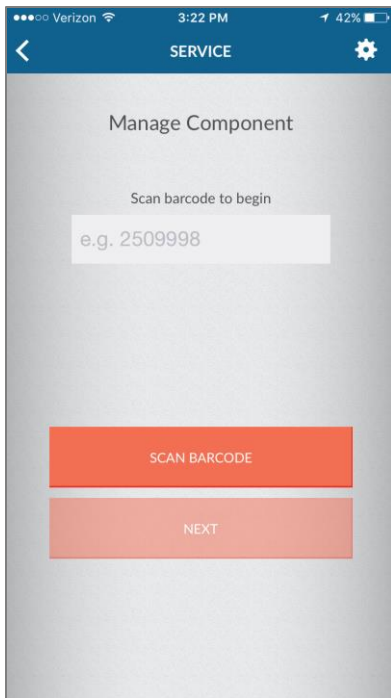


## Taking Action: Using the Mobile App's Report Issue Tool

1. Log into the Mobile app
2. Click on the Service Tool Icon 
3. Type in the Station's Serial Number or scan the barcode on the station
4. Choose the Report Issue option
5. Add Notes to your station
6. Click on the Issue Category below the notes
7. Select the type of issue that is happening on the station (Note: this list of issues scrolls down)
8. Add a photo of the station. You may enter more photos by clicking the + button in the top left of the screen.
9. When finished click the green "Create Issue" button at the bottom
10. Log into CLEAN, click on the serial number in your Assets page, and go to the "Service" tab to view the note and photo

## Service Tool – Maintenance

Take a picture or add a note to a component while servicing a station, find the Alerts a station has, which Alerts are approved for work, and what is pending approval.



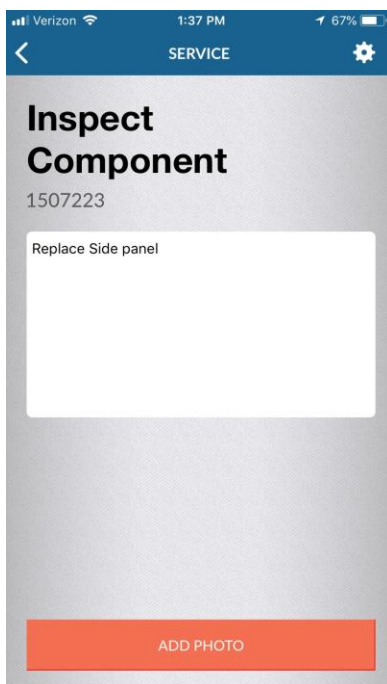
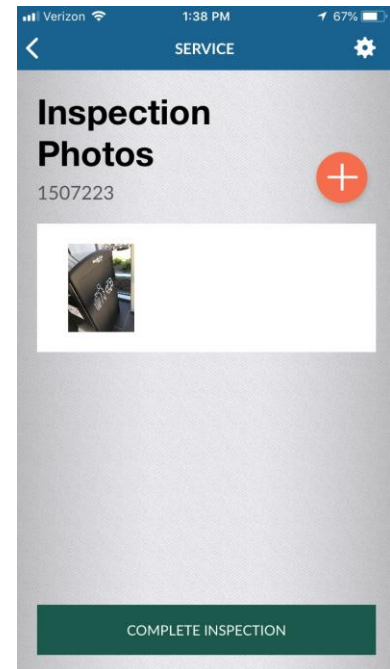
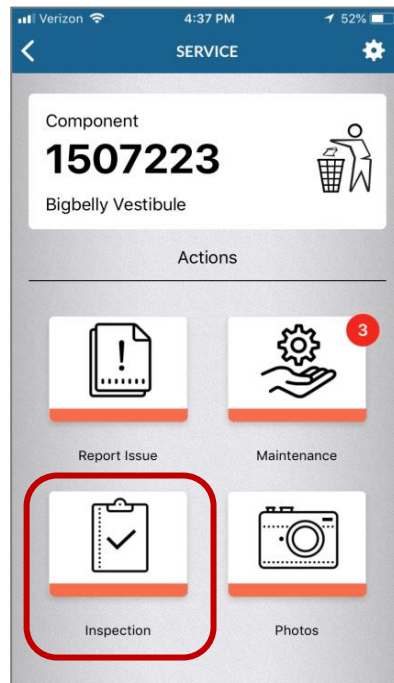
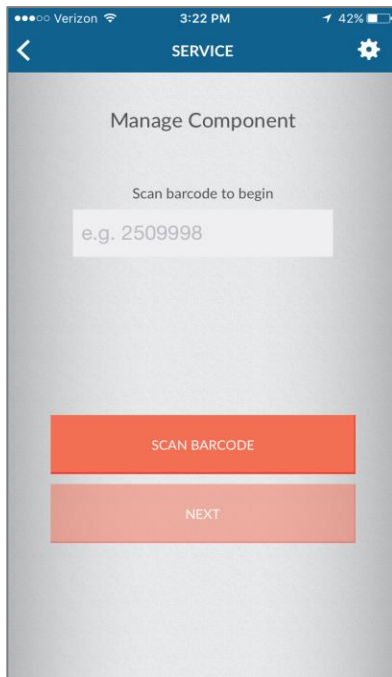
## Taking Action: Using the Mobile App's Maintenance Tool

1. Login to the Mobile App
2. Click on the Service Tool Icon
3. Type in the Station's Serial Number or scan the barcode on the station
4. Choose the Maintenance option
5. Select the work that has been approved for service
6. Press the complete maintenance button at the bottom
7. It will ask you to add a photo, choose an existing photo in your camera roll, or take one. You may enter more photos by clicking the + button in the top right of the screen.
8. Add in your notes
9. Click Complete or Can't Fix at the bottom
10. Log into CLEAN, click on the serial number in your Assets page, and go to the "Service" tab to view the note and photo



## Service Tool – Inspection

Take a picture or add a note to a component while inspecting a station, and have them immediately uploaded to CLEAN.



## Taking Action: Using the Mobile App's Inspection Tool

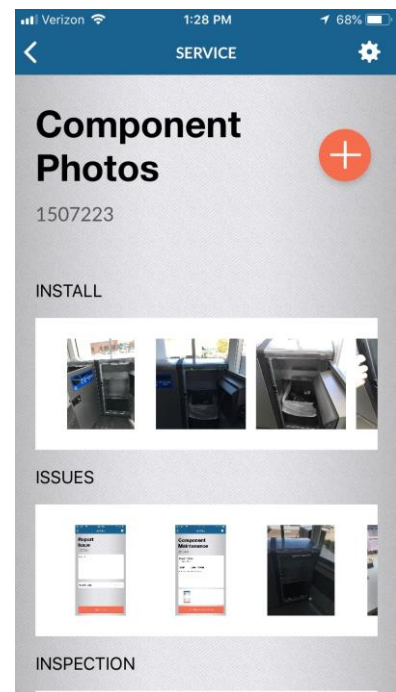
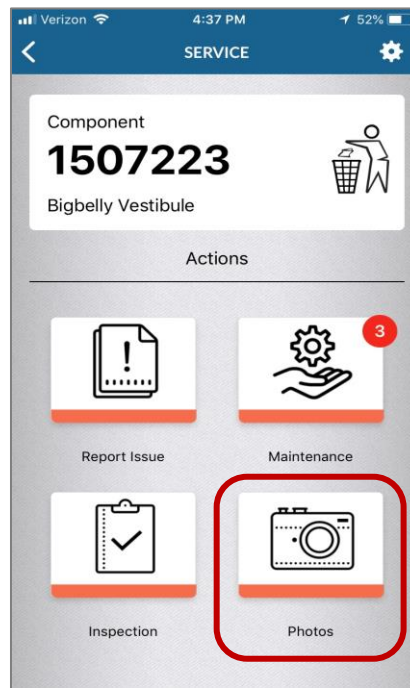
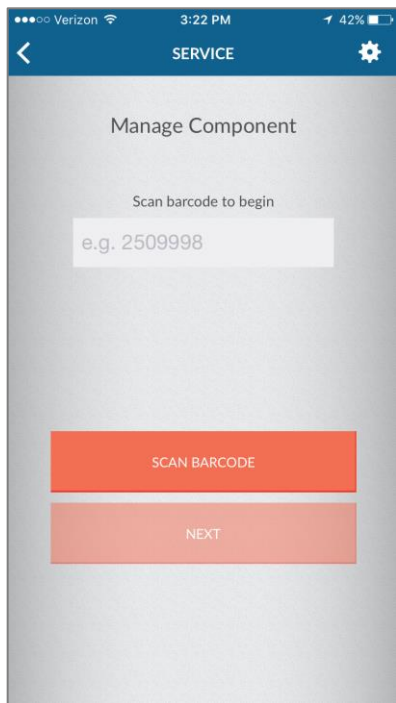
1. Login to the Mobile App
2. Click on the Service Tool Icon
3. Type in the Station's Serial Number or scan the barcode on the station
4. Choose the Inspection option
5. Add your notes
6. Click Add Photo. Choose an existing photo in your camera roll, or take one. You may enter more photos by clicking the + button in the top right of the screen.
7. Click the Complete Inspection at the bottom



Log into CLEAN, click on the serial number in your Assets page, and go to the "Service" tab to view the note and photo

## Service Tool – Photos

Take a picture or look at the older photos posted at a station, and have them immediately uploaded to CLEAN.



## Taking Action: Using the Mobile App's Photo Tool

1. Login to the Mobile App
2. Click on the Service Tool Icon
3. Type in the Station's Serial Number or scan the barcode on the station
4. Choose the Photos option
5. Review the Photos that have been uploaded, scroll to see all (Install, Issues, Inspection, Photos)
6. Add more photos and notes by clicking the + button in the top right of the screen.
7. Click Add Photo. Choose an existing photo in your camera roll, or take one.
8. Log into CLEAN, click on the serial number in your Assets page, and go to the "Service" tab to view the note and photo



## CLEAN API

The CLEAN API allows for specific data to be pulled from CLEAN by third party applications. Each API user is allowed 3,000 requests per day and after 3,000 requests all future requests are blocked until the next day.

*Use the CLEAN API to create powerful integrations and display Bigbelly smart waste data in third-party systems for your smart city, campus, or facility.*

The cloud-based CLEAN platform is the central data system of the Bigbelly smart waste system. Stations communicate with CLEAN to determine fullness, collection readiness, functional status, and more. System data can be viewed in the web portal, mobile app, auto-generated notifications, and can now be programmed into third-party applications using the API. The smart waste data set can be integrated into outside systems for a holistic view of your smart operations.

The API extends the Bigbelly system functionality and provides a data feed for customers looking to develop data-backed, centralized platforms. The REST-based API gives you read access to your smart waste data to display the data in other systems.

Bigbelly's API enables flexible querying of data stored in the CLEAN software platform to the display of smart waste data in third-party programmed applications. Developers can write integrations using the CLEAN API to transmit selected data updates as they occur at the stations and in CLEAN. The API allows customers to transmit CLEAN data to other platforms and create a functional integration quickly and easily. **Customers can query data including...**

- Account Assets - Station Location, Description, Profile
- Status - Station Fullness Status & Collection Readiness
- Collection List - Station Ready to Collect
- Collection Summary for specified timeframe
- Alerts on the Account and Component levels
- Collection Frequency, Fill Rate, and Volume Metrics
- Collection Efficiency Metrics
- Filtered by groups, current and historical timeframes



The API is available to all Bigbelly customers as part of their CLEAN License. CLEAN API is available to account owners upon request; please contact [cedept@bigbelly.com](mailto:cedept@bigbelly.com) to request an API user type and authorized key. Programming by development or IT group is required to integrate CLEAN data via the API into customers' third-party applications. We have updated documentation and a sample website that can be used to help customers integrate the new API into their system.

### Additional Resources:

Learn more about the API use cases and integrations: <https://info.bigbelly.com/clean-api>

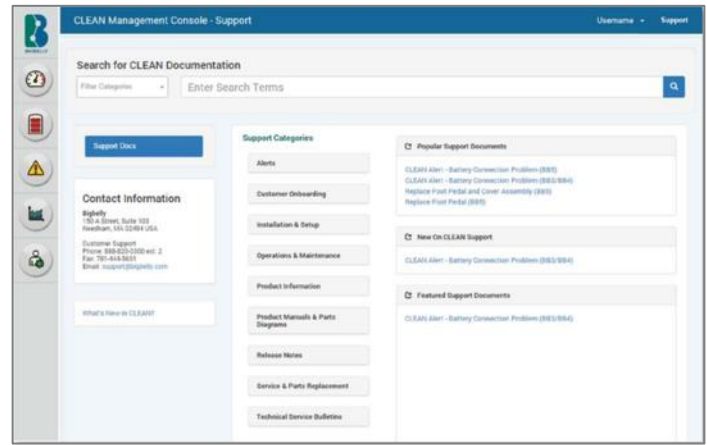
Learn more about the technical API capabilities: <https://clean.bigbelly.com/support.jsp?docId=485>

## Bigbelly Support Portal

The Support Portal: a single destination for all product support needs.

### What is on this page?

- The Support Portal provides easy-to-use access to the full breadth and depth of the Bigbelly System support knowledgebase.
- Find content via three methods: filter by category, search by keyword, and browse by topic.
- The Support Portal uses dynamic page content and refined document viewing to provide relevant documentation whether users prefer to enter a search query then refine by category, or browse by these topics:
  - Alerts
  - Best Practices & FAQ
  - Customer Onboarding
  - Installation & Setup
  - Operation & Maintenance
  - Product Information
  - Product Manuals & Parts Diagrams
  - Release notes
  - Service & Parts Replacement
  - Technical Service Bulletins
- Popular, New, and Featured documents are also called out for a quick reference to noteworthy Bigbelly System support documentation.
- Users can also find the Bigbelly Customer Support Team contact information on the Support Page in the event they require the help of a knowledgeable product expert in troubleshooting to resolve any questions or issues.



**Pro Tip:** Use the search function and familiar key words if you are not sure what you are looking to locate.

## Additional Support from Bigbelly

### CLEAN Software Questions / Training and Onboarding

Email: [CEdept@bigbelly.com](mailto:CEdept@bigbelly.com)

### Parts Quotes / Orders

Phone: 888-820-0300 ext. 2

Fax: 781-444-5651

Email: [parts@bigbelly.com](mailto:parts@bigbelly.com)

### Technical Support

Hours: M-F, 7AM – 6PM EST

Phone: 888-820-0300 ext. 3

Fax: 781-444-5651

Email: [support@bigbelly.com](mailto:support@bigbelly.com)

## CLEAN Management Console & Bigbelly System Glossary

- **Account Administrator:** Individual CLEAN user role with access to all pages in CLEAN; Ability to add/edit users, reset passwords, set up stations; All other administration capabilities related to editing the CLEAN account
- **User:** Individual CLEAN user role with access to Fullness Information page
- **Service:** Individual CLEAN user role with access to Fullness Information, Alerts, and Account Assets pages
- **Dispatcher:** Individual CLEAN user role with access to Dashboard, Fullness Information & Reports Pages (except Daily Activity & Account Overview)
- **Administration Group:** Standard group option: Used for organizing a deployment by location, operations, etc.
- **Collection Group:** Provides the ability to add baseline data which is incorporated into the "collection summary report"
- **Baseline:** Shows average weekly collection with the Bigbelly system in comparison to before Bigbelly collections
- **Green Fullness Level:** Indicator that station does not need to be collected yet
- **Red Fullness Level:** Standard level for Bigbelly stations where waste should be immediately collected
- **Real-time status:** Live data reported directly from stations and displayed in CLEAN
- **Collection Efficiency:** The calculation of the percentage of collections users make on 'Ready to Collect' status
- **Fullness Threshold:** The maximum percentage of waste you would like a station to hold before collection
- **Age Threshold:** The maximum age since last collection you would like a station to wait before collection
- **Age:** How long an alert or warning has been active, as well as how long the station has been at a collection readiness status
- **Route Time:** How long it takes for waste collectors to collect all waste from their deployments
- **Travel Time:** How long it takes for waste collectors to travel between each collection
- **Diversion Rate:** The percentage of waste material diverted from landfill and trash processing facilities
- **Fleet/Deployment:** All the Bigbelly stations installed for an account
- **Trash:** Any form of discarded matter that is not recyclable
- **Hopper:** Top compartment of a Bigbelly that is opened to dispose trash
- **Generations:** The evolution of Bigbelly stations (Currently 3, 4, and 5)
- **Troubleshooting:** A way to solve a serious matter or problem, specifically within a company
- **Urgent Alerts:** Serious issues requiring immediate attention
- **Minor Alerts:** An alert triggered by the Bigbelly that is a less serious maintenance issue that must be addressed
- **Informational Alerts:** An alert triggered by the Bigbelly that is less serious, yet something to be aware of