



Blue Tree Systems

HOS - USER GUIDE (ELD)



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Overview

This user document provides an overview of Blue Tree Systems Electronic Logging Device (ELD) as well as detailing the common operations performed by drivers. Blue Tree Systems ELD system comprises of an in-cab device and a back-office web application, ***FleetManager.com***. Drivers can review their Hours of Service (HOS), change their duty status, and manage their logs from the in-cab device. The back office can review and suggest edits to drivers' logs through ***FleetManager.com***.

Blue Tree Systems ELD solution complies with and is tested against the United States Department of Transportation (USDOT) Federal Motor Carrier Safety Administration (FMCSA) specifications as found in *49 CFR Part 395 for Electronic Logging Devices, Subpart B*.

Logging In

Before using your ELD you must log in with the credentials provided by your motor carrier.



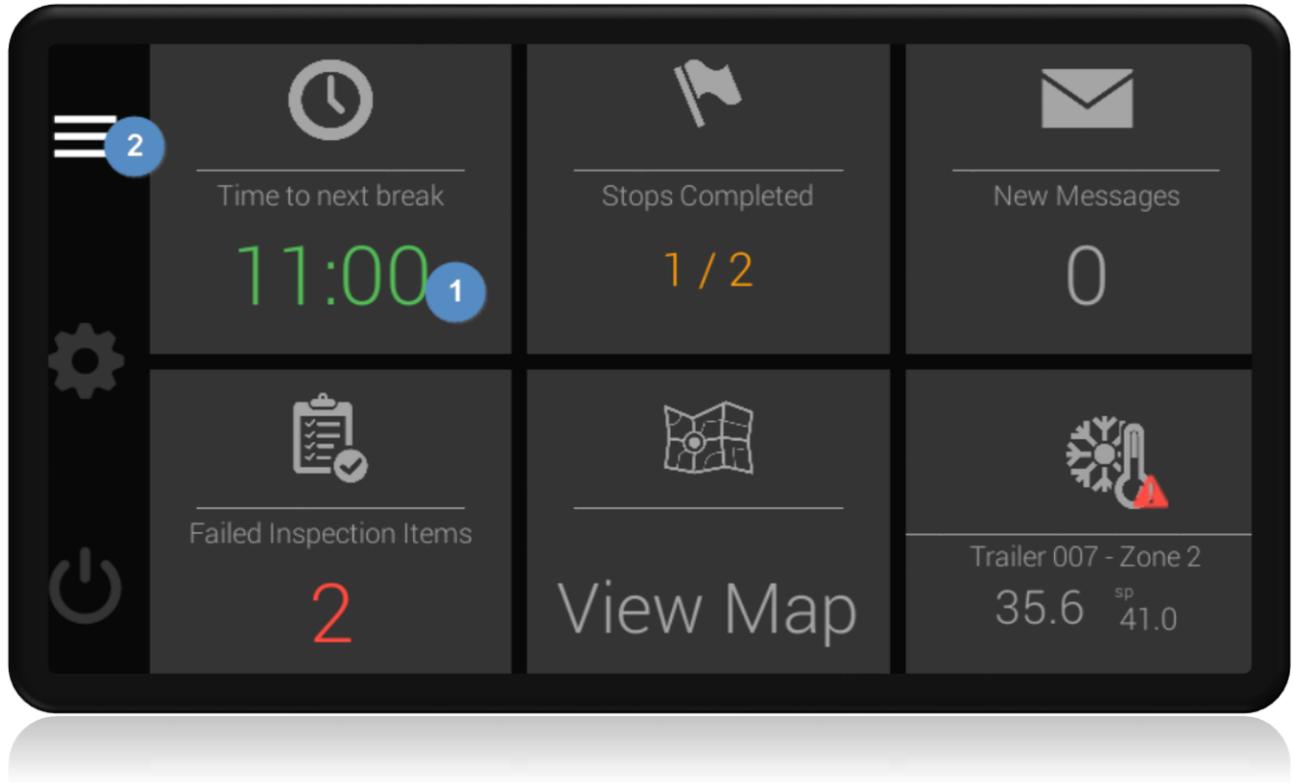
To log in;

- ▶ *Tap the 'Enter User ID' field and enter your user ID*
- ▶ *Tap the 'Enter Password' field and enter your password*
- ▶ *Tap the 'LOGIN' button.*

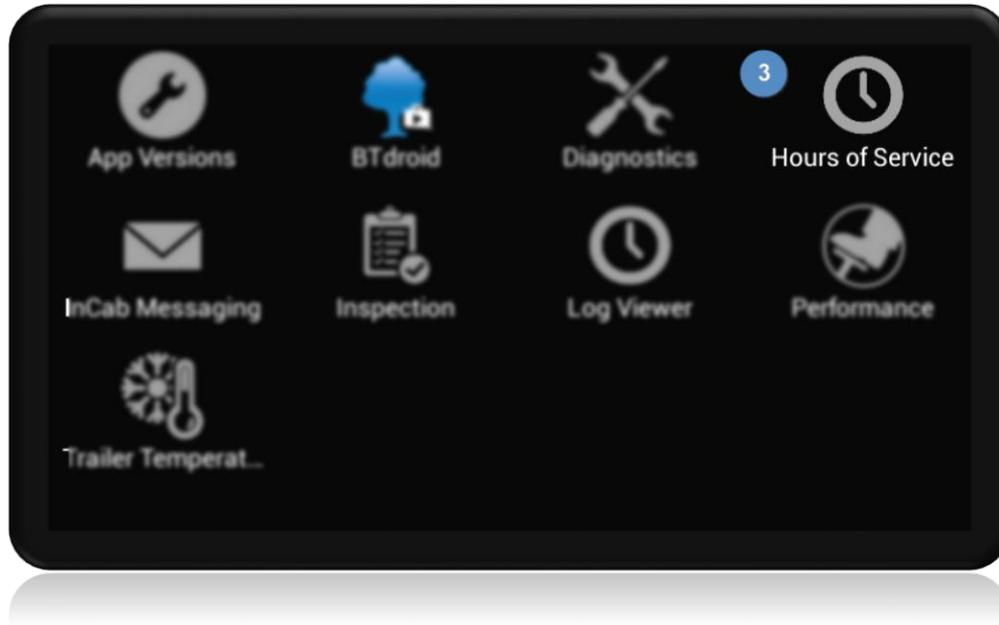


You are notified if your login attempt is unsuccessful

Once successfully logged in to the ELD you have two options to open the Hours of Service (HOS) application.



- ▶ Tap the HOS widget from the Blue Tree Systems launcher **1**
- ▶ Navigate to the HOS app in your android devices app drawer. For example, on a Blue Tree Systems managed device you can do the following
 - a. Tap the app drawer button **2**
 - b. Tap the 'Hours of Service' app icon **3** from the list of available apps.



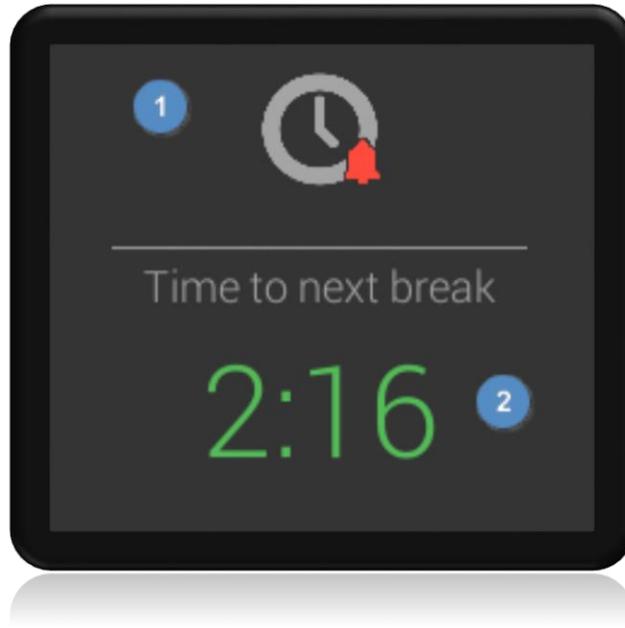
 *You are notified on log in;*

- ▶ *If your profile has been updated by your motor carrier*
- ▶ *If any days in your logs require certification*
- ▶ *If your account has been configured as ELD Exempt*

Navigating the Hours of Service Application

The HOS widget

The HOS widget allows you to open the HOS app from the Blue Tree Systems launcher.

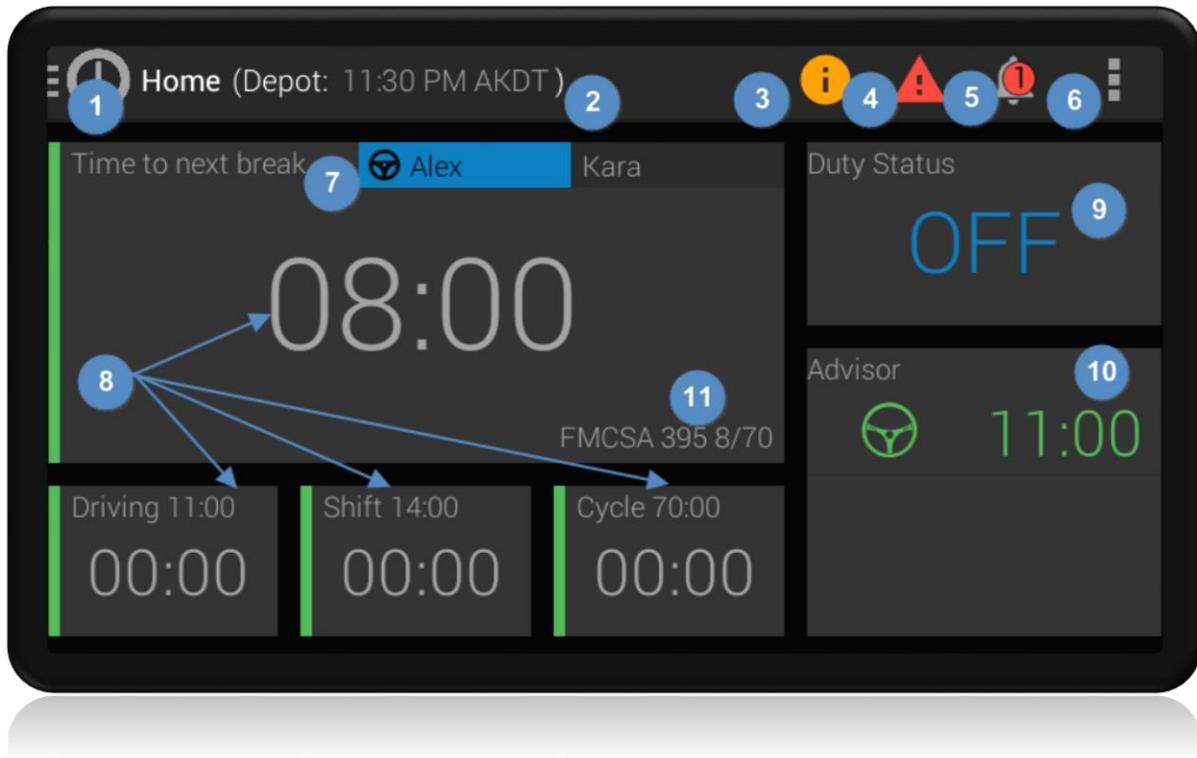


On the widget, you can see,

- ▶ *The HOS app icon, which displays a bell when you have new HOS notifications* **1**
- ▶ *The remaining driving time until your next break* **2**

Home screen

The Home screen summarizes all relevant information required to stay legal and optimize your driving time.

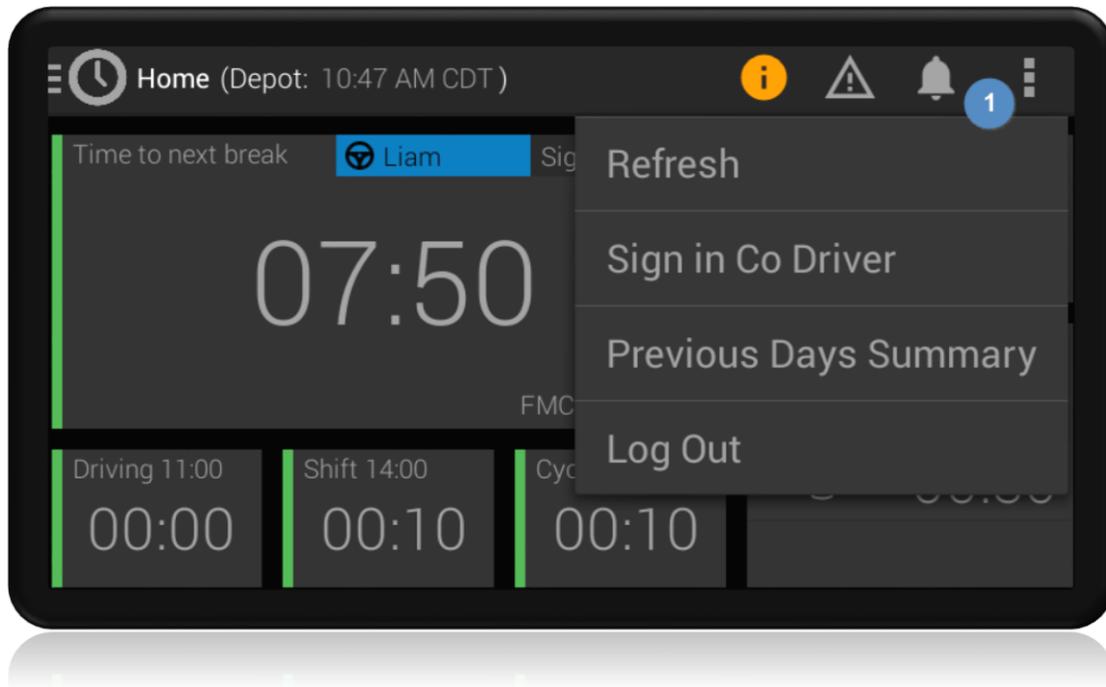


The Home screen displays by default when you open the HOS application. Here you can find,

- ▶ The indicator for the navigation menu **1** (see page 14)
- ▶ Your depot's time and time zone **2**
- ▶ A 'Data Diagnostic' indicator, which illuminates if a data diagnostic is present **3**
 - Tapping the indicator opens the 'Diagnostics' screen (see page 44)
- ▶ A 'Malfunction' indicator, which illuminates if a malfunction is present **4**
 - Tapping the indicator opens the 'Diagnostics' screen (See page 47)
- ▶ A 'Notification' indicator, which illuminates with the number of new notifications **5**
 - Tapping the indicator displays your new notifications (see page 12)
- ▶ The Home screen action menu, where you can access additional HOS actions **6** (see page 10)
- ▶ Your name and if logged in, your co-driver's name **7**,
 - The main driver's name is highlighted in blue and prefixed with a steering wheel icon

- ▶ Several HOS timers including **8**,
 - *Time to Next break, which shows how much time is remaining before you must take a break. This is always counting down to zero and goes amber when there are less than 60 minutes remaining, and red when the clock is zero. The HOS regulation you are currently following is shown at the bottom right of this tile*
 - *Driving, which shows how much driving time you have accumulated today. This timer always counts upwards.*
 - *Shift, which shows how much time you have accumulated Driving, ON-duty and OFF-duty*
 - *Cycle, which shows how much time has been accumulated ON-duty and Driving*
- ▶ A 'Duty Status' tile, which shows your current duty status **9**
 - *Tapping the tile opens the 'Duty Select' screen (see page 16)*
- ▶ An 'Advisor' tile, which shows HOS advice **10**
 - *Tapping the tile opens the 'Advisor' screen (see page 18)*
- ▶ Regulations, which shows the current regulations you are following **11**.

Home screen action menu



On the Home screen, tap the action menu **1** on the top right of the screen. A menu displays with,

- ▶ **Refresh** – although your data updates automatically, this option allows you to force an immediate update of edits made by the back office
- ▶ **Switch Regulation** – allows you to switch views of your working hours if you follow a dual profile. For example, you may follow both US and Canadian hours. (see page 21)

i **Only available if your motor carrier has configured your profile with multiple regulations**

- ▶ **Sign in Co-Driver** – allows a co-driver to log in to the HOS app
- ▶ **Previous Days Summary** – manual entry of your logs for the current cycle (see page 30)

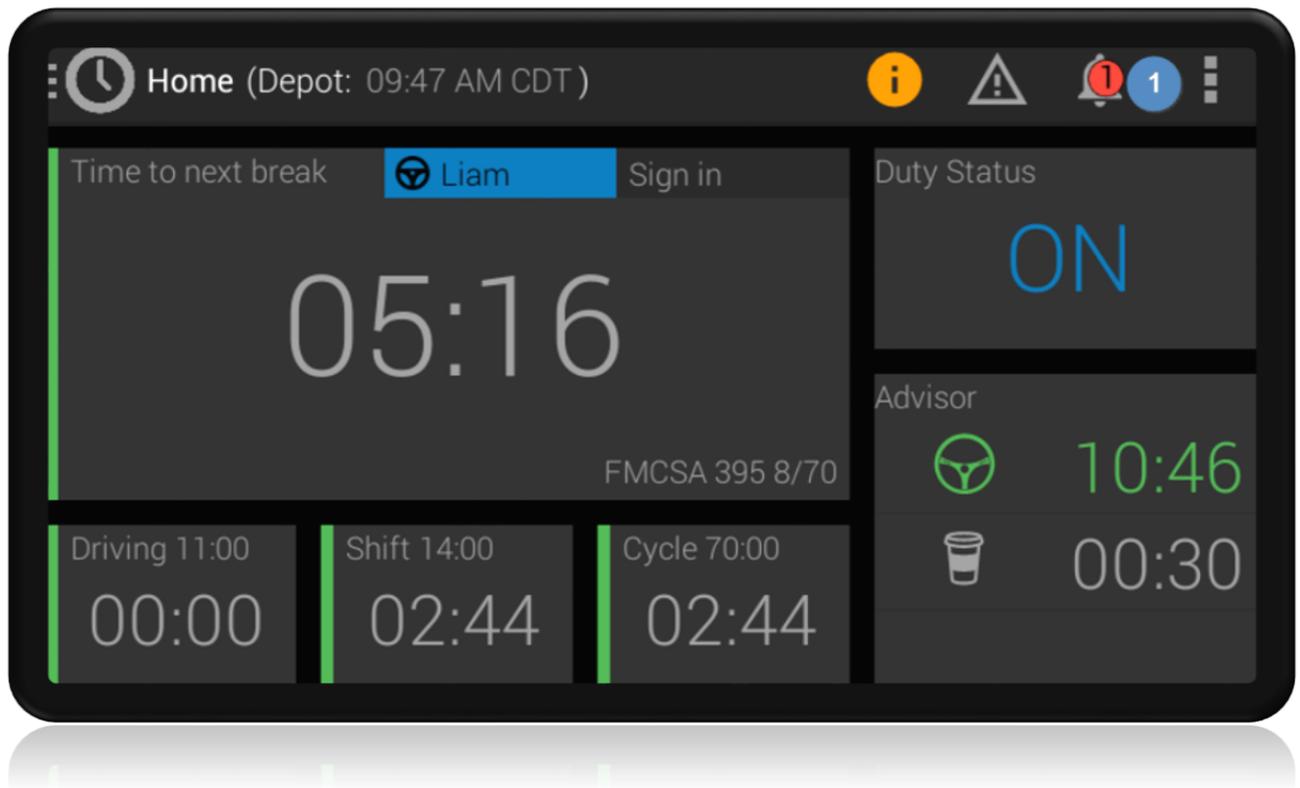
i **Only available if the ELD does not have full logs for your current cycle**

- ▶ **Log Out** – logs out the active driver.

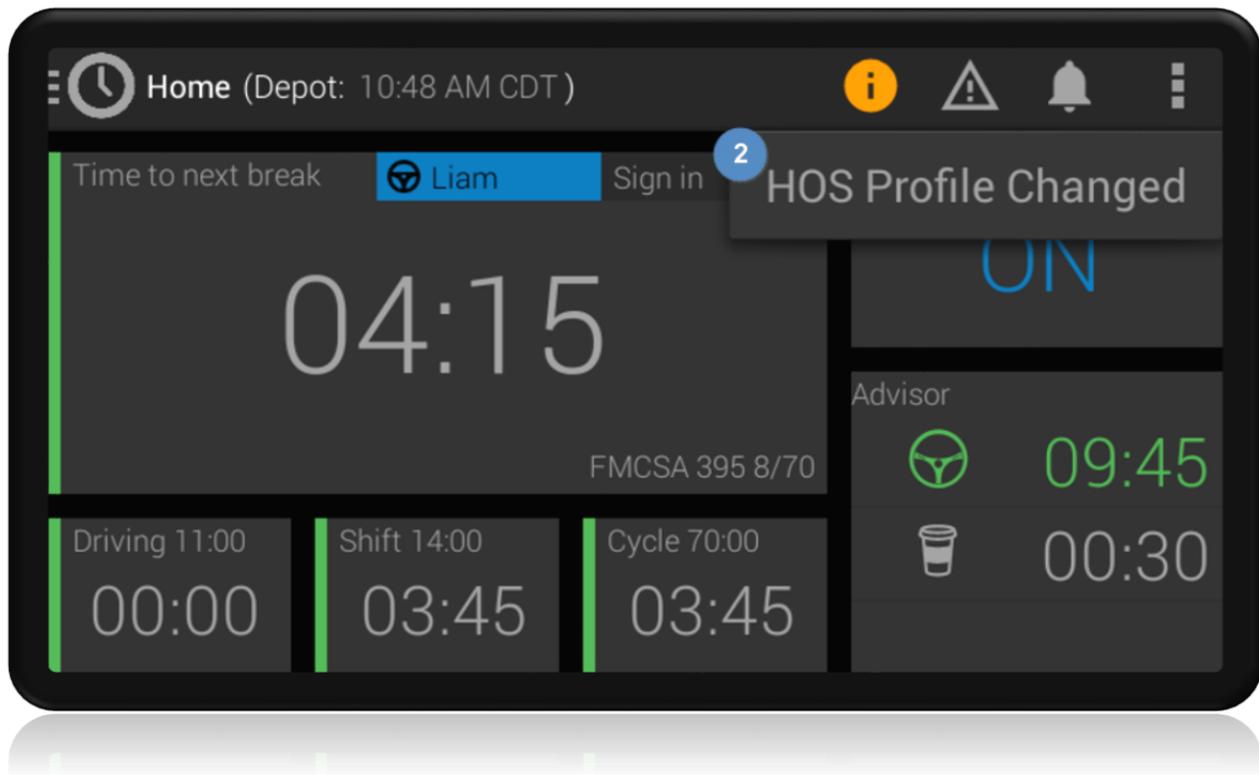
ⓘ *When the vehicle is moving, the action menu is not accessible*

Notifications

If any HOS notifications require your attention, a red symbol appears on the notification icon **1** with a number inside indicating the number of new notifications.



Tap on the 'Notification' icon to list notifications that require your attention. Some notifications require you to act and tapping the notification navigates you to the relevant screen to resolve that item.



Notifications that appear here include,

- ▶ **Pre-trip inspection required** – displays if you have not completed a pre-trip inspection. Tapping this notification opens the DVIR app
- ▶ **Post-trip inspection required** – displays if you have not completed a post-trip inspection. Tapping this notification opens the DVIR app
- ▶ **HOS Profile Changed** – displays if your motor carrier makes a change to your profile such as enabling a special driving category for use i.e. Personal Conveyance or Yard Moves. Tapping this notification opens the 'Profile Details' screen
- ▶ **ELD Exemption enabled** – displays if your motor carrier configures your account as ELD Exempt. Tapping this notification opens the 'Profile Details' screen
- ▶ **Unidentified Driving** – displays if the ELD detects times when the vehicle was driven while no driver was logged in. Tapping this notification opens the 'Unidentified Driving' screen
- ▶ **Logs require certification** – displays if you have daily logs that are not certified. Tapping this notification opens the 'Daily Summary' screen

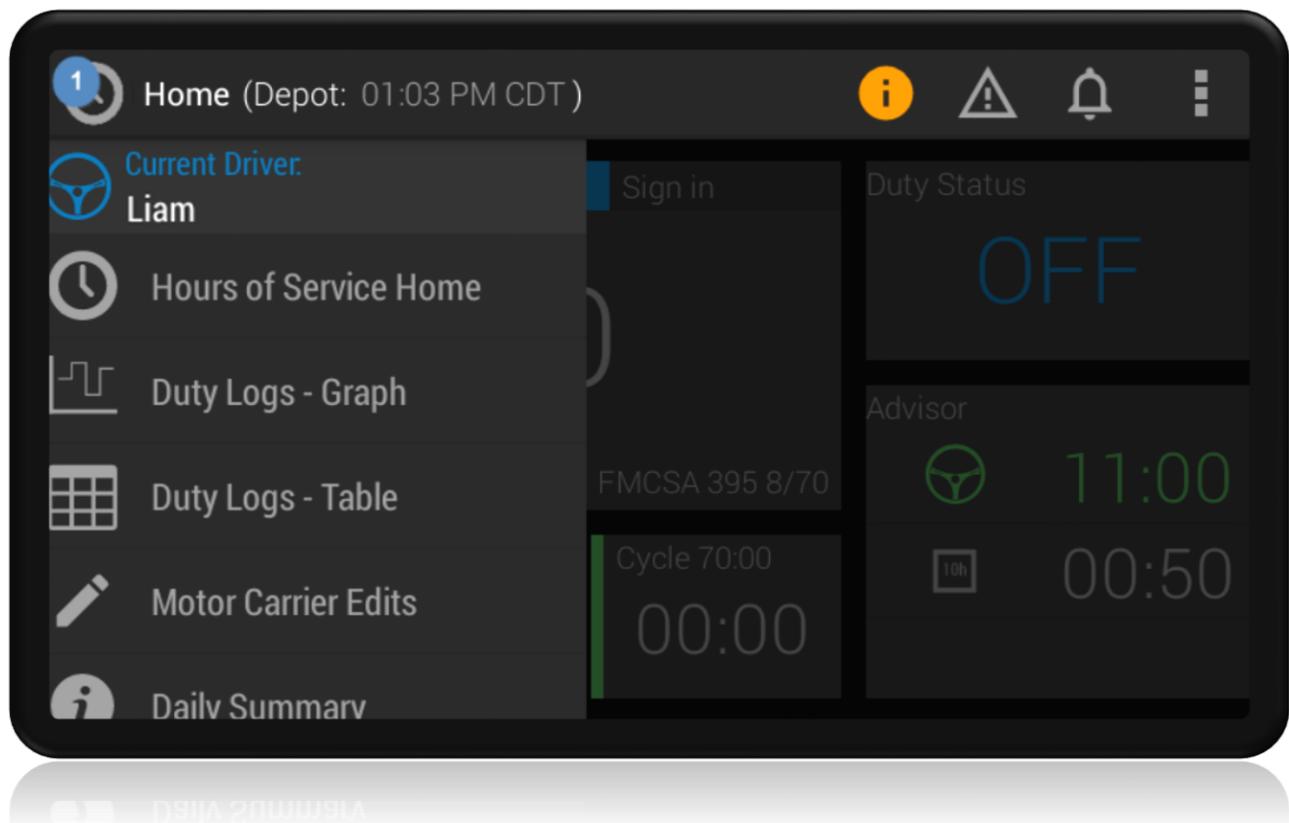
- ▶ **Pending Edits** – displays if your motor carrier has suggested edits to your logs. Tapping this notification opens the 'Motor Carrier Edits' screen.

i If supported, notifications also appear on the notification tray of your device

o When the vehicle is moving, the notification list is not accessible

Navigation Menu

On the HOS screen, tap the three lines on the top left of the screen **1** or swipe in from the left side of the screen to open the navigation menu.



The navigation menu displays the following options,

- ▶ **Hours of Service Home** – brings you back to the 'Home' screen
- ▶ **Duty Logs - Graph** – opens the screen displaying your duty logs in graph form

- ▶ **Duty Logs - Table** – opens the screen displaying your duty logs in table form. You can edit your logs here
- ▶ **Motor Carrier Edits** – opens the screen to review suggested edits to your logs from your motor carrier
- ▶ **Daily Summary** – opens the screen that shows a summary of your work for your duty cycle. You can sign your driver’s logs here
- ▶ **Unidentified Driving** – opens the screen that shows any driving done while no driver was logged in to the ELD. You can claim driving events here
- ▶ **Load Details** – opens the screen that allows you to view and manage your Load Details including the vehicle name, trailers pulled and any shipping details
- ▶ **DOT Inspection Mode** – opens the screen for the roadside inspector to inspect and transfer your logs
- ▶ **Profile Details** – opens the screen to view your profile configurations as set by your motor carrier.

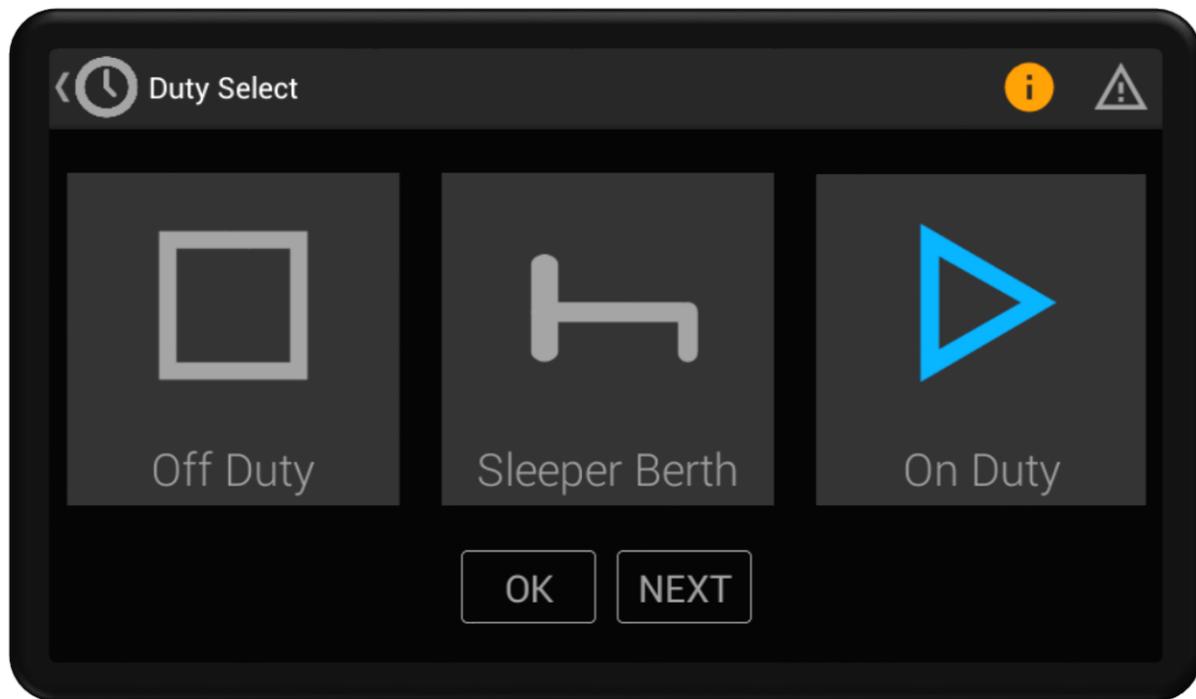
⊘ ***When the vehicle is moving, the navigation menu is not accessible***

Common Operations

Changing Duty Status

You can switch to any non-drive status from the Home screen. Tapping the 'Duty Status' tile opens the Duty Select screen allowing you to choose from any of the default status' i.e. OFF, Sleeper Berth or ON.

There is no option to manually switch to Drive as this happens automatically when the vehicle begins moving. There are many sub options for both ON and OFF duty including Personal Conveyance and Yard Move but they are at the discretion of your carrier.



To change your duty status, tap the 'Duty Status' tile on the Home screen.

- ▶ Tap one option from 'OFF Duty', 'Sleeper Berth' or 'ON Duty'
- ▶ Tap 'OK'. Your duty status updates on the Home screen.

You can select a sub-ON duty status by tapping 'ON Duty' and then tapping 'NEXT'. The following ON duty sub-types are examples of what may be configured for selection,

- ▶ *ON*
- ▶ *PRE (Pre-Trip)*
- ▶ *POST (Post-Trip)*
- ▶ *FUEL (Fuel Fill)*
- ▶ *SAFE*
- ▶ *HZMT*
- ▶ *YARD (Yard Moves).*

📌 Selecting PRE or POST duty opens a pre-trip or post-trip inspection screen

📌 When selecting YARD you must enter a comment

You can select a sub-OFF duty status by tapping 'OFF Duty' and then tapping 'NEXT'. The following OFF duty sub-types are examples of what may be configured for selection,

- ▶ *OFF*
- ▶ *PC (Personal Conveyance).*

📌 When selecting PC you must enter a comment

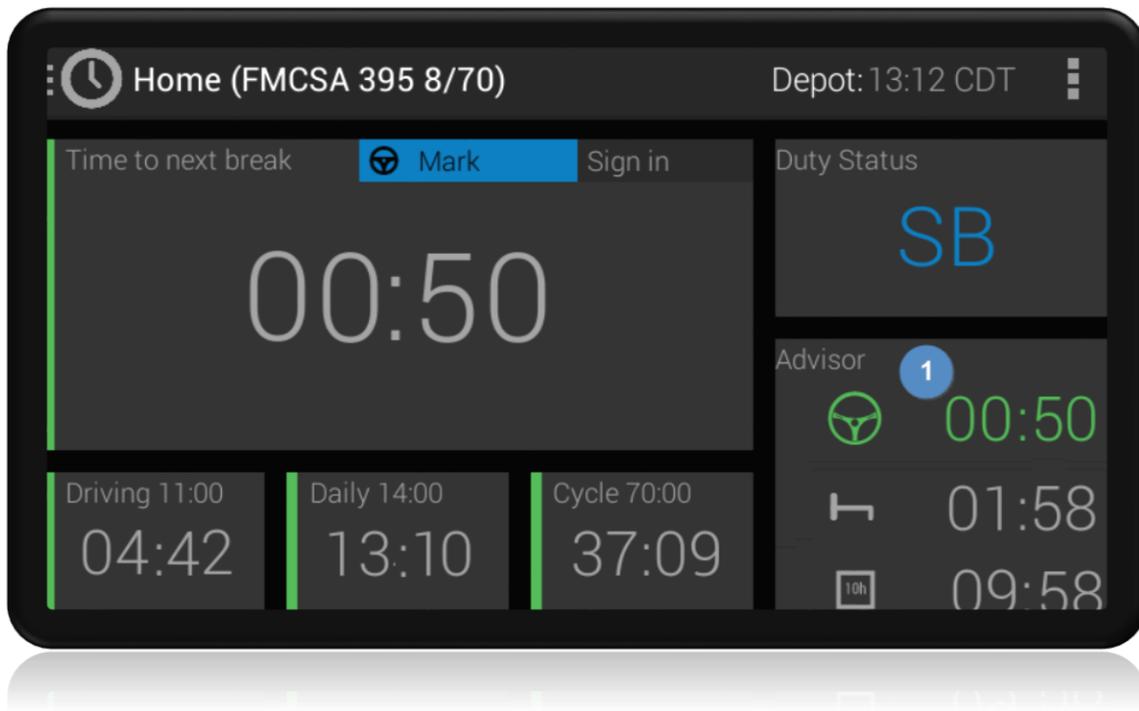
🚫 When the vehicle is moving, the 'Duty select' screen is not accessible

💡 If no GPS signal is available when changing duty, you are promoted to enter a location

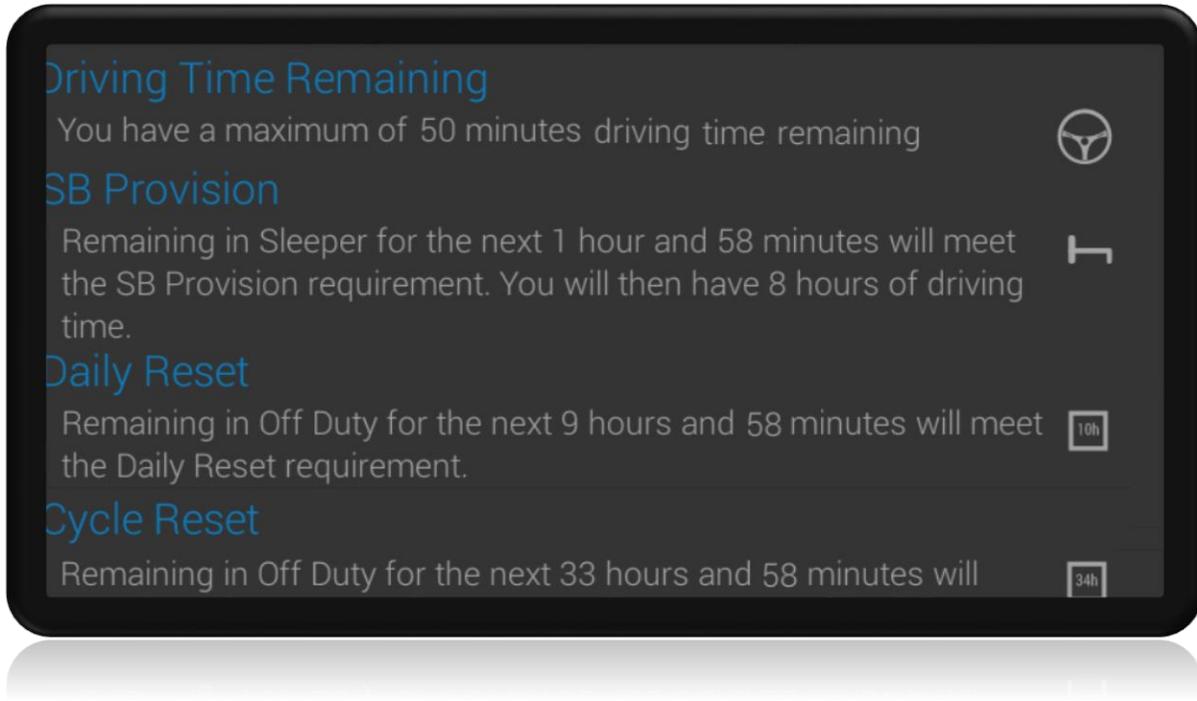
Understanding the HOS Advisor

The 'Advisor' tile **1** on the Home screen gives live advice on how best to optimize your available driving hours. At any given time, it is calculating the maximum driving time available and indicates the duration of the break which must be taken at that time.

If you are currently on a break it counts down all relevant break time counters, letting you know when you've met your break provision.



For detailed information, you can tap on the tile to get to the advisor screen. This screen gives more information including regulation exemptions and pre-calculates complex scenarios such as split sleeper.



- ▶ *On the HOS screen, tap the 'Advisor' tile*
- ▶ *This opens an Advisor screen that provides HOS advice on some or all the following;*
 - *Driving Time Remaining*
 - *SB Provision*
 - *Daily Reset*
 - *Cycle Reset*
 - *Pick up hours.*

⊗ ***When the vehicle is moving, the 'Advisor' screen is not accessible***

Logging in Co-driver/Team Driver

Once you are logged in, it is possible to log in a co-driver using one of the following methods,

- ▶ Tap the 'Sign In' button beside the main driver's name on the Home screen, or
- ▶ Tap the 'Sign in Co-driver' option in the menu on the top right of the Home screen.

When a co-driver is logged in, the co-driver's name displays beside your name on the Home screen. The steering wheel beside your name denotes you are the main driver. You can view your co-driver's details by selecting their name on the Home screen.

⊘ When a co-driver is logged in, the Home screen does not lock down while the vehicle is moving. All menus remain accessible, except the ability to change the main driver's duty status.

Switching Drivers

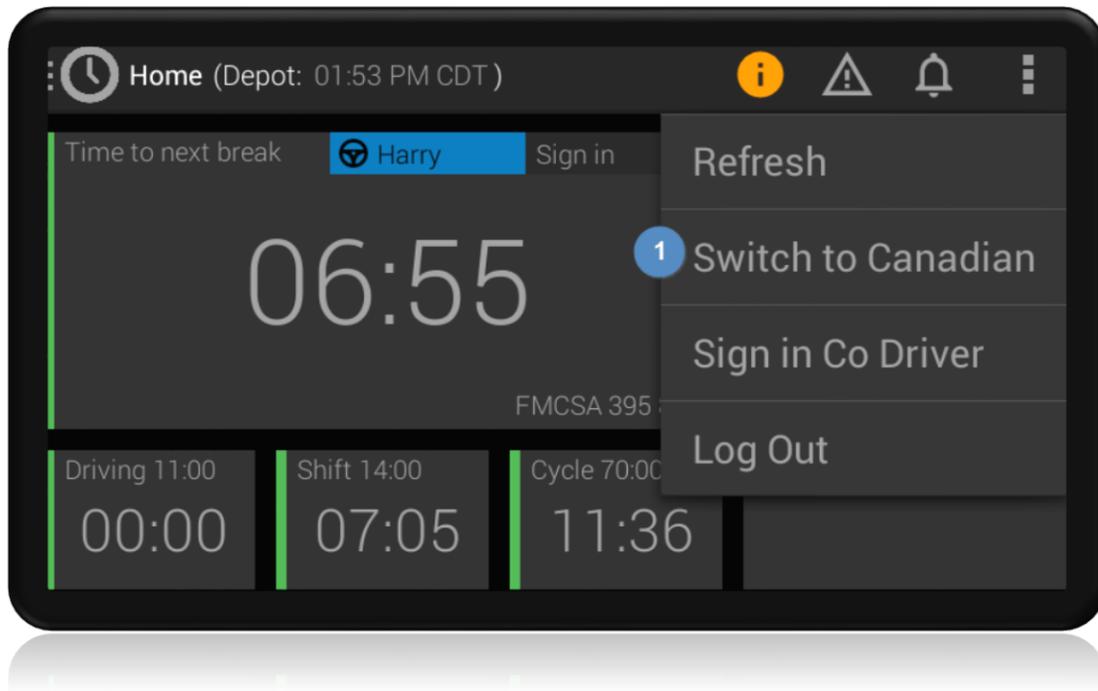
When two drivers are logged in to the ELD, all driving time is assigned to the main driver. The steering wheel icon denotes the main driver, it displays next to their name on the Home screen.

When the vehicle is stationary and the main driver no longer has a duty status of driving, either driver can select to switch driving roles by tapping the 'Switch Driver' option in the action menu on the Home Screen.

This swaps the drivers' roles and any further driving time is assigned to the new main driver, previously the co-driver. The Home Screen updates to reflect the role change, and the newly assigned main driver now to the left with the steering wheel icon beside their name.

Switching Between Views

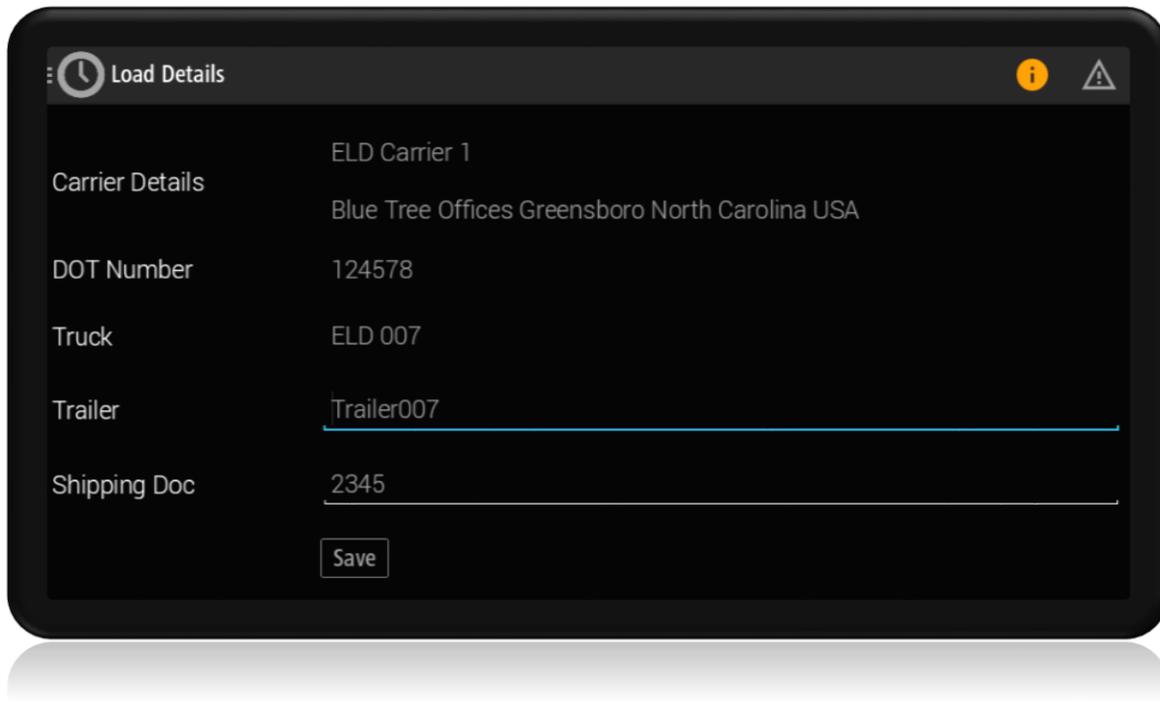
If you follow a dual regulation HOS profile you can switch the view of your working hours within the app.



For example, if you regularly cross the US Canadian border you can switch your view of working hours by first tapping the action button and then tapping 'Switch to Canadian' **1**

Managing Load Details

The Load Details screen displays your motor carrier information and allows you manage truck, trailer, and shipping document details. Carrier details cannot be edited.



Managing Truck name

The truck name auto populates with the identifier set by your motor carrier. To update the truck name,

- ▶ Long press on the 'Truck' field
- ▶ Enter the truck identifier in to the field
- ▶ Tap the 'Save' button to commit your changes.

Managing Trailers

You should update the trailer information each time you connect a trailer to your truck. To add or update a trailer,

- ▶ Tap the 'Trailer' field

- ▶ Enter the trailer identifier in to the field
- ▶ Tap the 'Save' button to commit your changes.

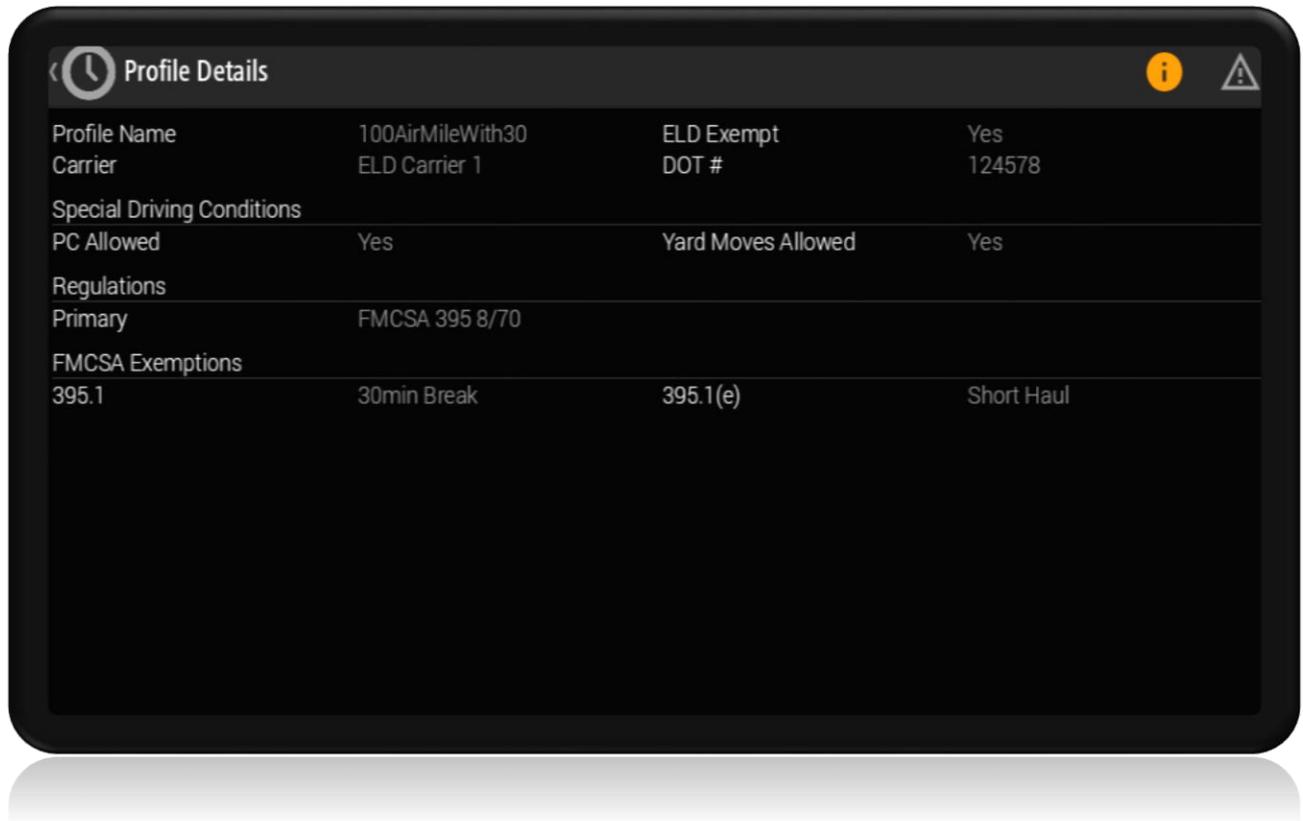
Managing Shipping Documents

You can add shipping document information, such as shipping manifests, invoices etc. for your work. To add or update a shipping document,

- ▶ Tap the 'Shipping Doc' field
- ▶ Enter the document identifier
- ▶ Tap the 'Save' button to commit your changes.

Viewing your Profile

The Profile Details screen displays your profile configuration as set by your motor carrier.



Here you can see your,

- ▶ *Profile name as provided by your motor carrier*
- ▶ *ELD Exempt status – whether your account is ELD exempt*
- ▶ *Motor carrier name*
- ▶ *Motor carrier's DOT number*
- ▶ *Special Driving Conditions – whether you can use Personal Conveyance or Yard Moves*
- ▶ *Regulations – the HOS regulations you are following e.g. 7-day 60-hour cycle*
- ▶ *FMCSA Exemptions – any exemptions configured by your motor carrier e.g. 30-minute break.*

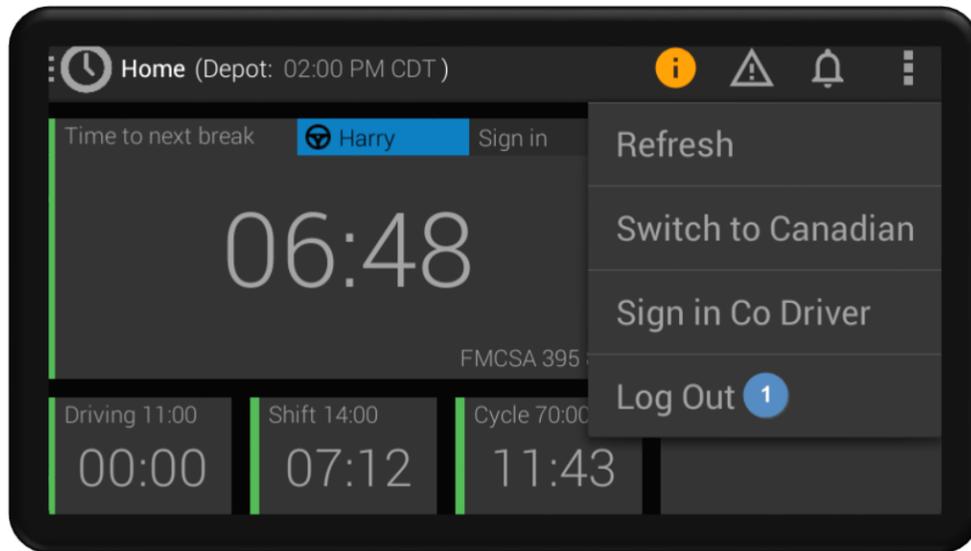


You are notified on log in if there are changes to your profile

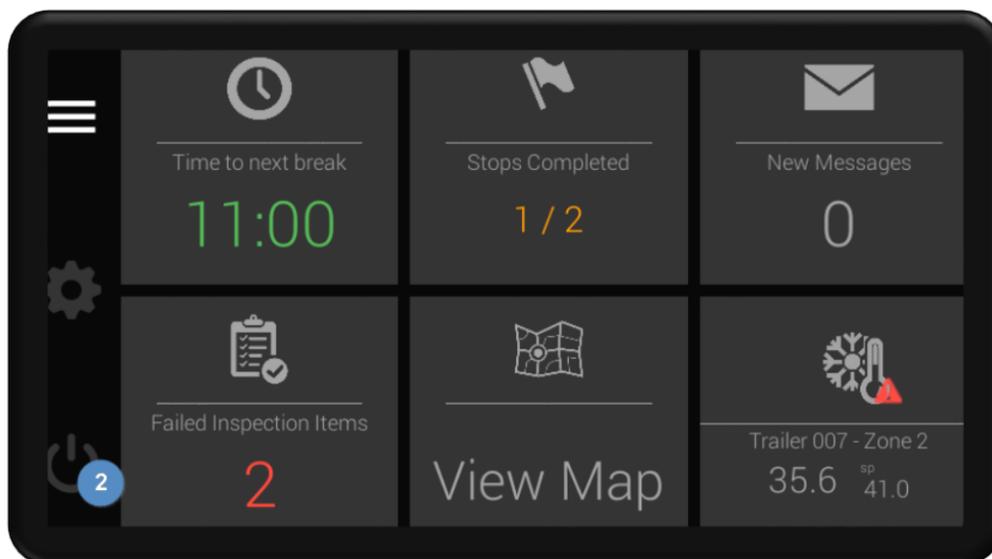
Logging Out

You should log out of the ELD at the end of your day. You can log out using one of the following methods,

- ▶ Tap the 'Log Out' option **1** in the Home screen action menu (see page 25)



- ▶ Tap the 'Power' icon **2** on the Launcher screen.



 **You are notified on log out to,**

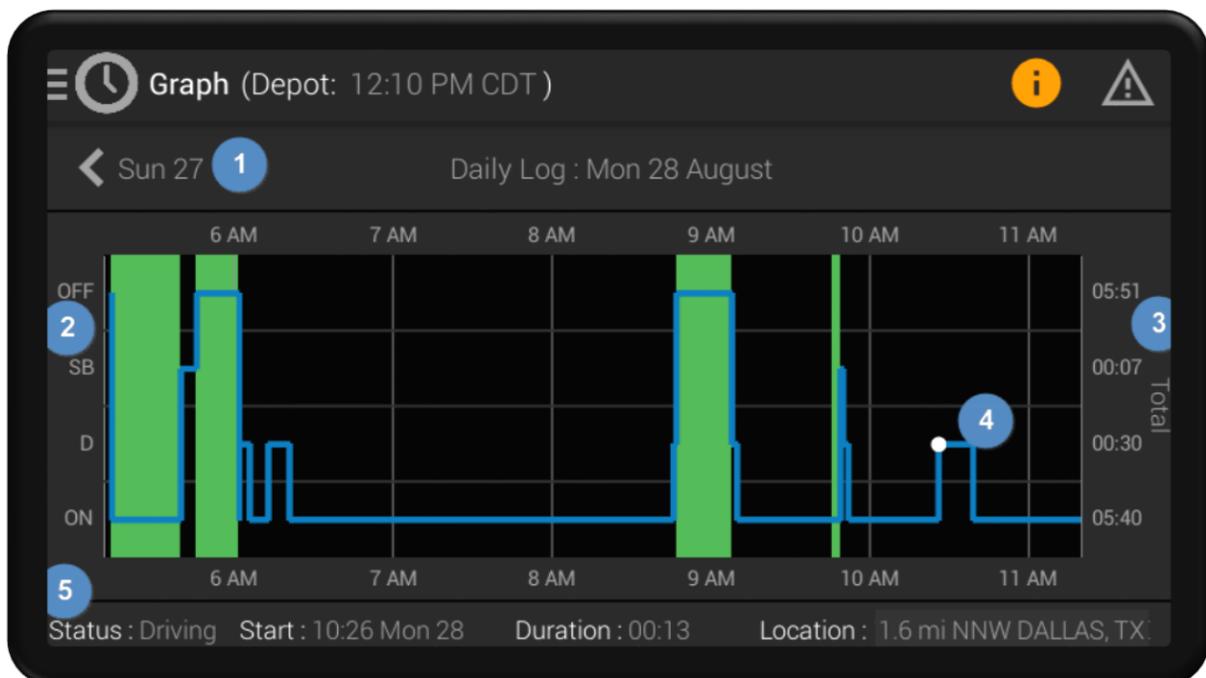
- ▶ **Review and certify your logs, if there are any days requiring certification**
- ▶ **Change your duty status to OFF duty, if you have not already done so**
 - **You are prompted to do a post-trip inspection when switching to OFF duty and a post-trip inspection has not been completed**

Managing your Logs

Reviewing Logs

The duty log graph screen provides an interactive view of your RODS. From here you can tap any duty and have its details populate beneath the graph.

You may also zoom in on any point in the graph by using a pinch to zoom gesture.



- ▶ Navigate to previous days graph **1**
- ▶ Duty status indicators **2**
- ▶ The total time in each duty status for the given day **3**
- ▶ The selected duty as indicated by the white dot **4**
- ▶ The bottom details bar displaying **5**
 - Status
 - Start date & time of duty
 - Duration of duty
 - Location when the duty started.

In the previous image we've tapped on a drive duty and can see that it started on Monday 28th at 10:26 am. It was a 13-minute driving duty that started 1.6 miles from Dallas. You can use the arrows at the top of the graph to move between days. Finally, from the action menu on the top right of the screen you can view any load details, such as carrier, trailers, shipping docs, etc. for the selected day.

Editing Existing Records

The Blue Tree Systems ELD provides the ability to edit any day of your current cycle using the Duty Logs Table. All fields with blue text can be edited while white text such as driving duties are read only.

Start	Duty	Duration	Location	Remark
Aug 31				
12:00 PM	OFF	0h 17m	12 mi NNE Dallas, TX	Click to add
10:00 AM	ON	2h 00m	12 mi NNE Dallas, TX	Click to add
12:00 AM	OFF	10h 00m	12 mi NNE Dallas, TX	Click to add
Aug 30				
12:00 AM	OFF	24h 00m	12 mi NNE Dallas, TX	Click to add

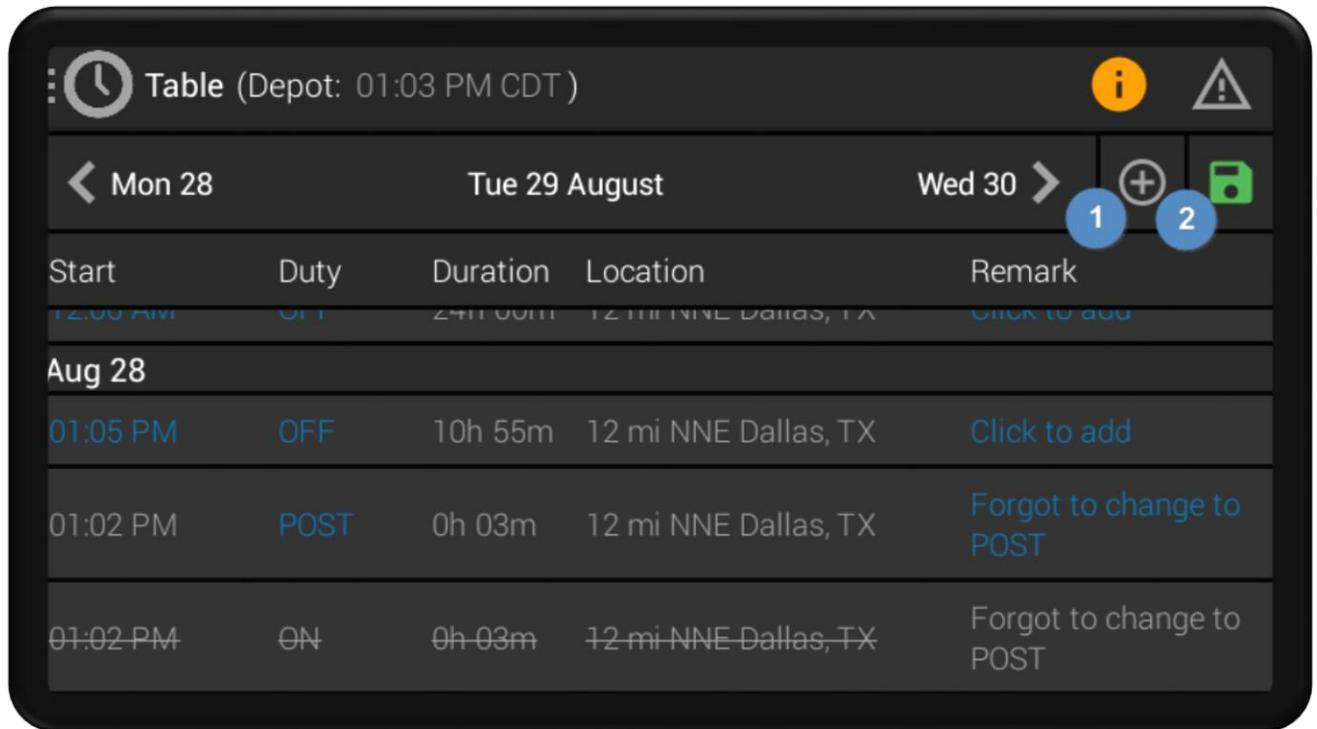
To edit your logs

- ▶ Tap 'Duty Logs - Table' in the navigation menu
- ▶ Tap the 'Start' time to edit the duty's start time / duration. This opens a date and time picker. You must enter a remark to proceed
- ▶ Tap the 'Duty' to change a duty status. This opens a duty picker with a list of duties to choose from. You must enter a remark to proceed
- ▶ Tap the 'Save' icon at the top of the screen to commit your changes.

⊘ Although it is possible to edit your logs, you should be aware of the following limitations,

- ▶ Editing of drive duties are restricted as these are automatically recorded by the ELD
- ▶ You cannot modify the start time of the duty following a Driving Duty.

Adding a missing duty status



To add a missing duty status

- ▶ Tap the 'Duty Logs - Table' from the navigation menu
- ▶ Tap the '+' icon **1** at the top of the screen. The 'Add Duty' wizard displays
- ▶ Follow the on-screen wizard to create the new duty including a mandatory remark
- ▶ New record(s) added to the table and highlighted in green. Replaced duties are highlighted in red
- ▶ The 'Save' icon **2** highlights in green to indicate there are unsaved changes
- ▶ Tap the 'Save' icon to commit your changes
- ▶ The 'Save' icon returns to grey indicating your duties are up to date.

⊘ You cannot add a duty status that impacts the duration of a driving duty

Entering Previous Days Summary

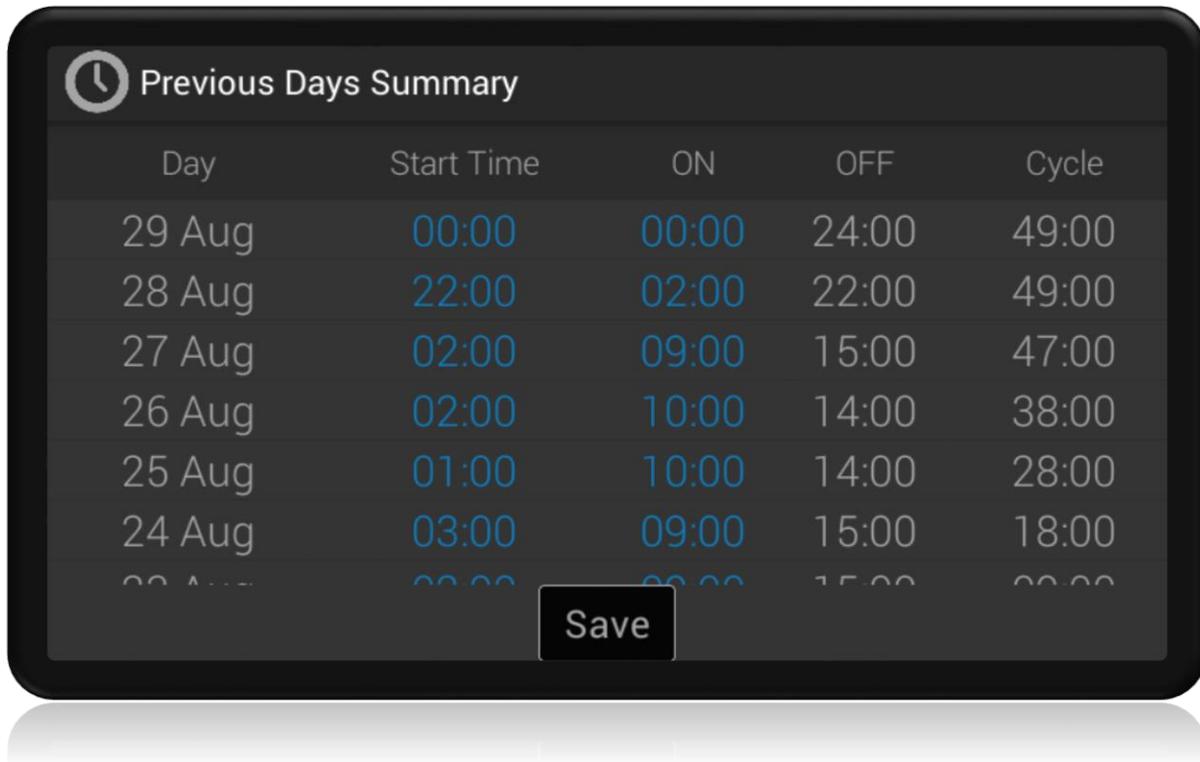
When your ELD opens it checks if you have any duties within the current cycle. If no duties are present (for example, if you have recently moved carrier) you are given the option to enter them manually.

If you decide to enter them manually you are presented with the following screen.

Day	Start Time	ON	OFF	Cycle
29 Aug	00:00	00:00	24:00	00:00
28 Aug	00:00	00:00	24:00	00:00
27 Aug	00:00	00:00	24:00	00:00
26 Aug	00:00	00:00	24:00	00:00
25 Aug	00:00	00:00	24:00	00:00
24 Aug	00:00	00:00	24:00	00:00
23 Aug	00:00	00:00	24:00	00:00

As with other edit screens in the HOS app, blue text indicates it can be edited. To rebuild your logs and ensure your live counters are up to date you should add in a start time and 'ON' duration for each of the last seven days.

The OFF time and total cycle time is calculated automatically.



Day	Start Time	ON	OFF	Cycle
29 Aug	00:00	00:00	24:00	49:00
28 Aug	22:00	02:00	22:00	49:00
27 Aug	02:00	09:00	15:00	47:00
26 Aug	02:00	10:00	14:00	38:00
25 Aug	01:00	10:00	14:00	28:00
24 Aug	03:00	09:00	15:00	18:00
23 Aug	00:00	00:00	15:00	00:00

Save

Once complete select save. Your HOS counters on the Home screen are now up to date.

⊘ Entries cannot be made for the current day

Certifying Logs

Day	D	ON	SB	OFF	Distance	Signed
24 Aug	01:33	01:16	00:00	06:47	121.8	⚠
23 Aug	00:00	00:00	00:00	24:00	0.0	⚠
22 Aug	00:00	00:00	00:00	24:00	0.0	⚠
21 Aug	00:00	00:00	00:00	24:00	0.0	⚠
20 Aug	00:00	00:00	00:00	24:00	0.0	⚠

You should certify your logs at the end of each day. To certify your logs, tap the 'Daily Summary' option in the navigation menu. This screen displays your time spent Driving, ON duty, Sleeper Berth, and OFF duty as well as the distance travelled for each day.

An indicator displays whether the log has been certified for each day in your logs. A green tick denotes that day's logs are certified, and a red exclamation denotes they are uncertified.

Tap a red exclamation indicator to certify your logs for that day.

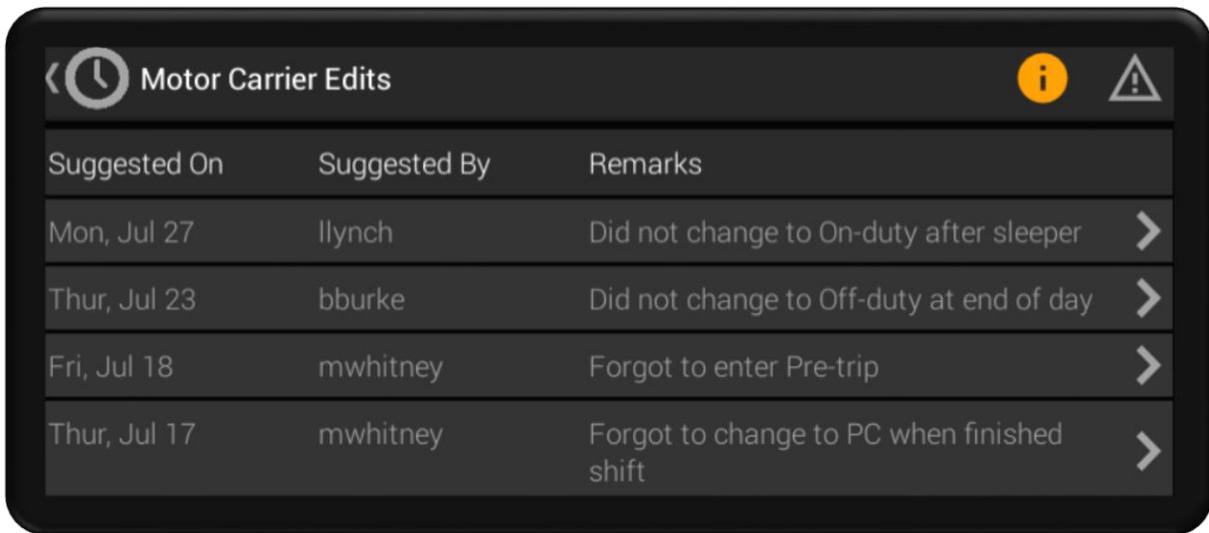
 ***You are notified on both log in and log out if any days in your logs require certification***

 ***If a previously certified log is edited, it must be recertified***

Managing Motor Carrier Edits

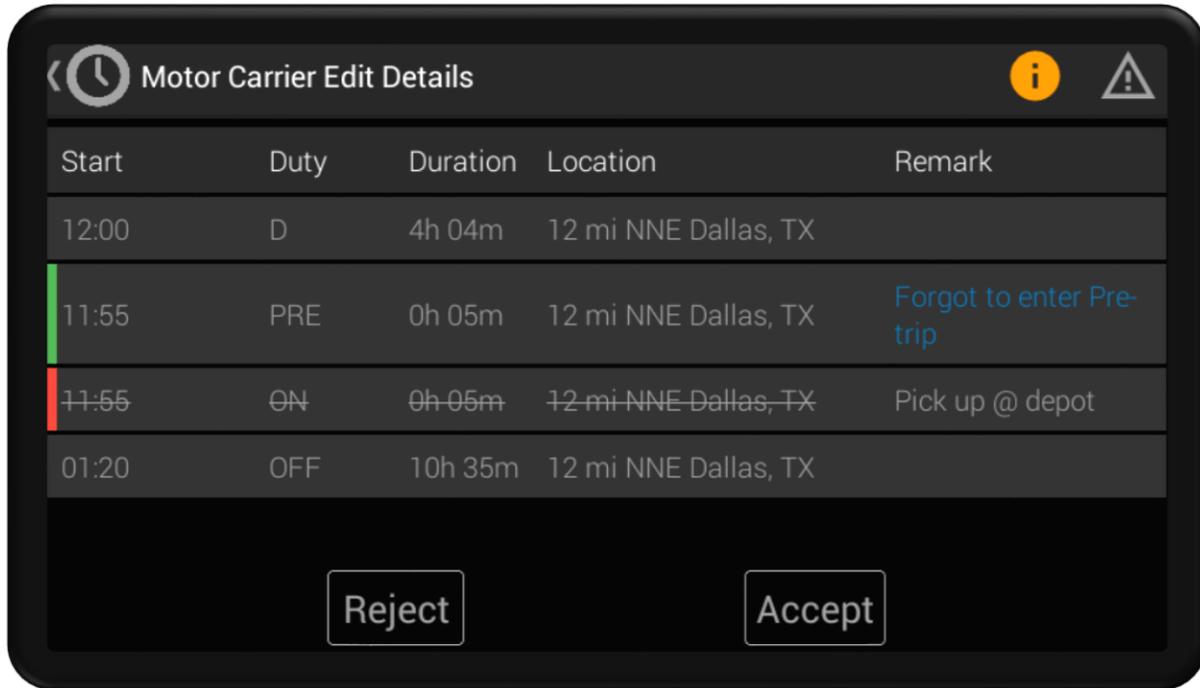
Your motor carrier can suggest edits to your logs. To review these,

- ▶ Tap the 'Motor Carrier Edits' option in the navigation menu. Any pending edits from your motor carrier are listed.



Suggested On	Suggested By	Remarks
Mon, Jul 27	Ilynch	Did not change to On-duty after sleeper
Thur, Jul 23	bburke	Did not change to Off-duty at end of day
Fri, Jul 18	mwhitney	Forgot to enter Pre-trip
Thur, Jul 17	mwhitney	Forgot to change to PC when finished shift

- ▶ Tap a row to review details of your motor carrier's edit. The affected records are highlighted, green denotes the motor carrier edit, and red the original record that the motor carrier edit will replace
- ▶ The preceding and subsequent duties from your logs are also listed for context



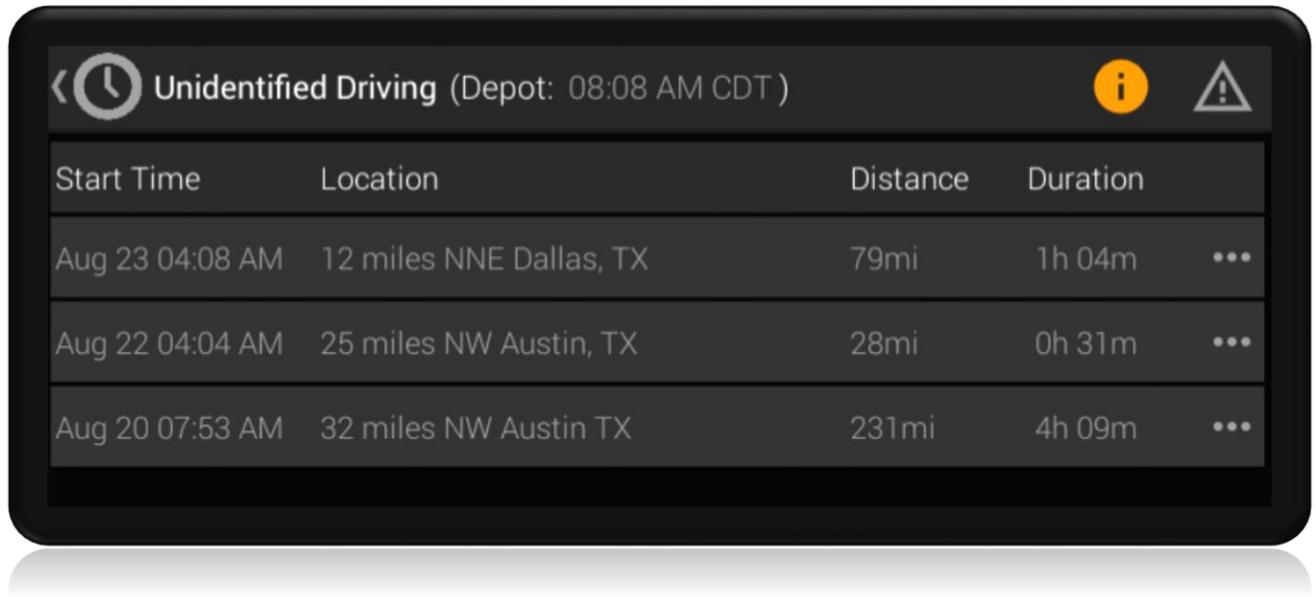
- ▶ Tap the 'Accept' button to approve your motor carrier's edit. Alternatively tap the 'Reject' button.

Accepting your motor carrier's edit updates your logs, and removes it from the list on the 'Motor Carrier Edits' screen. You may have to recertify your logs.

Rejecting your motor carrier's edit removes it from the list on the 'Motor Carrier Edits' screen. Your logs remain unchanged.

 **You are notified of any motor carrier edit suggestions in the notifications list**

Claiming Unidentified Driving



Start Time	Location	Distance	Duration	
Aug 23 04:08 AM	12 miles NNE Dallas, TX	79mi	1h 04m	...
Aug 22 04:04 AM	25 miles NW Austin, TX	28mi	0h 31m	...
Aug 20 07:53 AM	32 miles NW Austin TX	231mi	4h 09m	...

The ELD automatically records times when the vehicle was in motion and no driver was logged in. You can review and claim unidentified driving time. To claim unidentified driving time,

- ▶ Tap the 'Unidentified Driving' option in the navigation menu. This screen shows records of unidentified driving time that must be claimed
- ▶ Tap the menu of an unidentified driving time you wish to claim
- ▶ Tap the 'Accept' option to add the driving time to your logs. Alternatively tap the 'Reject' option.

Accepting unidentified driving time updates your logs, and removes it from the list on the 'Unidentified Driving' screen. You may have to recertify your logs.

Rejecting unidentified driving time removes it from the list on the 'Unidentified Driving' screen. Your logs remain unchanged.

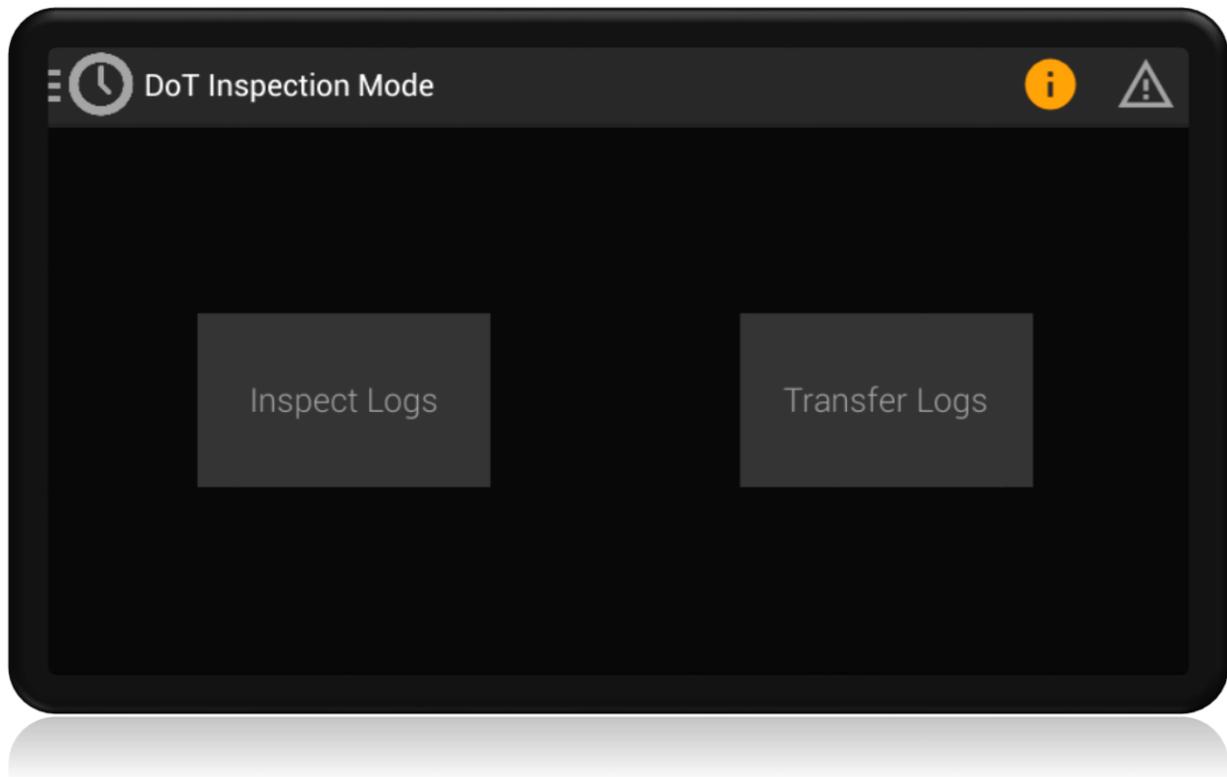
 **You are notified on log in if the ELD has unidentified driving events**

DOT Roadside Inspection

This section describes the functionality available for the roadside inspector. This includes viewing a summary of your RODS, both in graph and table form, and unidentified events, along with transferring a copy of your RODS to the DOT.

Follow the steps below when a roadside inspector requests to view your logs,

- ▶ *Open the navigation menu*
- ▶ *Scroll down on the menu and select the 'DOT Inspection Mode' option*
- ▶ *Hand the device to the roadside inspector*
- ▶ *The roadside inspector can select the following options*
 - *Inspect Logs, or*
 - *Transfer Logs.*

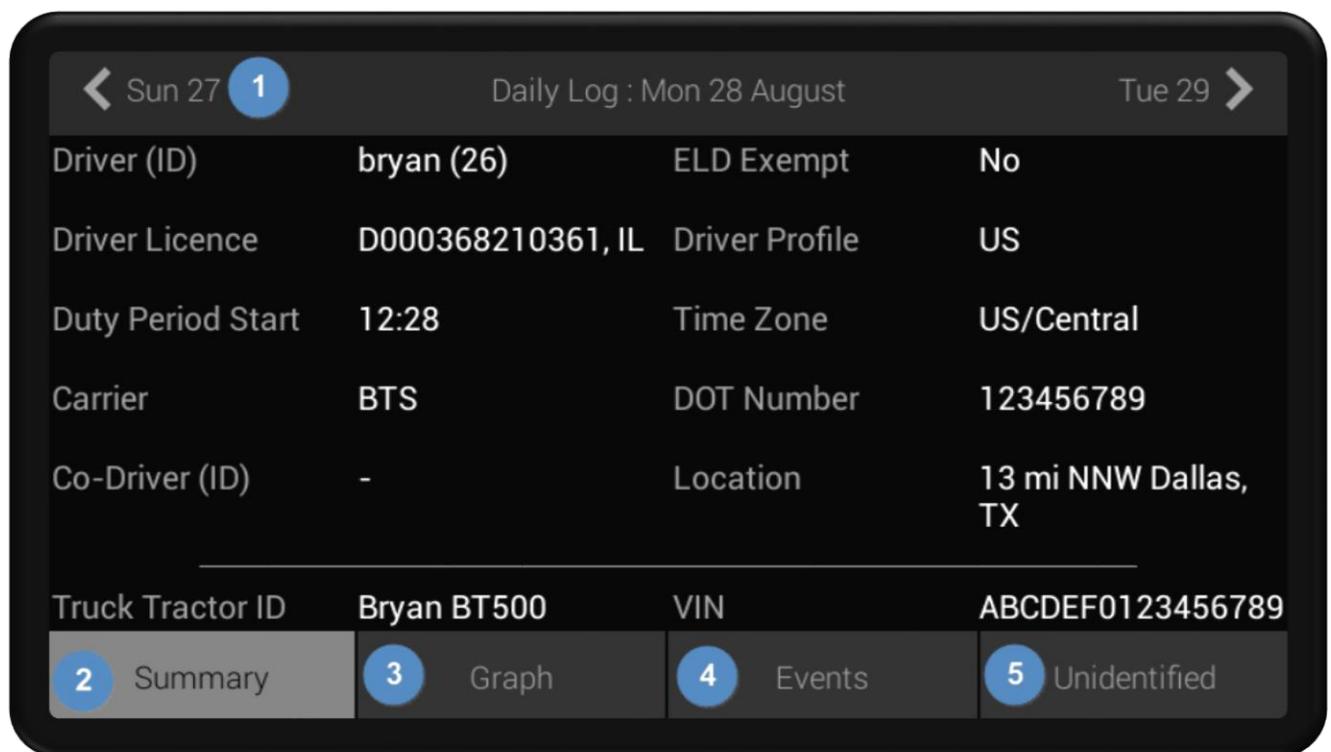


Inspecting Logs

DOT Summary

When the roadside inspector taps 'Inspect Logs' they are provided with screens to show a daily summary of your activities **2**, a graph of your RODS **3**, your ELD Events **4** and unidentified events **5** for this ELD.

By default, the 'Summary' tab is the first screen to display.



The inspector can move between days in your logs using the arrows provided **1**. A total of seven days logs plus the current day is available for inspection.

On the 'Summary' tab the roadside inspector can see,

- ▶ *Driver details*
 - *Name and ID*

- *License number and state*
- ▶ *ELD Exempt status*
- ▶ *Driver profile*
- ▶ *Duty Period Start (Time)*
- ▶ *Time Zone, of your depot*
- ▶ *Carrier Name*
- ▶ *DOT Number, of your motor carrier*
- ▶ *Co-Driver details*
 - *Name and ID*
- ▶ *Current Location*
- ▶ *Vehicle details*
 - *Truck Tractor ID*
 - *VIN*
 - *Start & End Odometer*
 - *Start & End Engine Hours*
- ▶ *Trailer details*
- ▶ *Shipping details*
- ▶ *Data Diagnostic indicators*
- ▶ *Malfunction indicators*
- ▶ *Unidentified Driving records indicator*
- ▶ *ELD details*
 - *ELD ID*
 - *ELD Provider*

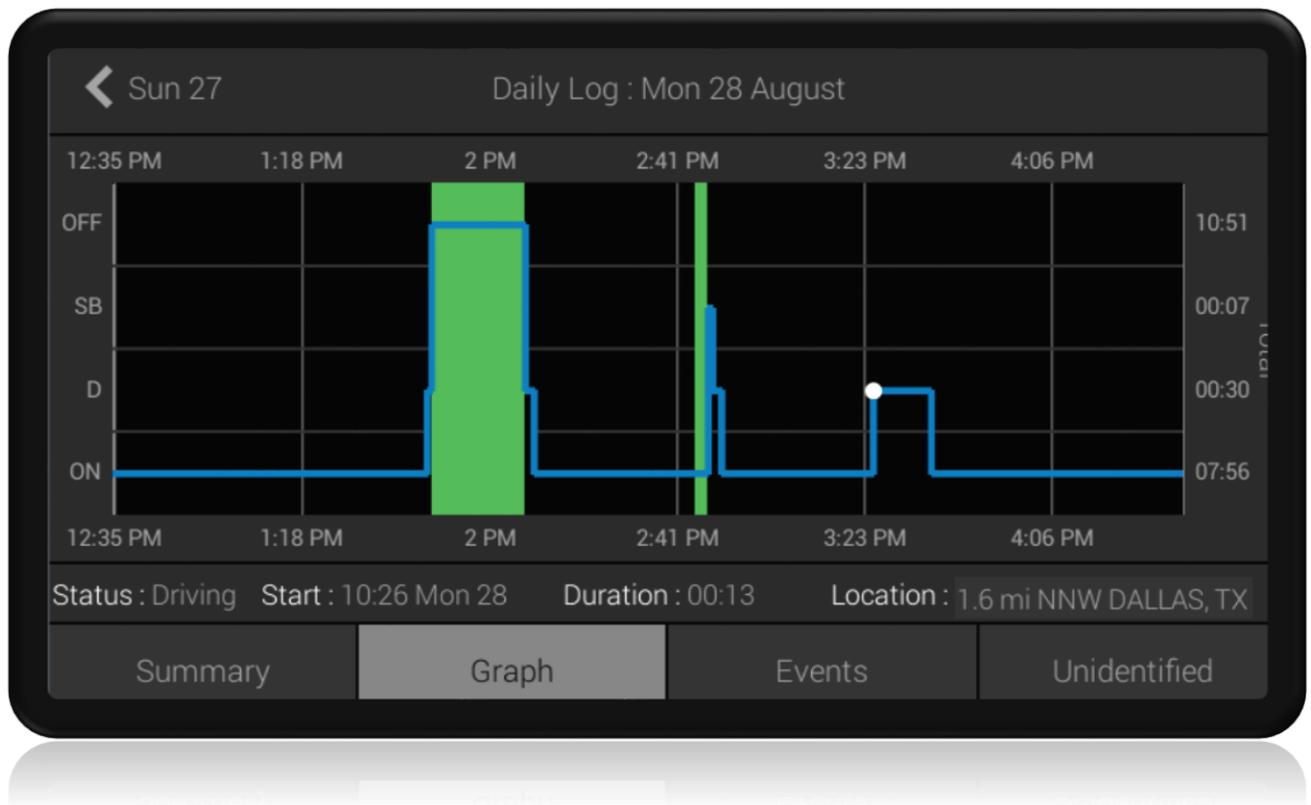


Depending on the device you may have to scroll down to see all details

RODS Graph

When a roadside inspector taps the 'Graph' tab, your RODS display in graphical format for the selected day. This is an interactive graph and provides the ability to zoom in to gain more details.

Green shading here indicates either yard movement or personal conveyance.

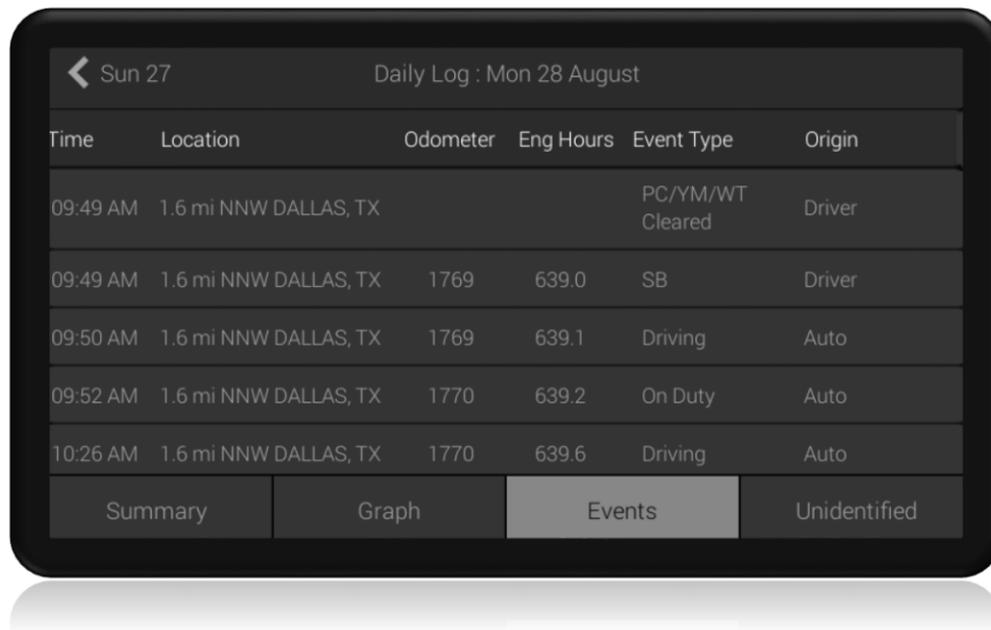


More details on the duty graph and how it operates can be found in the Reviewing Logs section on page 26.

Events Log

When the roadside inspector taps the 'Events' tab, it lists all the events recorded by the ELD for the selected day. The ELD tracks and records multiple types of events for audit purposes.

Your DOT inspection officer may want to view these events to ensure there has been no tampering of the ELD.

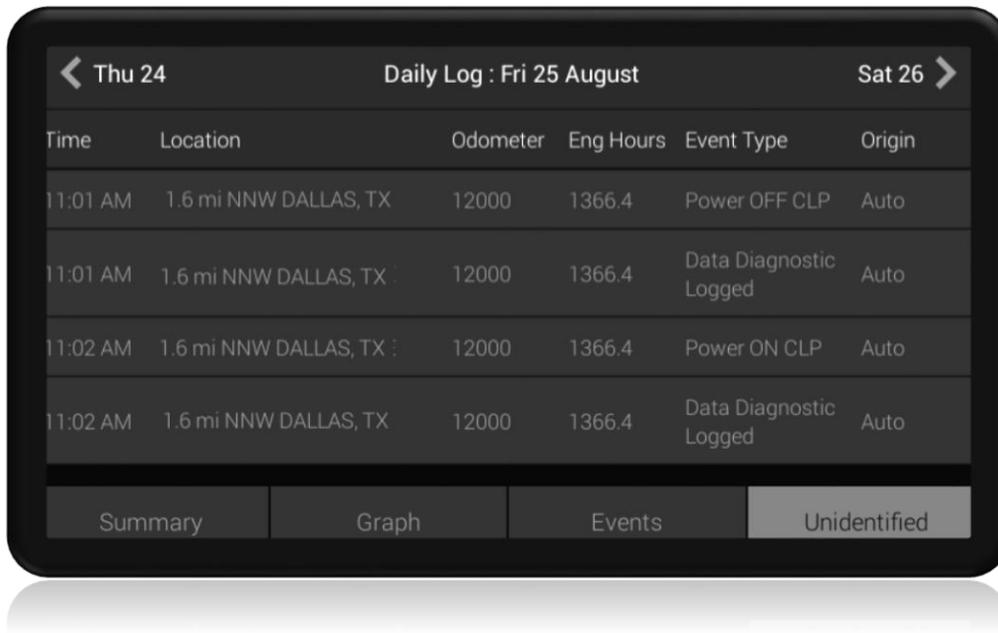


The screenshot shows a mobile application interface for an ELD. At the top, there is a navigation bar with a back arrow, the date 'Sun 27', and the title 'Daily Log : Mon 28 August'. Below this is a table with the following columns: Time, Location, Odometer, Eng Hours, Event Type, and Origin. The table contains five rows of event data. At the bottom of the screen, there is a navigation bar with four tabs: Summary, Graph, Events (which is highlighted), and Unidentified.

Time	Location	Odometer	Eng Hours	Event Type	Origin
09:49 AM	1.6 mi NNW DALLAS, TX			PC/YM/WT Cleared	Driver
09:49 AM	1.6 mi NNW DALLAS, TX	1769	639.0	SB	Driver
09:50 AM	1.6 mi NNW DALLAS, TX	1769	639.1	Driving	Auto
09:52 AM	1.6 mi NNW DALLAS, TX	1770	639.2	On Duty	Auto
10:26 AM	1.6 mi NNW DALLAS, TX	1770	639.6	Driving	Auto

For a full list of events refer to Appendix B (see page 53).

Unidentified Events



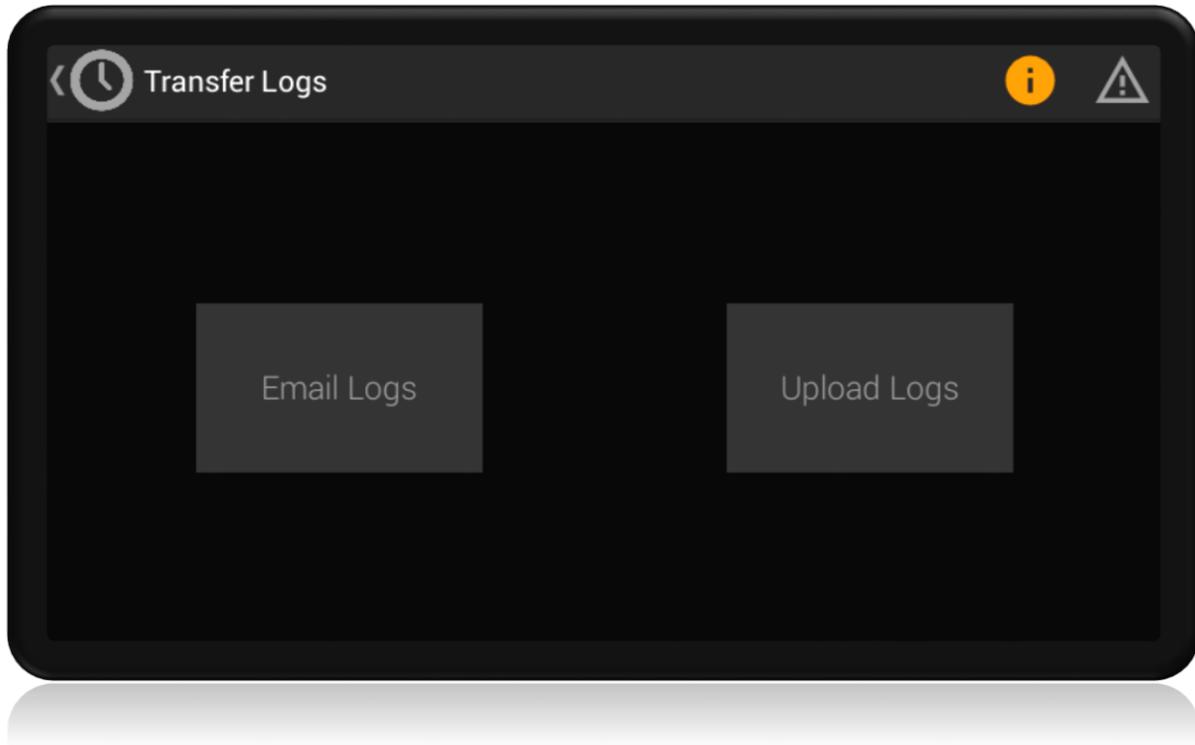
Time	Location	Odometer	Eng Hours	Event Type	Origin
11:01 AM	1.6 mi NNW DALLAS, TX	12000	1366.4	Power OFF CLP	Auto
11:01 AM	1.6 mi NNW DALLAS, TX	12000	1366.4	Data Diagnostic Logged	Auto
11:02 AM	1.6 mi NNW DALLAS, TX	12000	1366.4	Power ON CLP	Auto
11:02 AM	1.6 mi NNW DALLAS, TX	12000	1366.4	Data Diagnostic Logged	Auto

Summary Graph Events **Unidentified**

When the roadside inspector taps the 'Unidentified' tab, it lists all events that are not associated with any driver for the selected day. These events are recorded when the vehicle has been in use without a driver logged in.

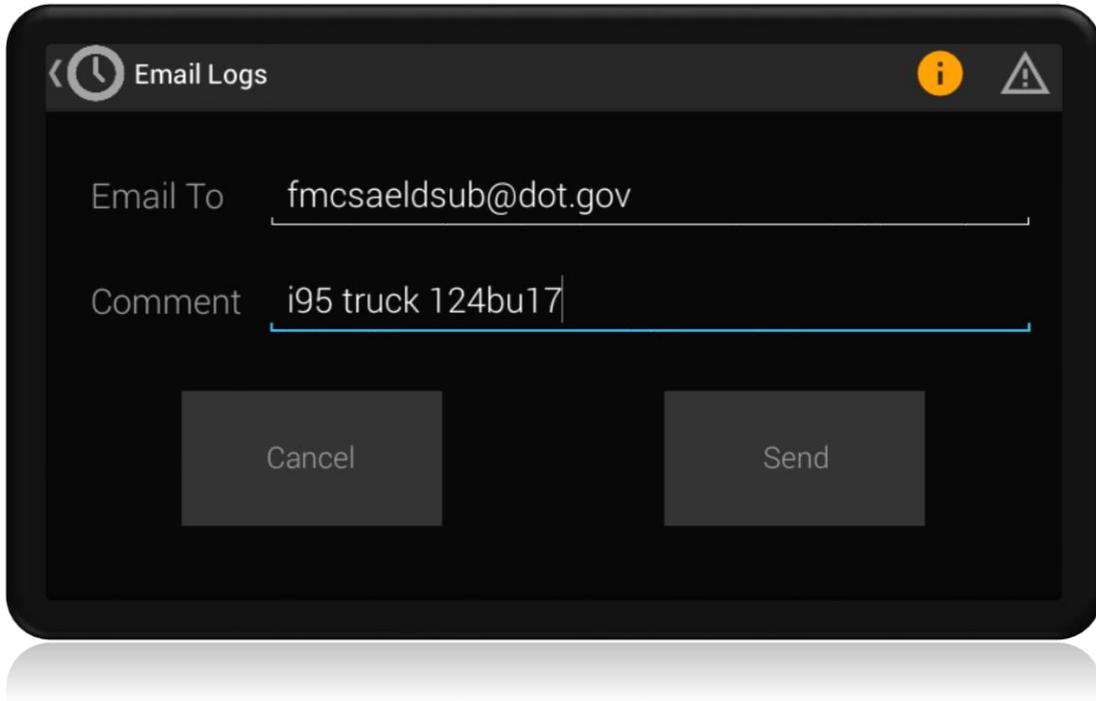
Transferring Logs

The Blue Tree Systems ELD allows transferring of your RODS to the DOT via email or web services.



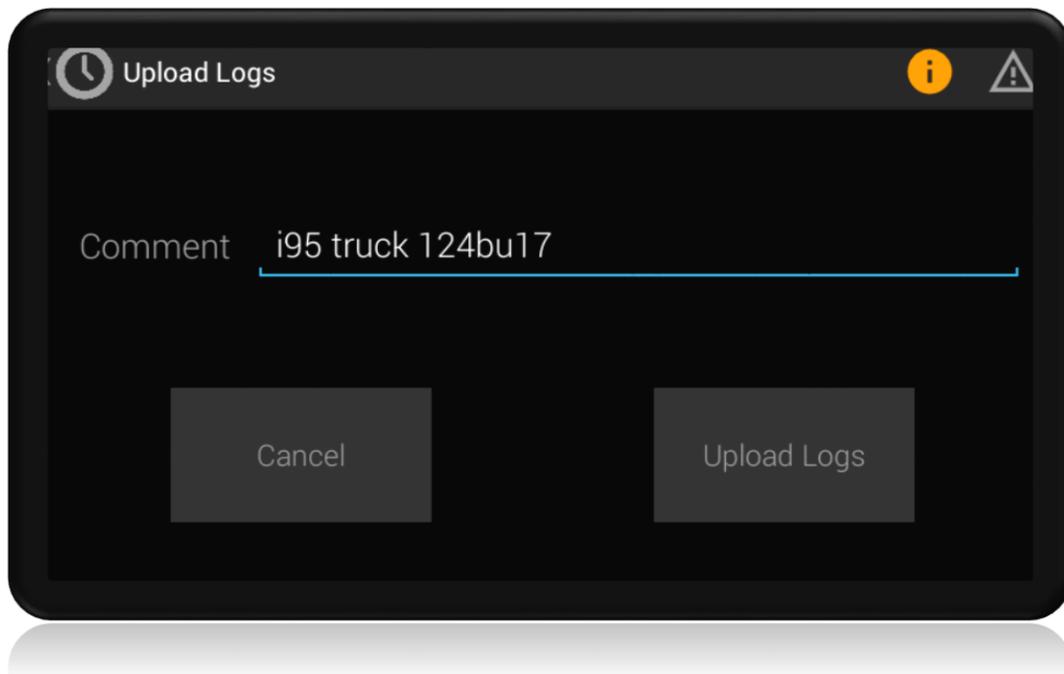
Email Transfer

- ▶ Tap the 'Email Logs' button. The email screen displays the destination email address as specified by the FMCSA. The roadside officer can enter a different email address
- ▶ If provided, enter the roadside inspector's comment
- ▶ Tap the 'Send' button to send your logs via email.



Web Services Transfer

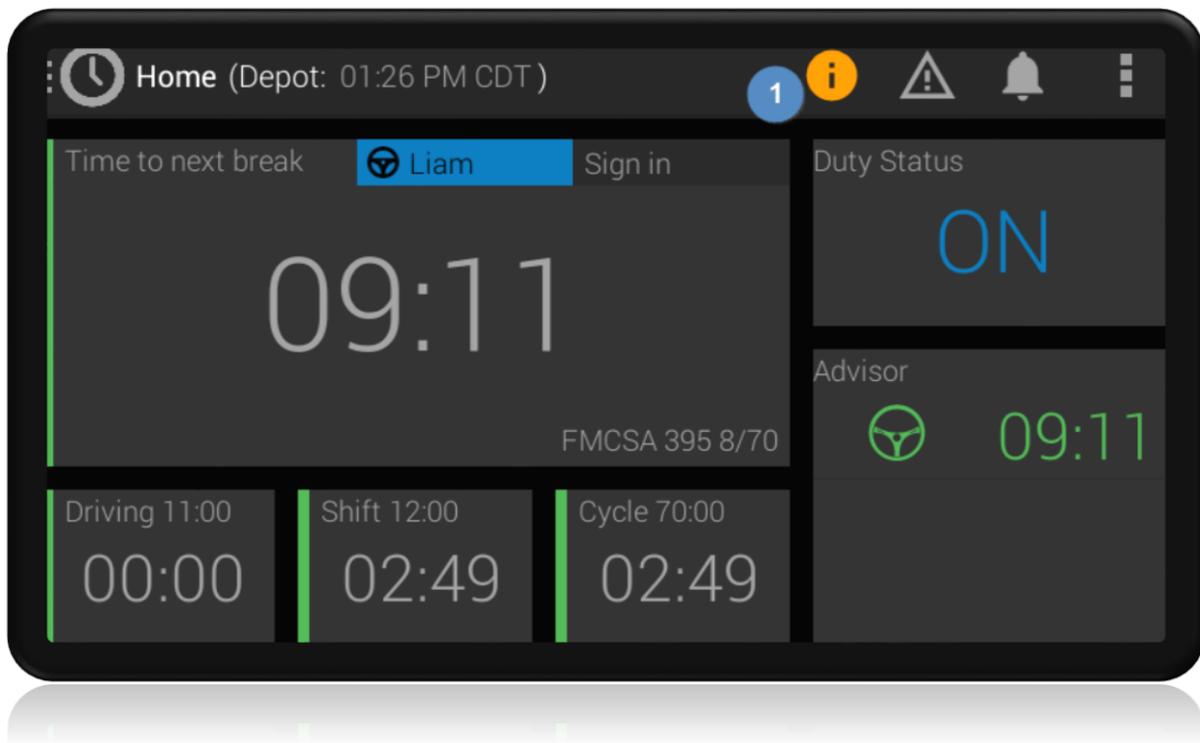
- ▶ Tap the 'Upload Logs' button
- ▶ If provided, enter the roadside inspector's comment
- ▶ Tap the 'Upload Logs' button to send your logs via webservice.



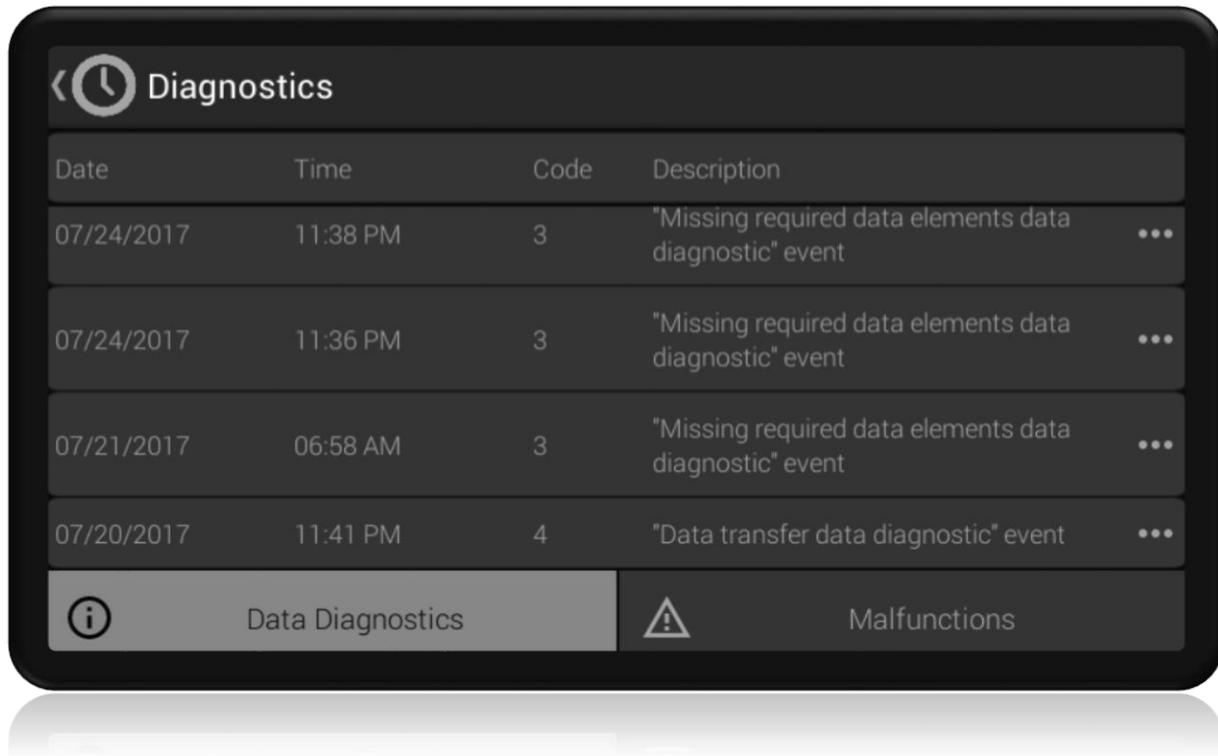
Managing Issues

Reviewing Data Diagnostics

The data diagnostic indicator **1** illuminates when the ELD detects a data inconsistency. It indicates there is required information missing from your logs.



When you see the data diagnostic indicator illuminated, you should view the data diagnostic details by tapping the indicator. This opens the 'Diagnostics' screen that lists data diagnostic events recorded on the ELD. You can view details of a data diagnostic and clear it from the menu on an event.



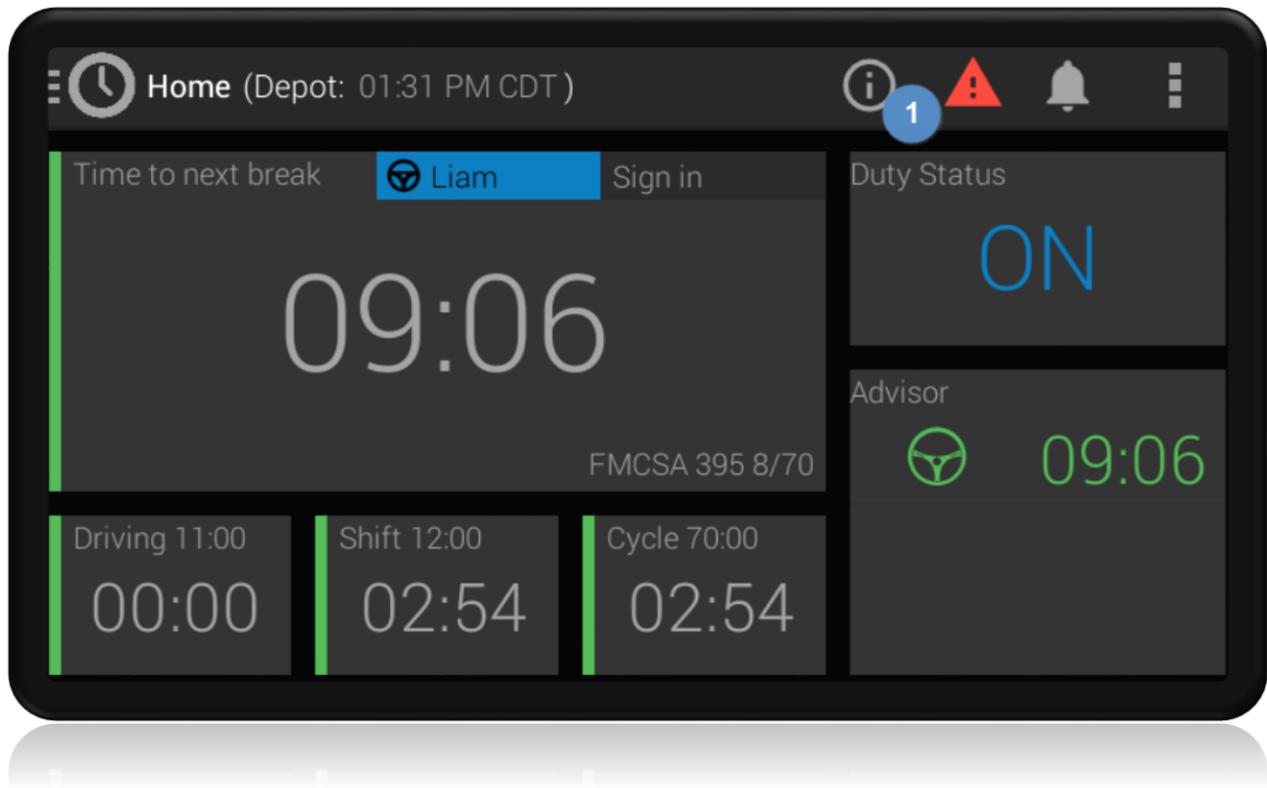
Data Diagnostics Summary - Causes & Resolutions

Code	Data Diagnostic	Cause	Resolution
1	Power data diagnostic	The ELD is not fully functional within one minute of the engine turning on.	You should review your logs and verify they are correct. If satisfied you can clear the data diagnostic event. Please contact your motor carrier if this data diagnostic persists.

Code	Data Diagnostic	Cause	Resolution
2	Engine synchronization diagnostic	The ELD has a temporary loss of connectivity to the vehicle ECM.	<p>You should review your logs and verify they are correct. If satisfied you can clear the data diagnostic event.</p> <p>Please contact your motor carrier if this data diagnostic persists.</p>
3	Missing required data elements data diagnostic	<p>The ELD has temporarily lost GPS connectivity.</p> <p>The ELD has a temporary loss of connectivity to the vehicle ECM.</p>	<p>You can occasionally resolve this issue by manually adding missing data to your logs.</p> <p>Please contact your motor carrier if this data diagnostic persists.</p>
4	Data transfer data diagnostic	The ELD has failed to communicate with Blue Tree Systems data transfer service for 7 continuous days.	<p>Verify the ELD has network connectivity. You may be operating in a location with poor cellular coverage.</p> <p>Please contact your motor carrier if this data diagnostic persists.</p>
5	Unidentified driving records data diagnostic	The ELD has accumulated more than 30 minutes combined vehicle use without a logged-in driver.	<p>You can resolve this issue by reviewing the unidentified driving records on the ELD and accepting any periods of driving that occurred while you were not logged in.</p> <p>Please contact your motor carrier if this data diagnostic persists.</p>

Managing Malfunctions

The malfunction indicator **1** illuminates when the ELD detects a technical compliance issue. The presence of a malfunction can affect the accuracy or completeness of you logs.



When you see the malfunction indicator illuminated, you should immediately view the malfunction details by tapping the indicator. This opens the 'Diagnostics' screen that lists details of malfunction events recorded on the ELD. You can view details of a malfunction and clear it from the menu on an event.

In accordance with §395.34(a), you must,

- ▶ *Notify your motor carrier of the malfunction within 24 hours*
- ▶ *Reconstruct your records of duty status for the current 24 hours and the last seven days on graph-grid paper logs that comply with §395.8, and*
- ▶ *Continue to keep paper logs until the ELD is serviced and brought back into compliance.*

Date	Time	Code	Description
08/03/2017	02:38 AM	P	"Power compliance" malfunction
08/02/2017	01:32 AM	P	"Power compliance" malfunction
08/01/2017	07:23 AM	P	"Power compliance" malfunction

Navigation buttons at the bottom: Data Diagnostics (Information icon) and Malfunctions (Warning icon).

Malfunctions Summary - Causes & Resolutions

Code	Malfunction	Cause	Resolution
P	Power Compliance	<p>The ELD has accumulated more than 30 minutes of driving time lost in a 24-hour period.</p> <p>There may be a fault in the ECM link or an issue with the ELD installation.</p>	<p>Please contact your motor carrier.</p> <p>You should revert to paper logs.</p>
E	Engine Synchronization	<p>The ELD has accumulated more than 30 minutes without ECM engine synchronization over a 24-hour period.</p> <p>There may be a fault in the ECM link or an issue with the ELD installation.</p>	<p>Please contact your motor carrier.</p> <p>You should revert to paper logs.</p>
T	Timing Compliance	<p>The ELD's internal clock in the vehicle has not yet synchronized with the server that resulted in a time deviation of 10+ minutes.</p> <p>This can occur when the vehicle the ELD is in has not been in service for a period of time?</p>	<p>This should auto-resolve once the internal clock has synchronized with the Blue Tree server.</p> <p>If this malfunction does not auto-resolve or persists, please contact your motor carrier.</p>
L	Positioning Compliance	<p>The ELD has accumulated more than 60 minutes without a GPS lock within a 24-hour period.</p> <p>This can occur when the vehicle is in any area without GPS / the GPS is disconnected or not properly fitted to the ELD.</p>	<p>This should auto-resolve once the ELD gets a valid GPS lock.</p> <p>If this malfunction does not auto-resolve or persists, please contact your motor carrier.</p>

Code	Malfunction	Cause	Resolution
R	Data Recording	The ELD does not have sufficient storage capacity to record ELD events.	Please contact your motor carrier. You should revert to paper logs.
S	Data Transfer Compliance	The ELD has failed to transfer the driver's logs to the DOT as requested during a roadside inspection. Occurs if a Data Transfer Data Diagnostic event has not auto-resolved after 3 days from the when it was detected.	Verify the ELD has network connectivity. You may be operating in a location with poor cellular coverage. If this malfunction does not auto-resolve within a 24-hour period, please contact your motor carrier.

Appendix A

§ ELD malfunctions and data diagnostic events (395.34)

(a) **Recordkeeping during ELD malfunctions.** In case of an ELD malfunction, a driver must do the following:

(1) Note the malfunction of the ELD and provide written notice of the malfunction to the motor carrier within 24 hours;

(2) Reconstruct the record of duty status for the current 24-hour period and the previous 7 consecutive days, and record the records of duty status on graph-grid paper logs that comply with § 395.8, unless the driver already possesses the records or the records are retrievable from the ELD; and

(3) Continue to manually prepare a record of duty status in accordance with § 395.8 until the ELD is serviced and brought back into compliance with this subpart.

(b) **Inspections during malfunctions.** When a driver is inspected for hours of service compliance during an ELD malfunction, the driver must provide the authorized safety official the driver's records of duty status manually kept as specified under paragraphs (a)(2) and (3) of this section.

(c) **Driver requirements during ELD data diagnostic events.** If an ELD indicates that there is a data inconsistency that generates a data diagnostic event, the driver must follow the motor carriers and ELD provider's recommendations in resolving the data inconsistency.

(d) Motor carrier requirements for repair, replacement, or service.

(1) If a motor carrier receives or discovers information concerning the malfunction of an ELD, the motor carrier must take actions to correct the malfunction of the ELD within 8 days of discovery of the condition or a driver's notification to the motor carrier, whichever occurs first.

(2) A motor carrier seeking to extend the period of time permitted for repair, replacement, or service of one or more ELDs shall notify the FMCSA Division Administrator for the State of the motor carrier's principal place of business within 5 days after a driver notifies the motor carrier under paragraph (a)(1) of this section. Each request for an extension under this section must be signed by the motor carrier and must contain:

(i) The name, address, and telephone number of the motor carrier representative who files the request;

(ii) The make, model, and serial number of each ELD;

(iii) The date and location of each ELD malfunction as reported by the driver to the carrier; and

(iv) A concise statement describing actions taken by the motor carrier to make a good faith effort to repair, replace, or service the ELD units, including why the carrier needs additional time beyond the 8 days provided by this section.

(3) If FMCSA determines that the motor carrier is continuing to make a good faith effort to ensure repair, replacement, or service to address the malfunction of each ELD, FMCSA may allow an additional period.

(4) FMCSA will provide written notice to the motor carrier of its determination. The determination may include any conditions that FMCSA considers necessary to ensure hours-of-service compliance. The determination shall constitute a final agency action.

(5) A motor carrier providing a request for extension that meets the requirements of paragraph (d)(2) of this section is deemed in compliance with § 395.8(a)(1)(i) and (a)(2) until FMCSA makes an extension determination under this section, provided the motor carrier and driver continue to comply with the other requirements of this section

Appendix B

ELD Events

Event Type	Event Description
Cert	You certified a daily record
Data Diagnostic cleared	A data diagnostic was cleared
Data Diagnostic Logged	The ELD recorded a data diagnostic
Driving	Your duty status changed to Driving
Int CLP	Intermediate log recorded with conventional location precision
Int RLP	Intermediate log recorded with reduced location precision
Login	You logged in to the ELD
Login Co Driver	A co-driver logged in to the ELD
Logout	You logged out of to the ELD
Logout Co Driver	A co-driver logged out to the ELD
Malfunction Cleared	A malfunction was cleared
Malfunction Logged	The ELD recorded a malfunction

Event Type	Event Description
OFF duty	Your duty status changed to OFF duty
ON duty	Your duty status changed to ON duty
PC	You selected to use PC
PC/YM Cleared	Your use of PC or YM ended
Power Off CLP	CMV engine shut-down recorded with conventional location precision
Power Off RLP	CMV engine shut-down recorded with reduced location precision
Power On CLP	CMV engine power-up recorded with conventional location precision
Power On RLP	CMV engine power-up recorded with reduced location precision
SB	Your duty status changed to Sleeper Berth
YM	You selected to use YM

Appendix C

Glossary of Terms

Term	Definition
DOT	Department of Transport
ECM	Engine Control Module
ELD	Electronic Logging Device
GPS	Global Positioning System
HOS	Hours of Service
Launcher	The blue tree systems device home screen / dashboard displaying multiple widgets.
RODS	Records of Duty Status
VIN	Vehicle Identification Number
DOT	Department of Transport

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