2.6 Software updates

Raymarine[®] regularly issues software updates for its products which provide new and enhanced features and improved performance and usability.

It is important to ensure that you have the latest software for your products by regularly checking the Raymarine[®] website for new software releases.

www.raymarine.com/software

Note:

- It is recommended that you always backup your User data before performing a software update.
- The "Check online" feature is only available on display variants that include built-in Wi-Fi that have been configured with an active Internet connection.

In addition to updating your display's software, your display can also be used to update the software of devices connected to the same SeaTalkng[®] backbone.

The following devices are currently approved for updating using an Element[™] display:

- EV-1 heading sensor
- ECI-100 engine gateway
- i70s multifunction instrument display
- p70s / p70Rs pilot controller

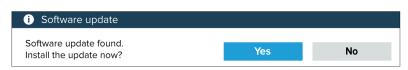
Updating display software using a memory card

Follow the steps below to update the software on your display.

- Check the product hardware variant and the software version of the products you want to update.
- Go to the Raymarine website: (www.raymarine.com > Support > Software Updates).
- 3. Browse for your product.
- 4. Check if an updated software version is available for your product.
- 5. Download the relevant software package(s) (ISO files).
- 6. Copy the files to MicroSD card.
- 7. With your display powered on, insert the MicroSD card into the card reader slot.

The software update files will be recognized automatically.

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8. Select Yes to update the software.

A list of available products is displayed. The list will include your display and products that are connected to the SeaTalkng[®] backbone.

Software update list example

	Available softwa	re updates
	Element 9 HV (this device) E70534 1280023	Update
2322	EV-1 Course Computer E70096 0180421	Ormed
1355	E70227 ECI-100 E70227 0380200	Cancel
L.SET	i70s Display E70327 0561480	Refresh
2.5 8.2	p70s Control Head E70328 0360059	
	SeaTalk-STNG-Converter E22158 0611380	
		To update a product, ensure is it switched on and connected to the network. Updating may take several minutes, during which time your system will be inoperable. Do not install updates while the boa is underway.

9. Select each device that you want to update.

If a notification is displayed asking if you want to reinstall the current software version, unless you are experiencing problems with the product select **No**, otherwise select **Yes** and the current version of software will be reinstalled.

- 10. When all relevant products have been chosen, select **Update selected** to commence the software update process.
- 11. Wait for the update process to complete.
- 12. Select Exit.

Note:

- Your products may reboot automatically as part of the update process.
- You can also select Check SD card from the Update software pop-over options (Homescreen > Settings > Getting started > Update software.

Updating software using an internet connection

When using an Element[™] display that includes built-in Wi-Fi, follow the steps below to update your display's software and software on approved devices connected to the same SeaTalkng [®]backbone, using an internet connection.

- Select Update software from the Getting started menu: (Homescreen > Settings > Getting started).
- 2. Select **Check online** from the pop-over menu.

If you do not have an active internet connection then you will be requested to create one.

- 3. To set up a Wi-Fi connection select **Wi-Fi settings** and connect to the required Wi-Fi access point/hotspot.
- Select Start.

A list of available products is displayed. The list will include your display and products that are connected to the SeaTalkng[®] backbone.

Software update list example

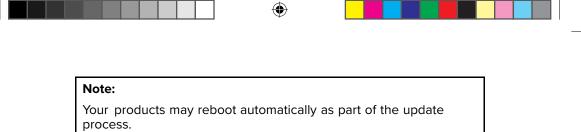
	Available software	e updates
	Element 9 HV (this device) E70534 1280023	Update
2322	EV-1 Course Computer E70096 0180421	
	E70227 ECI-100 E70227 0380200	Cancel
1355	i70s Display E70327 0561480	Refresh
2352	p70s Control Head E70328 0360059	
1351	SeaTalk-STNG-Converter E22158 0611380	
		To update a product, ensure is it switched on and connected to the network. Updating may take several minutes, during which time your system will be inoperable. Do not install updates while the boat is underway.

5. Select each device that you want to update.

If a notification is displayed asking if you want to reinstall the current software version, unless you are experiencing problems with the product select **No**, otherwise select **Yes** and the current version of software will be reinstalled.

6. When all relevant products have been chosen, select **Update selected** to commence the software update process.

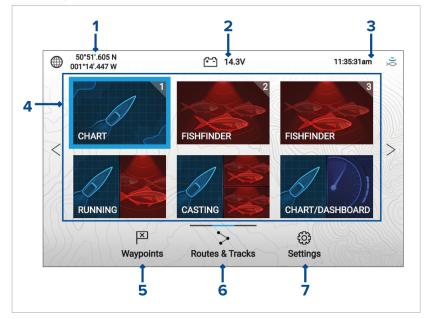
- 7. Wait for the update process to complete.
- 8. Select Exit.



Chapter 3: Homescreen

3.1 Homescreen overview

All settings and apps can be accessed from the Homescreen.



- 1. **Position/fix details** Shows your vessel's current position coordinates. Select the area to view fix accuracy and to access position settings.
- Supply voltage Shows the display's supply voltage. The Voltage reading is colored Red if the current supply voltage is lower than the value specified in the Low voltage threshold alarm setting: Homescreen > Settings > Alarms > Low voltage threshold.
- Status area Displays system time, count down/up timer and sonar ping status. Select the area to set count down / up timer, time zone and to set daylight savings.
- 4. App page icons The Homescreen is made up of 3 pages that can each contain up to 6 app page icons. Selecting an app page icon opens the relevant app page. To view a different Homescreen page, keep pressing the Directional pad's Left or Right buttons until the Homescreen page changes. You can identify which Homescreen page is being shown using the indicator bar, located above the Routes & Tracks icon.

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5. Waypoints — Select to view the Waypoints list.

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- 6. Routes & Tracks Select to view the Routes and Tracks lists.
- 7. Settings Select to view the display's Settings menu.

Note:

The combination of the selected **Activity** and **Transducer selection** during the Start up wizard determines the default app page icons displayed on the Homescreen.

Available apps

Apps are used in App pages. Each app page is represented on the Homescreen by an app page icon.

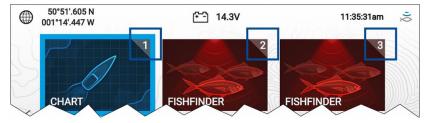
Each app page can include up to 4 apps. The individual apps available are:

CHART	Chart — The Chart app displays electronic cartographic information from your Chart cards and when used in conjunction with a GNSS (GPS) receiver, plots your vessel's position. The Chart app can be used to: mark specific locations using Waypoints; build and navigate Routes; or, keep a record of where you have been by recording a Track. For detailed information about the Chart app refer to: Chart app p.39			
Fishfinder — The Fishfinder app uses a connect transducer to help you find fish by creating an underwater view of bottom structure and target the water column that is covered by your transd For detailed information about the Fishfinder app to: Fishfinder app p.48				
	Note:			
The channels available in the fishfinder app ar determined by the display variant and connect transducer.				
	Dashboard — The Dashboard app provides data readings from connected sensors and equipment.			
DASHBOARD	Note:			
The Dashboard app is only available in splitsc app pages.				
For detailed information about the Dashboard refer to: Dashboard app p.54				

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Assigning app pages to Quicklaunch buttons

App pages assigned to the Quicklaunch buttons are identified using the associated Quicklaunch button number in the top right corner of the app page icon.



You can change which app page is assigned to the Quicklaunch buttons by following the steps below:

- 1. Using the **Directional pad**, highlight the app page icon that you want to assign to a Quicklaunch button.
- 2. Press and hold the relevant **Quicklaunch** button until the 'Quicklaunch button configured' message is displayed.

The app page icon is updated to show the associated **Quicklaunch** button number in the top right corner of the icon.

 Repeat steps 1 and 2 for the remaining Quicklaunch buttons, if required.

3.2 Customizing app pages

You can customize the homescreen app pages.

- 1. Highlight the app page icon you want to change.
- 2. Press and hold the OK button.

The pop-over menu is displayed.

- 3. Select the relevant option:
 - **Customize** select customize to change the app page to one of the available configurations.
 - **Delete** select delete to delete the app page icon from the homescreen.
 - **Rename** select rename to change the name of the app page icon using the onscreen keyboard.
 - Assign as Quicklaunch 1/2/3 select to assign the app page to a Quicklaunch button.

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3.3 Settings menu

The display's settings can be accessed by selecting the **Settings** icon on the Homescreen.

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The following settings and details are available for your display.

Tab	Settings	
Getting started	Hardware and software information about your display.	
	 Update display software. 	
	Change the user interface language.	
	 Enable/disable Retail/demo mode (Simulator mode). 	
	Choose a Demo type .	
	Enable/disable Demo movie.	
	 View the Terms of Use disclaimer. 	
Boat details	 Configure Minimum safe depth, height and width. 	
	Configure engines.	
	Configure tanks.	
	Configure batteries.	
Units	Configure preferred units of measurement.	
	 Configure date and time settings. 	
	Configure Bearing mode.	
	Configure system datum.	
	Configure variation.	
This display	 Switching between Light and Dark user interface color themes. 	
	Calibrate an EV-1 heading sensor.	
	Select data sources.	
	 Diagnostics: View display product information, view product information for connected products, save / erase system logs. 	
	 Perform a Settings or Factory reset. 	

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Tab	Settings
Alarms	Configure alarm settings.
Import/export	 Import and export user data (Waypoints, Routes and Tracks) from MicroSD card.
	• Eject SD card.

3.4 Alarms

Alarms are used to alert you to a hazard or situation requiring your attention. Alarms are triggered based on their specified thresholds.

The following alarms can be configured on your display:

- Dangerous AIS targets
- Shallow depth
- Waypoint arrival
- Low voltage
- Off track
- Anchor drift
- Water temperature
- Fish detection
- Engine alarms
- Satellite lost fix

Alarms are color coded to signify their severity:

Dangerous alarm example

🛕 Alarm			
	400		
Waypoint arrival	180 _{ft}	Edit	ОК
	IL		

Red — is used to signify a dangerous alarm condition, immediate action is required due to a potential or immediate danger to life or vessel. Dangerous alarms are accompanied by an audible tone. The Dangerous alarm notification and audible tone will continue to be displayed until acknowledged or the conditions that triggered the alarm are no longer present.

Warning alarm example

逆 Warning			
Low voltage	8.7 _v	Edit	ОК

Orange — is used to signify a warning alarm condition. Warning alarms are used to signify that there has been a change in situation that you need to be aware of. Warnings alarms are accompanied by an audible tone. The warning alarm notification and audible tone will continue to be displayed until acknowledged or the conditions that triggered the alarm are no longer present.

Notification example

i Software update		
Software update found. Install the update now?	Yes	No

Blue — is used to signify information requiring user acknowledgement. Information notifications may self dismiss after 3 seconds, unless they require user interaction. Information notifications are not accompanied by an audible tone.

3.5 Position settings

The details and settings for your display's internal GNSS (GPS) receiver can be accessed from the Homescreen.

		Satellites
Fix Settings		
Differential positioning:		Activating differential positioning provides more accurate positioning in regions covered by Satellite Based Augmentation Systems (SBAS).
COG/SOG filter:	Medium	Setting the COG/SOG filter according to the amount of your vessel's oscillation (e.g.: roll, pitch and yaw) provides more stable COG and SOG values.
Internal GPS:		Disable if you do not want to use this unit's internal GNSS receiver as a source for positioning data.
Send GPS to VHF:		Disable if your connected VHF radio has its own source of position.
Restart		

From the Settings tab you can:



- activate and deactivate Differential positioning (SBAS).
- set the COG/SOG filter according to the amount of vessel oscillation.
- enable and disable your display's internal GNSS (GPS) receiver. (Only disable if you do not want to use positioning data on your display).
- restart the internal GNSS (GPS) receiver.

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Chapter 4: Waypoints, Routes and Tracks

4.1 Waypoints

Waypoints are used to mark specific locations or points of interest.

Waypoints can be used in the Chart and Fishfinder apps. Your display can store up to 5,000 waypoints, which can be sorted in up to 200 waypoint groups.

In the Chart app you can navigate to a waypoint by selecting **Goto** from the Waypoint context menu.

Waypoints can be imported and exported from the display. For more information, refer to: User data import and export p.37

Placing a waypoint (Quick method)

To place a waypoint at a specific location in the Chart or Fishfinder apps, follow the steps below.

1. Use the **Directional pad** to place the cursor over the desired location and press the **Waypoint** button.

The app will be in cursor mode and the waypoint saved notification is displayed.

i) Waypoint 7 saved						
	Recent symbols					
Symbol:	💌 🔁 🛦 🔛 🏹					
Group:	UNSORTED	More options \checkmark				

Note:

If there is no interaction with the notification within 5 seconds the notification will automatically close, saving the waypoint with the default values.

- 2. If required, select a recent waypoint symbol that you want to assign to the waypoint.
- 3. Press the OK button.

The waypoint will be saved with the chosen symbol, in the waypoint group shown against **Group:**.

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Waypoints are sorted and displayed in waypoint groups menu.

Waypoint groups menu

Waypoint groups							
Name	Num of wpts	Show/hide	Shenandoah				
ALL WAYPOINTS	22		te Highwar 972 Us Lighway y 7 3 3 3 3 8 8				
TODAYS WAYPOINTS	12		Deenho Change Growysle 3				
	17	0	3 3 7 10 3 Bear part 1 3 7 7 10 10 3 Crandou 2010				
Fishing 5		7 3 10 10 10 10 10 10 10 10 10 10 10 10 10					
		Channel 10 10 ¹⁰ 13 3 7 10 10 10 10 10 13 13 13 14 10 <					
			Find waypoints in this area				
		🗁 New group 🛛 🏳 New WPT					
			Delete				

Waypoints can be viewed from the waypoint menu which can be accessed from the Homescreen (**Homescreen > Waypoints**) and from the Chart app (**Chart app > Menu > Waypoints**).

Waypoints will be saved to the same group as the last waypoint you created. All waypoints can also be viewed by selecting **ALL WAYPOINTS** and waypoints created the same day can be viewed by selecting **TODAYS WAYPOINTS**.

You can use the waypoint groups menu options to:

- Find nearby waypoints.
- Create a new waypoint group.

Note: Waypoint group names can be any combination of letters, numbers, symbols and special characters and can include up to 16 characters. Waypoint group names must be unique.

- Create a new waypoint.
- Delete a waypoint or waypoint group.

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Waypoint groups

	Fishing group		
Name	Date created	7.41 Us Highway #1 Shenandoah	Ban 3 740 3 3 5
Fishing	\odot	State Highway 972s Hughway 7	Itami/South Cannel 7 3 3 3 4 10 7 3 6 3 3 5 10 10 10 10 10 10 10 10 10 10 10 10 10
X Waypoint 13	10:02am 16/04/2019	he Pines Bay Heights Bay Estates Deervig Change Groweisle	10 10 Virginia Key 6
X Waypoint 12	12:48am 18/05/2017	Dinne Bess 3 7 7	10 10 Grand Cost 10 10 10 10 10 10 10 10 10 10 10 10 10
X Waypoint 11	12:48am 18/05/2017	3 Diner tay Channel 19	
X Waypoint 10	12:48am 18/05/2017	rout-ving channel 7 10 10 oterway 7 7 10 10	10 10 Key Biscayne 3 13
X Waypoint 9	12:48am 18/05/2017	3 7 7 10 10 ¹⁰ 3 7 7 10 10 ¹⁰	13 13 Harten 10 13
X Waypoint 8	12:47am 18/05/2017	7 7 7 10 10 10 10 10 10 10 10 10 10 10 10 10	10 12 1381E 3 13 13 10Canterida Channel7 3
		7 10 10 10 10 10 7 10 Hiscayne Bay 10 N-up 10 10 10 10	
		Find waypoin	its in this area
		🖌 Multi-edit	New waypoint

Selecting **ALL WAYPOINTS**, **TODAYS WAYPOINTS**, **UNSORTED** or a user created waypoint group will display a list of all the waypoints in that group / category.

With a list of waypoint displayed you can:

- Find waypoints located in the area covered by the LiveView pane.
- Edit multiple waypoints (i.e.: you can change the symbol used for multiple waypoints, move multiple waypoints to a different group or delete multiple waypoints).

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- Create a new waypoint in the current waypoint group.
- · View and customize waypoint details.

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Waypoint details

Waypoint 13					
Name:	Waypoint 13		1	0 860 900 98	
Symbol:	×				000
Group:	Fishing		1		980 961 980
Position:	25°54'.567 N 079°56'.313		56'.313 W	833 860 900 900 900 900 900 900 900 9	961 980 980
Bearing:	049.9°T	Range:	18.56nm	900 900 940 98	980 980 1050
Water temp:		Depth:		940 980	1001 980 1020 965 899
Time:	10:02:34am	Date:	16/04/2019	948 980 980 980 100 940 1001 1020 1100	
Comment:				Delete	View on chart
				Go to	

Selecting a waypoint from the list displays customizable details for that waypoint. The waypoint's location is also displayed in the LiveView pane on the right side of the screen

With the waypoint details displayed you can:

• Edit the waypoint's Name.

Note: Waypoint names can be any combination of letters, numbers, symbols and special characters and can include up to 16 characters. Waypoint names must be unique.

- · Change the waypoint's symbol.
- · Assign or change the waypoint group.
- Enter new position coordinates for the waypoint.
- · Add or edit the waypoint comment.

Note: Waypoint comments can be any combination of letters, numbers, symbols and special characters and can include up to 32 characters.

- Delete the waypoint.
- Perform a Go to.
- View the waypoint in the chart app.

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4.2 Routes

Routes are used to plan your journey in advance. You can plan your journey directly on your display, or at home using software capable of exporting waypoints and routes in standard .gpx format.

Routes consist of a number of waypoints. Your display can store up to 50 routes, each route consisting of up to 250 waypoints. When creating routes the route capacity is subject to the display's 5,000 waypoint limit (e.g.: your display could store 20 routes each containing 250 waypoints).

To navigate a saved route, place the cursor over the route and press the **OK** button, then select **Follow route** from the context menu.

Routes can be imported and exported from the display. For more information, refer to: **User data import and export p.37**

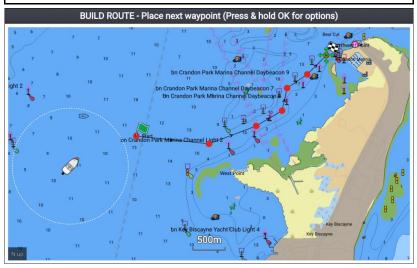
Creating a Route

Follow the steps below to build a new route

Routes can be created in the chart app.

Important:

Before following a route, you must ensure that each waypoint and leg of your route is safe for your vessel to navigate.



- 1. Select the location for the first waypoint.
- 2. Select **Build route** from the context menu.
- Select the location for the second waypoint. The 2 waypoints will be joined by a line, creating the first leg of your route.