

This document contains information about new features, improvements and resolved issues in the FleetMind family of products.

NOTE: It is assumed that the reader of this document possesses working knowledge of FleetMind products.

Refer to the following table for information on software products affected, and their version/build numbers.

Software title	Version/Build number (up to and including)
FleetLink Route System	2.1.0.2242
FleetLink Mobile	5.49.0.667
FleetLink Reports	2.28.0.247
Command Center	5.23.0.1013
FleetLink Map	4.24.0.185
FleetMind API	2.201.0.250

NEW FEATURES

Email-based User Authentication

As of this release, all customers who purchase the new FleetMind suite of products or upgrade their existing suite will now use email addresses instead of usernames to identify and authenticate users.

This change enables users to use a single set of login credentials to sign in to all available FleetMind applications at once.

For this change to take effect for existing FleetMind customers, the following events have to occur:

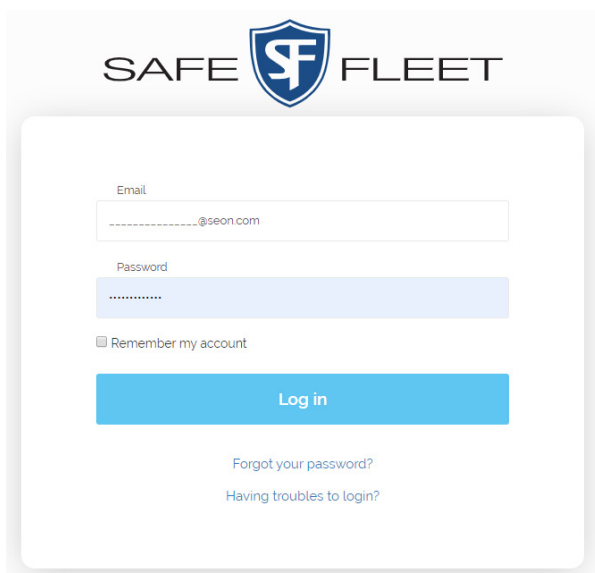
- Each user provides a verifiable and unique email address.
- Migration of existing users is performed by FleetMind Support team.
- Once the migration is complete, users sign in to FleetMind applications using a new Safe Fleet login dialog.

Logging in with Email-Based Authentication

Verified users (new or those who have been migrated to Email-based Authentication) can sign in to any available FleetMind application from their FleetMind landing page with their email and password.

To log in to any FleetMind application:

1. Open your FleetMind landing page.
2. Click the application you want to access. The Safe Fleet login dialog is displayed.



3. Enter your email address and password in the corresponding fields, and click **Log in**. **NOTE:** If the system is unable to log you in, contact FleetMind Support.

IMPROVEMENTS

This section describes improvements of existing functionalities intended to optimize customer experience.

FleetLink Route System

FMINT-233 Customers are notified when the delivered container is of the wrong size

You can schedule container delivery for newly subscribed customers. Containers dropped off by drivers may erroneously not be of the size the customer has subscribed for. Previously, if such a mistake occurred, the system would not notify customers who use third-party billing systems of this error.

As of this release, when a container that has been dropped off is of the wrong size, a customer using a third-party billing system is properly notified and can choose to either reschedule or accept.

FMSUP-61 Number of route expiration days can be set for a multi-day route

You can add or edit routes that take more than one day to complete. Previously, the system would not allow users to specify the number of days after which such routes would expire.

As of this release, you have the ability to specify a number of days after which a multi-day route expires. As a result of this improvement, any stops included in such route that have not been serviced yet are carried over to the next day and automatically dispatched by the system until the day when the route expires.

The screenshot displays the 'Multi Day Route' configuration form. The 'Route Expiration Days' field is circled in red, indicating the new functionality. The form also includes a map view on the right side showing the route path.

FMRMS-1525 Time restrictions parameter is removed from Edit Location screen

You can make various changes to a customer location. Previously, you had an ability to set time restrictions for locations that preferred their services rendered only at certain times of day. You could do so by navigating to the **Edit Location** page and selecting the **Restrictions** tab.

As of this release, the **Restrictions** tab and the corresponding functionality tab have been removed from the user interface.

FMRMS-1520, FMRMS-1517, FMRMS-1519, FMRMS-1504 Additional customer information can be entered, exported, and imported back

As of this release, new custom configurable fields have been added to the **Search Customers** page, as well as to the **Edit Customer** page. The fields allow you to add information to a customer profile; and then filter the search results by the same criteria. Additionally, the data that appears in the search results when the new custom search fields are used, can be exported and then imported back into the system.

The screenshot shows the 'Edit Customer' form in FleetMind. The form is organized into several sections:

- Customer Id:** A text input field.
- Active:** A checked checkbox.
- Prospect:** An unchecked checkbox.
- Billable:** A checked checkbox.
- Suspend:** An unchecked checkbox.
- WOID Required:** An unchecked checkbox.
- Last Name:** A text input field.
- First Name:** A text input field.
- Business Name:** A text input field.
- Customer Prefix:** A dropdown menu with 'Select...' as the current selection.
- Customer Class:** A dropdown menu with 'Select...' as the current selection.
- Office Phone:** A text input field.
- Home Phone:** A text input field.
- Email:** A text input field.
- Fax:** A text input field.
- Driver Comments:** A text input field.
- Custom1:** A text input field, circled in red.
- Custom2:** A text input field, circled in red.
- Billing Address:** A section containing:
 - Civic #:** A text input field.
 - Street:** A text input field.
 - Apt/Suite:** A text input field.
 - City:** A text input field.
 - District:** A text input field.
 - State/Province:** A dropdown menu with 'Select State...' as the current selection.
 - Postal Code:** A text input field.
- Customer Suspension Duration:** A section containing:
 - From:** A text input field.
 - To:** A text input field.
- Save Customer:** A green button with a save icon, located at the bottom right of the form.

FleetLink Mobile

FMMOB-565 WasteApp operates on new Trek 674 with an MC7304 modem

As of this release, customers using the new Trek 674 units with MC7304 modems, can successfully operate the WasteApp application on these units.

Command Center

FMMOB-559 Default hardware profile is available for Panasonic FZ-G1 MK5 tablets

You can add and configure mobile devices in the FleetMind Command Center application.

As of this release, a default hardware configuration profile with minimum required parameters has been added to the system for Panasonic FZ-G1 MK5 tablets.

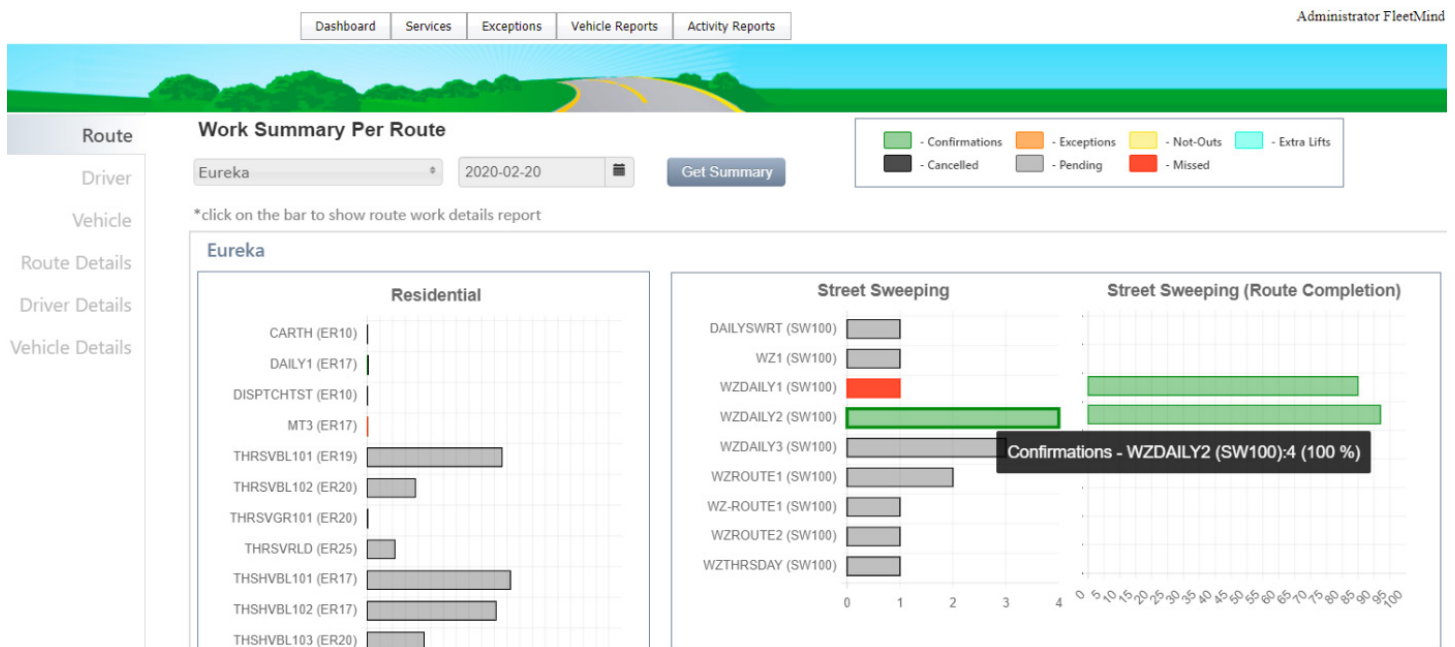
FleetLink Reports

FMREP-139 Work Zone route daily work summary display is improved

You can review bar graphs, representing route progress on the **Work Summary Per Route** screen that can be accessed by selecting **Daily Work Summary** from the **Activity Reports** menu.

As of this release, graphs representing the progress of Work Zone routes have been modified as follows:

1. A **Street Sweeping** on-demand bar graph, displaying the progress of on-demand assignments. This graph has the following attributes:
 - Progress from 0 to 100%
 - The number of confirmations out of the total number of assignments, e.g. 1 out of 4 (total)
 - Gray color bars gradually changing to green as the number of completed on-demand assignments grows
 - Recurring stops are included in the on-demand completion percentage
 - The information on percentages and number of assignments is displayed on hover.
2. A **Street Sweeping (Route Completion)** route bar graph, displaying the percentage of route completion. This graph has the following attributes:
 - Progress from 0 to 100%
 - The actual percentage of route completion, e.g. 90%
 - White color bars gradually changing to green proportionally with the percentage of route completion
 - The information on percentages is displayed on hover.



FleetLink Map

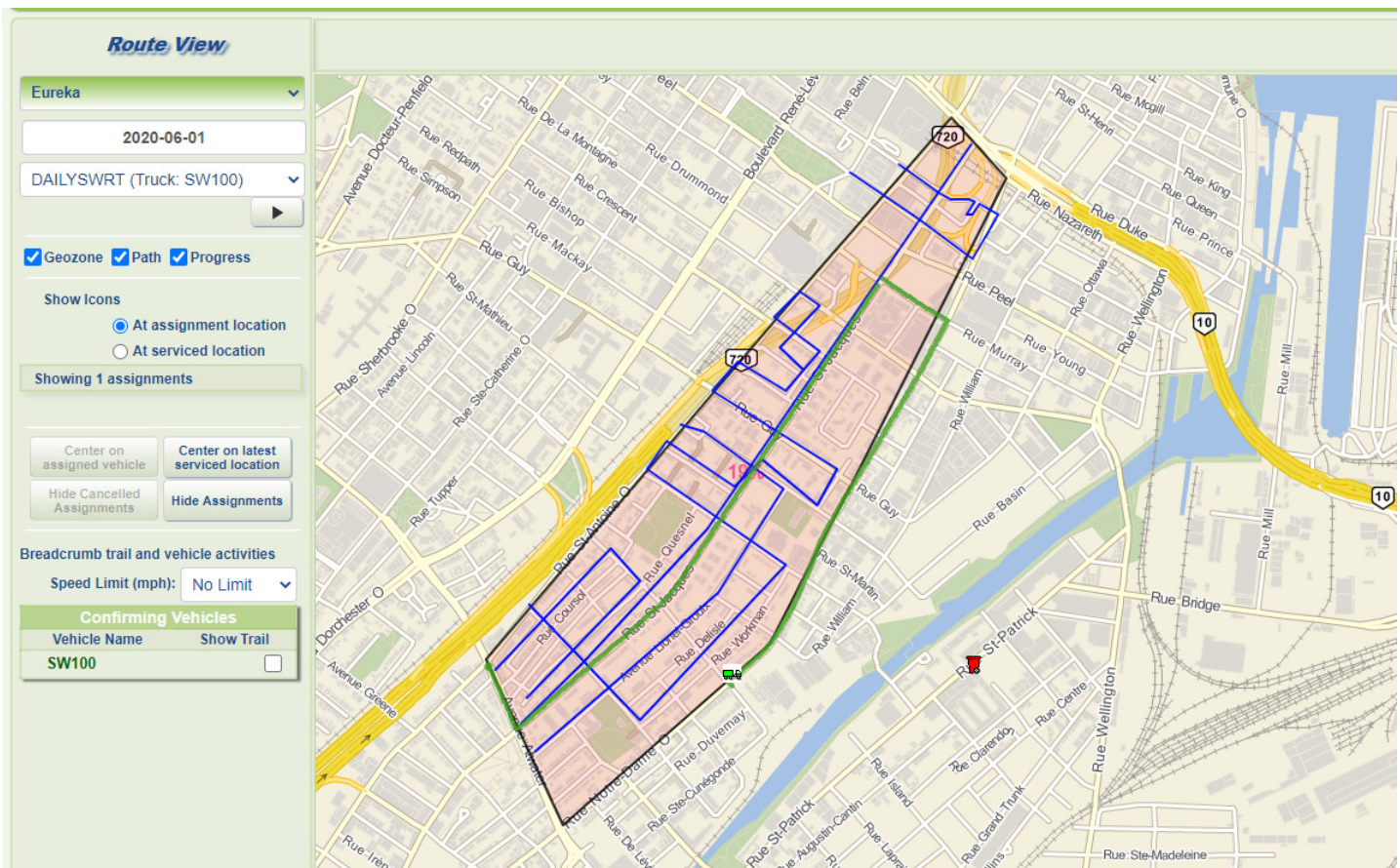
FMREP-141 Filters are available for displaying information on Work Zone routes

You can view the Work Zone route progress and other information on the map by selecting **Route View** from the **Fleet Status** menu on the top menu bar.

As of this release, the following filters are available for displaying various information about Work Zone routes:

- You can select the **Geozone** checkbox to display the corresponding geozone.
- You can select the **Path** checkbox to display the corresponding route path.
- You can select the **Progress** checkbox to display the progress of the route.

Additionally, the percentage of route completion is displayed on the map, as well as the status of assignments.



As of this release, the new information box is available for viewing on the Panasonic FZ-G1 supervisor tablets. The new information box contains information related to the most recently clicked item on the map. It is located in the lower right corner of the tablet's screen and can be expanded or collapsed as needed. See the screenshot on the next page.



SOFTWARE PROBLEMS RESOLVED

This section describes existing issues that have been fixed, including details and resolution of each problem.

FleetLink Route System

FMSUP-416 Work Zone routes can successfully be deleted

You can delete routes in FleetLink Route System. Previously, when you tried to delete a Work Zone route, and error message would be displayed. As a result, users were unable to delete these routes.

This software problem has been resolved. In the described context, Work Zone routes can successfully be deleted.

FMRMS-1514 Routes can be successfully resequenced in breadcrumb trail mode

You can resequence an existing route to improve efficiency. One of the methods of resequencing involves using historical data (breadcrumb trail) that exists in the system for a particular route. Previously, when you attempted to resequence a route in the breadcrumb trail mode, the system would freeze and could not complete the initiated resequencing task. As a result, it was impossible to optimize a route for efficiency using the breadcrumb trail mode.

This software problem has been resolved. In the described context, the system successfully completes the resequencing task and the route is successfully optimized.

FMRMS-1479 Deleted default reference data values are no longer re-inserted after application update

Users can customize (add or delete) the database values that define their reference data. Previously, when a FleetLink Route System application update was performed by the FleetMind team, the system would re-insert the **Workflow** and **Operating Department** default values that were previously deleted by the user, along with associated information. As a result, these values and associated information would appear in the user's reference data.

This software problem has been resolved. In the described context, the system no longer re-inserts the previously deleted values into the database after an application update.

FMENG-1460 Route geozones can be added to multi-day work zone routes

You can create a route geozone for an existing multi-day work zone route. To do so, navigate to **GeoZones > List GeoZones > Route GeoZones > Add New**, and then enter the route geozone details, draw a geozone polygon on the map, select the route of interest from the **Routes** drop-down list and click **Save**. Previously, the system failed to add the new route geozone to a multi-day work zone route. As a result, a route-associated geozone could not be created.

This software problem has been resolved. In the described context, the system successfully adds a new route geozone to an existing multi-day work zone route.

FMENG-1384 Civic Number column is displayed on the Customer Locations Not GeoCoded page

Customer locations can be geocoded (have geographical coordinates added to them). You can display a list of customer locations that have not been geocoded by selecting **Customer Locations Not GeoCoded** option from the **Customers** menu. Previously, the **Civic Number** column was missing from the displayed list. As a result, the full civic address of a customer location would not be displayed on the list.

This software problem has been resolved. In the described context, the **Civic Number** column is displayed on the list and contains the information pertinent to customer locations.

Routes ▾ Inventory ▾ Customers ▾ Reference Data ▾ GeoZones ▾ Reports ▾ Help ▾ [Logout Administrator FleetMind](#)

[Home](#) / [Customers](#) / [Customer Locations Not GeoCoded](#)

Customer Id

Contact Phone

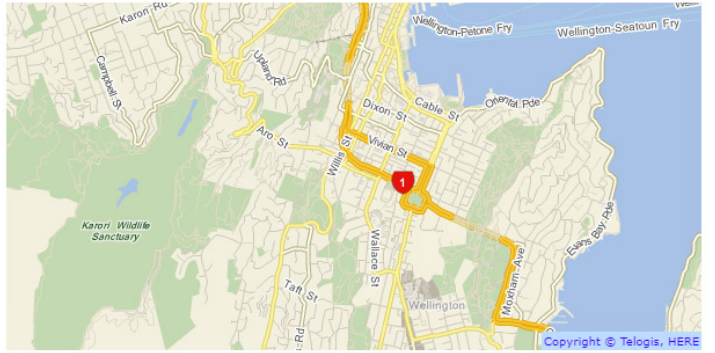
Postal Code

Business Name

State/Province
--All ▾
Street

Customer Name

City
--All ▾



Customer I...	Business ...	Customer ...	Contact Ph...	Civic Num...	Street	Street Dist...	City	State/Provi...	Postal Cod...	Latitude	Longitude ...		
CCZ				1709	Eustis Street		Lauderdale	Minnesota	55113				
CCW				2995	Northview		Roseville	Minnesota	55113				
test3		Johnson		37	Karewa Street	New Zealand	Wanganui	New Zealand	4501				
1000	businessna...		5146902655	123	12		laval	Quebec					
billingCust	businessna...		5142569874	457	dfhsdf		string	Quebec	h2v2a1				
billingCust	businessna...		5142569874	457	dfhsdf	string	string	Quebec	h2v2a1				
KM-FMEN...		KM	6513021219	223	Selby Ave	District 1	Saint-Paul	Minnesota	55102				
CustNew123	businessna...	custloc	6513021219	2801	Selby Ave		Saint-Paul	Minnesota	55102				

Total Items: 10

FMSUP-419 Every other week routes assigned to temporary trucks are successfully dispatched

You can assign a route to a temporary truck and have it follow that route's schedule as needed. Previously, when you assigned a temporary truck to a route that had an every other week (EOW) frequency, the system failed to dispatch such a route successfully. As a result, the assignment would not be completed.

This software problem has been resolved. In the described context, the system successfully dispatches EOW routes assigned to temporary trucks.

Command Center

FMPRO-204 Truck name is limited to 10 characters in Command Center

You can add truck information in Command Center. Previously, the system allowed for the length of the truck name entered in the **Name** column to be more than 10 characters. This caused such truck names to be miscommunicated to other FleetMind applications. As a result, these applications could not receive truck information and the trucks were not properly added in these applications.

This software problem has been resolved. In the described context, the system successfully communicates the truck name information entered in Command Center and is able to add the trucks to other FleetMind applications.

FleetLink Mobile

FMPRO-529 Button caption changes as expected from ARRIVED to COMPLETED

WasteApp provides visual user interface clues to prompt drivers to take further action. When a driver of the street sweeper arrives at the assignment location and presses the **ARRIVED** button, the button caption changes to **COMPLETED**, prompting the driver to press that button again after the assignment had been serviced. Previously, when a driver of a street sweeper arrived at the assignment location and pressed the **ARRIVED** button, the caption on it failed to change to **COMPLETED** unless the driver immediately switched from the current mode to a different mode (e.g. Driving Mode to Touring Mode). In the absence of a visual clue the driver could become disoriented and take unexpected action to try and communicate to the system the completion of the assignment. As a result, the system would not record the information about assignment completion correctly.

This software problem has been resolved. In the described context, the button caption changes as expected from **ARRIVED** to **COMPLETED** prompting the driver to press it after servicing the assignment and allowing the system to record the completion.

FMMOB-528 PROGRESS button is displayed in Touring Mode

Drivers of street sweepers can switch between Driving Mode and Touring Mode. The user interface in both modes has a number of buttons that can be pressed to change the view displayed on the screen. Previously, the **PROGRESS** button failed to appear on the screen when the driver switched to Touring Mode. As a result, it was impossible for the driver to review the route progress while in Touring Mode.

This software problem has been resolved. In the described context, the **PROGRESS** button is displayed on the screen in both the Driving Mode and the Touring Mode, which makes it possible for the driver to review route progress in either mode.

FMMOB-386 The Back button remains activated and functions correctly in Touring Mode

Drivers of street sweepers can switch between Driving Mode and Touring Mode. Previously, when a driver pressed the **Touring Mode** button, and then pressed the **Back** button, the application would fail to return to the previous view. Additionally, the **Back** button would become inactivated when all on-demand assignments were completed. As a result, the driver had difficulty or was unable to perform tasks accessible from other application screens due to the difficulty or inability returning from Touring Mode to the previous view.

This software problem has been resolved. In the described context, when the **Back** button is pressed, the user is consistently returned to the previous view. Additionally, the **Back** button remains activated upon completion of on-demand assignments.

FMMOB-582 Vehicle speed is tracked by GPS in kilometers per hour

GPS tracking in WasteApp tracks and records various parameters that relate to vehicle position and movement. These parameters are then communicated across other FleetMind applications. Previously, the speed parameter was erroneously recorded in kilometers per second instead of kilometers per hour. As a result, the speed data reported to other applications was incorrect.

This software problem has been resolved. In the described context, the speed is correctly tracked and communicated to other applications in kilometers per hour.

FleetLink Reports

FMSUP-414 Work summary reports can be successfully generated

You can generate and review various reports on the **Work Summary Per Route** screen that can be accessed by selecting **Daily Work Summary** from the **Activity Reports** menu. Previously, when you tried to generate some of the reports, the system displayed an error message and would not generate the reports. As a result, the report data could not be reviewed.

This software problem has been resolved. In the described context, the reports are successfully generated and the report data can be reviewed.

FMENG-1557 Service verification reports can be successfully exported

You can generate various service verification reports on the **Service Verification** screen that can be accessed by selecting **Service Verification** from the **Services** menu. You can then export the generated report to a CSV file. Previously, when you tried to export a generated report, the system would display a 401 error message and would not export the report. As a result, the report data could not be saved to a local hard drive.

This software problem has been resolved. In the described context, the reports are successfully exported.

FleetLink Map

FMREP-100 NCCs are successfully displayed in Vehicle View

You can view information about vehicle activity on the map by selecting **Vehicle View** from the **Fleet Status** menu on the top menu bar. Previously, the system failed to display the information about non-customer correlated (NCC) bins that were serviced by the vehicle of interest. As a result, the displayed information did not provide an accurate view of the vehicle activity.

This software problem has been resolved. In the described context, the system successfully displays all expected information about vehicle activity, including NCCs.

FMPRO-254 Route activity can be successfully replayed

You can replay the activity that occurred on a route of interest on a certain date by selecting **Route Activity** from the **Replay** menu on the top menu bar, and then selecting the date and route of interest in the left-hand side bar. Previously, the system crashed as it tried to replay the route activity. As a result, users who wanted to review route activity, have been unable to do so.

This software problem has been resolved. In the described context, the system successfully loads and replays the route activity of interest.

FleetMind API

FMPRO-264 Requested information is successfully returned

FleetMind API can return information about various attributes of fleet vehicles. Previously, the **/v1.10/division/{divisionId}/report/services** and **/v2/division/{divisionId}/report/services** APIs were unable to return information because the query would time out. As a result, it was impossible for users to access the requested information from FleetMind applications.

This software problem has been resolved. In the described context, both APIs mentioned above successfully return the requested information and it becomes accessible to users.

FMPRO-243 Requested customer profile information is returned within reasonable time

FleetMind API can return information about customers. Previously, the system took too long to return customer profile details. As a result, users experienced delays in accessing this information.

This software problem has been resolved. In the described context, the requested information is returned within a reasonable time.

For more information on FleetMind products and their features please visit
<http://community.safefleet.net>