

SmartST™ V3

for Palm OS® 5

User Manual



NAVMAN

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1. Introduction

Whether you travel in your own country, or overseas, SmartST™ will direct you to your destination without the need for map books and second-hand instructions.

The Global Positioning System is available free of charge, at any time, and depending on your GPS receiver, may be accurate to within 5 m (15 ft). SmartST maps provide street level detail for door-to-door navigation, including Points of Interest (POIs) such as accommodation, railway stations and airports.

Use this manual to help you install SmartST, learn how to operate it effectively and safely and discover the range of features available to you.

GPS and GPS Signals

The Global Positioning System (GPS) is a network of satellites that transmit accurate time and position information worldwide. GPS receivers receive signals from these satellites, and use the information to determine an exact location.

GPS satellites orbit the Earth at around 12,000 miles. While a GPS receiver can detect signals from up to 12 satellites at any time, only three are needed to provide the two-dimensional position or “fix” (latitude and longitude) required for vehicle navigation systems. GPS data is available free of charge for any user.

SmartST is designed to use GPS information to find your current position, and calculate the best route to your desired destination using the available road maps. SmartST will then guide you with voice and visual commands to your destination using the continuous stream of GPS data to track your position.

Safety Notice

In a vehicle, it is your sole responsibility to place, secure and use your handheld in a manner that will not cause accidents, personal injury or property damage. The user of this product is solely responsible for observing safe driving practices.

It is your sole responsibility to adhere to the following safety instructions at all times:

- Do not operate SmartST while driving.
- Do not mount your GPS receiver or handheld in a way that interferes with airbags or other safety equipment.
- Do not use or handle your GPS receiver or handheld when it is hot; leave it to cool out of direct sunlight.

Navman disclaim all liability for use of this product in a way that may cause accidents or damage or that may violate law.

2. Installing SmartST

Begin by installing SmartST Desktop on your computer. Then install and register SmartST on your handheld, activate and download the maps you require from SmartST Desktop. You will need an Internet connection to complete activation.

Note: Windows® XP® users, ensure XP® Service Pack 1 or higher is installed before you install SmartST Desktop.

1. Close all open programs on your computer.
2. Plug your memory card reader (enclosed) into the USB port on your computer.
 - Note: Sony® CLIE™ users can use MS Import or Data Import instead of the memory card reader.*
3. Insert the SmartST CD into your computer CD-ROM drive. The SmartST Desktop installer will start.
 - If your computer does not automatically launch the CD, start the installation manually: *Start > Run*. Type **d:\setupSSP_PALM.exe** where *d* is the letter assigned to your CD-ROM drive. Click **OK**.
4. Follow the screen prompts to install SmartST Desktop.
 - Select your preferred language for SmartST Desktop when prompted.
 - Review and accept the License Agreement when prompted. If you have any queries, contact Navman.
 - Select a destination folder when prompted.
 - Select your Palm User Account when prompted.
 - Perform a HotSync® operation when prompted.
5. SmartST Desktop will open. Follow the prompts to register online and activate SmartST on your handheld.
 - Review and accept the Privacy Notice when prompted.
 - You will be prompted to enter your contact details so Navman can advise you when updates are released.
 - Enter your SmartST Application Key.
 - Your computer will connect to the Internet and activate your SmartST Application Key.

You are now ready to install a map to your handheld.

Additional Information for Tungsten™ T3

SmartST supports the larger resolution display available to users of the Tungsten T3 handheld. Two extra files must be installed to enable full-screen viewing on Tungsten T3:

1. Install SmartST as per the above instructions.
2. Start *Palm Quick Install*.
3. Click **Add** and navigate to the following folder:
C:\Program Files\Navman\Navman SmartST Desktop Version 3 for Palm\T3_Large_Screen_Support
 where **C:** is the drive that SmartST Professional was installed to.
4. Select the following two files by pressing and holding **CTRL** when you click them:
 - **AppSlipRotate.prc**
 - **StatusBarLib.prc**

Warning - You must install these two files at the same time. If both are not installed during the same HotSync® operation (see step 6), it may force a hard reset of your Tungsten T3, causing loss of data.

5. Click **Open**.
The files are now listed in the **Handheld** section of *Palm Quick Install*.
6. Perform a HotSync operation to install the selected files on your Tungsten T3.
7. Follow the handheld screen prompts.

You may now view SmartST in full-screen by tapping . See your Tungsten T3 documentation for more information.



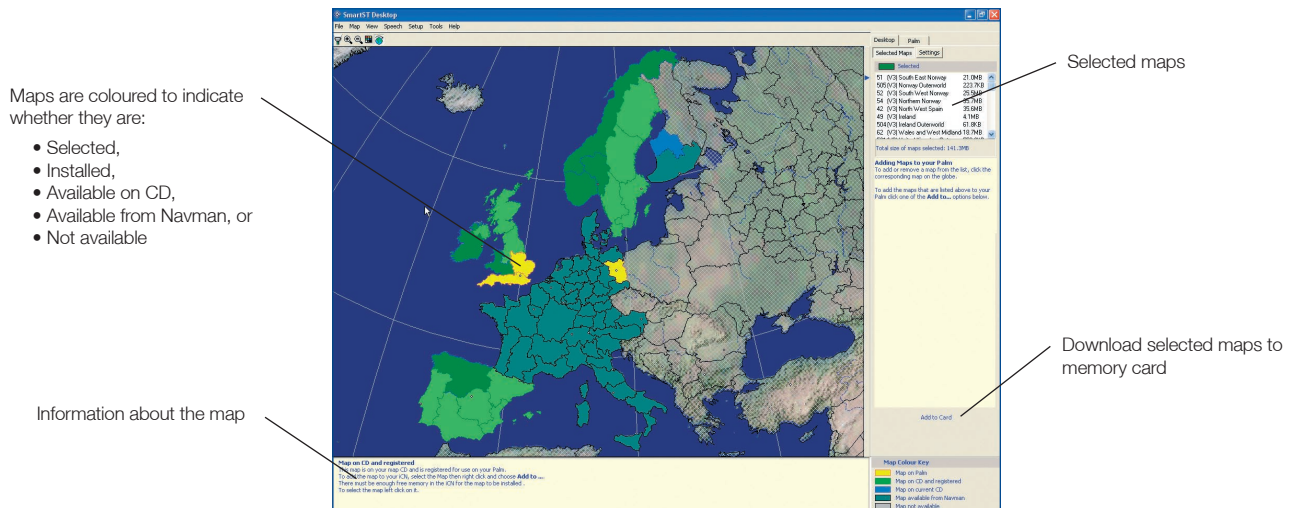
3. SmartST Desktop

SmartST Desktop is used to manage maps to and from your handheld, obtain software updates, manage Custom Points of Interest (POIs) and install Basemaps.

Accessing SmartST Desktop

Once SmartST Desktop has been installed, you can access it from the **Start** menu:

Start > Programs > Navman > SmartST Desktop



Updating SmartST

It is recommended that you regularly check the Navman website for software updates to the version of SmartST you are using:

Note: Only upgrades to the SmartST application are available from the Navman website. Map upgrades must be purchased from your Navman retailer.

1. Open SmartST Desktop: *Start > Programs > Navman > SmartST Desktop*
2. Follow the screen prompts until they finish. The SmartST Desktop will appear.
2. On the **Setup** menu, select **Update software** then **Check for updates on the web**.
Your computer will connect to the Internet and display the Navman website.
3. Download the update for your region to your computer, if available.
4. On the **Setup** menu, select **Update software** then **Update software on handheld**.
Follow the prompts to update SmartST.

4. Installing Maps Using SmartST Desktop

SmartST comes with one Map Product Key that will allow you to install one map. If you require an additional map, you must first purchase an additional Map Product Key from your Navman supplier.

Use SmartST Desktop to activate your Map Product Key and install the required map.

Install and Activate Maps on Your Handheld

1. Insert a memory card in your memory card reader.
2. Connect your handheld to your computer using a USB cable, synchronisation cradle, or other device that came with your handheld.
3. Activate a HotSync® operation between your computer and your handheld.
4. Once the HotSync operation is complete, open SmartST Desktop:
Start > Programs > Navman > SmartST Desktop.
5. Follow the prompts.
 - SmartST Desktop will open.
6. Insert a SmartST Map CD into your computer CD-ROM drive. The available maps will display.
Note: SmartST will support maps from SmartST 1.30 and later.
7. Click the map you want to install to your handheld. Maps are of population areas and not of political areas such as counties or states. You may need to install multiple maps to cover the desired geographical area.
 - If you have already activated a Map Product Key, or your handheld came with a pre-activated Map Product Key, the map will change colour to indicate it has been selected. Go to step 10.
8. Follow the prompts to activate the Map Product Key.
 - Enter your Map Product Key.
 - Your computer will connect to the Internet and activate your Map Product Key.
 - You will be prompted to enter or update your contact details so Navman can advise you when updates are released.
 - Your computer will again connect to the Internet to confirm the activation of your Map Product Key.
9. Click the map to install to your handheld. The map will change colour to indicate it has been selected. The map is listed in the **Selected** section of the **Desktop Selected Maps** tab.
 - If you have another Map Product Key to activate, go to step 7.
10. Click the **Add to Card** button to install all maps listed in the **Selected** section of the **Desktop Selected Maps** tab to your memory card reader.
11. When you have completed map installation, remove the memory card from your memory card reader and insert it into your handheld.

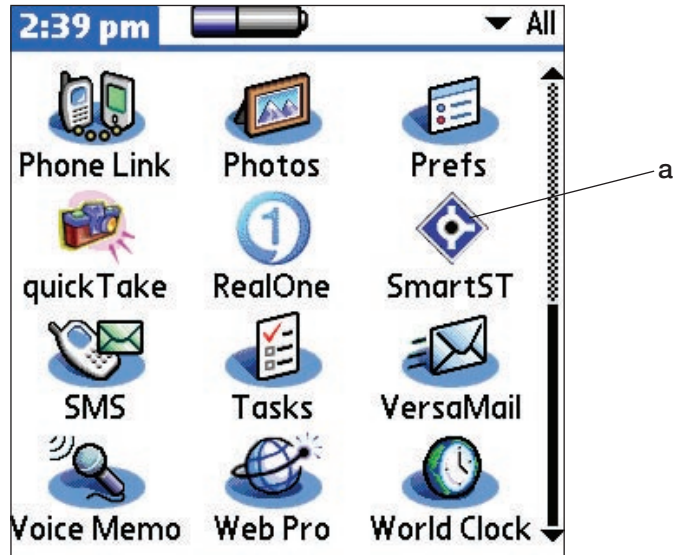
Remove Maps from Your Handheld

1. Insert the memory card into your memory card reader.
2. Open SmartST Desktop: *Start > Programs > Navman > SmartST Desktop.*
3. Open the **Maps on Palm** section: *Palm tab > Maps on Palm.*
4. Click the map to be removed and select **Remove from Palm** from the pop-up menu.

5. Starting SmartST

By now, you have installed SmartST Desktop on your computer, installed SmartST on your handheld, installed any required maps to your memory card and mounted your GPS receiver in your vehicle, if required. You are now ready to start SmartST and establish a connection between your handheld and GPS receiver.

1. On the handheld *Home* screen, tap the **SmartST** icon (a).



2. The *Legal Notice* screen will display. Read the legal notice and tap **I Agree** to confirm that you understand.
 3. The *Tutorial* will display. Tap to move through the screens.
 - To prevent the *Tutorial* from displaying, select the **Show tutorial on startup** checkbox.
 4. The *Main Menu* screen will open.
- You are now ready to obtain a GPS fix.

6. Controlling SmartST

Navigation

Icons display on the *Map*, *3D Map*, *Next Instruction* and *Turn List View* screens for screen navigation. Additionally, on handhelds with a **2-way** or **5-way toggle**, screen navigation may be undertaken using the toggle buttons. See your handheld manual to identify whether your handheld has a toggle.



Icon	Toggle	Description
	Right	Cycles through the navigation screens once a route has been calculated: <ul style="list-style-type: none"> • <i>Map</i> screen • <i>3D Map</i> screen • <i>Next Instruction</i> screen • <i>Turn List View</i> screen
	Left	Opens the <i>Main Menu</i> screen.
	Up	From the <i>Map</i> screen, enables you to zoom in to view less of the street map, but with more detail. From the <i>3D Map</i> screen, with the Information button set to Angle , enables you to increase the viewing angle.
	Down	From the <i>Map</i> screen, enables you to zoom out to view more of the street map, but with less detail. From the <i>3D Map</i> screen, with the Information button set to Angle , enables you to decrease the viewing angle.


Touch-Screen

Use the stylus with the handheld touch-screen to navigate and use the *Main Menu* options, set destination addresses and configure the GPS status. See your handheld manual for information on using the stylus with the touch-screen.

Tap and hold the stylus on the *Map* screen to activate the pop-up *Map* menu. See page 24 for information on the pop-up *Map* menu.

7. Main Menu Screen

The *Main Menu* screen gives you access to all of SmartST's functions, including navigating to a destination.

1. From the *Map* screen, tap  to open the *Main Menu* screen.
2. Tap , to display more *Main Menu* options.



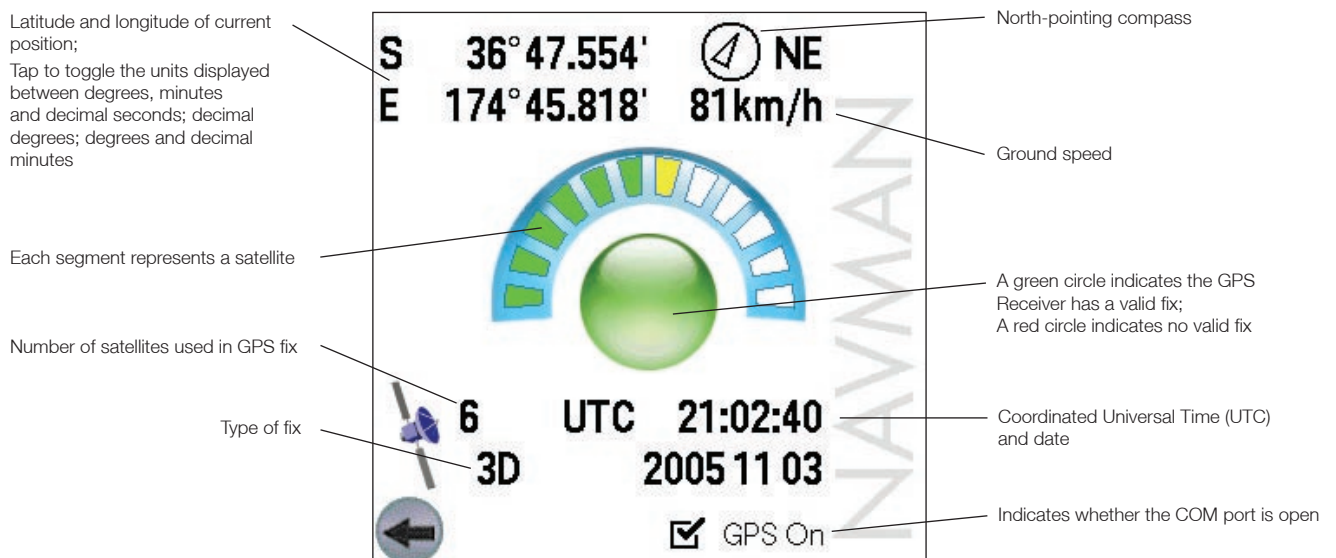
8. GPS Status

Signals are transmitted by Global Positioning System (GPS) satellites orbiting the Earth. This screen provides a visual representation of the information being received. Latitude and longitude are displayed, along with a North-pointing compass, the heading in degrees and ground speed. Satellites available are shown as segments.

From the *Main Menu*, tap **GPS Status**. The *GPS Status* screen will display:




- **Yellow** Segment - a satellite is being tracked but is not being used
- **Red** Segment - a satellite is being used to determine a two-dimensional (2D) position fix.
- **Green** Segment - a satellite is being used to determine a three-dimensional (3D) position fix.

The circle under the satellite segments is green when there is a valid fix (2D or 3D) and red when there is no fix. While a 2D fix is sufficient to maintain a valid fix, a 3D fix is more accurate.





Getting a GPS Fix

For Serial GPS Receivers



1. From the *Main Menu*, tap **Setup**.
2. Tap  in the upper right-hand corner, then select *GPS* from the drop-down box. The *GPS Setup* screen will open.
3. Tap **Serial** in the **Port** section.
4. Refer to the instructions supplied with your GPS receiver to select the **Baud rate**.
5. Tap  to return to the *Main Menu*.
6. Tap , then **GPS Status** to open the *GPS Status* screen.
7. Tap the **GPS On** checkbox to open the COM port. Your handheld will now obtain a GPS fix. A clear view of the sky is required.

For Bluetooth GPS Receivers*

Initialisation

1. From the *Main Menu*, tap **Setup**.
2. Tap  in the upper right-hand corner, then select *GPS* from the drop-down box. The *GPS Setup* screen will open.
3. Tap **Bluetooth** in the **Port** section.
4. To connect the handheld to your GPS receiver, tap **Discover**. The handheld will search for active Bluetooth devices.
5. Select the name of your GPS receiver in the **Device** section and tap **Select**. Your handheld will now obtain a GPS fix. A clear view of the sky is required.
6. Tap  to return to the *Main Menu*.

*Reconnecting**

1. From the *Main Menu*, tap , then **GPS Status** to open the *GPS Status* screen.
2. Ensure that the **GPS On** checkbox is ticked. Your handheld will now obtain a GPS fix. A clear view of the sky is required.
3. Tap  to return to the *Main Menu*.

*To re-establish a lost or closed GPS fix.

GPS Status Messages

The GPS status messages are displayed on the *Map* and *3D Map* screens. These messages provide feedback on the status of the GPS receiver connection.

The following table explains the meaning of these messages and includes suggested actions.

Status Message	Meaning	Suggested Action
Waiting for GPS	A GPS position fix has not yet been established.	Ensure the GPS On checkbox on the <i>GPS Status</i> screen is selected and the GPS receiver has an unobscured view of the sky. If you are in a vehicle with athermic (heat-reflecting) windows, you may require an external GPS antenna (sold separately).
GPS Signal Lost	Your GPS fix has been lost.	Ensure the GPS receiver has an unobscured view of the sky.
No GPS Message	You have a valid GPS position fix and GPS data is being received.	No action required. You can navigate to your destination.

9. Setting your Destination

Before you travel, you must specify a destination for SmartST to plan your route.

Note: Depending on the country of destination, one or more fields may not be available when selecting your destination.

To a Street Address

1. From the *Main Menu*, tap **Destination**, then **Address**. The *Destination Address* screen will open.

2. Select a country from the **Country** drop-down box.
3. Type and select the destination address:
 - To select a post code or zip code, type up to five characters of the post code in the **Post Code** box, or the zip code in the **Zip Code** box. Select the post code or zip code from the list that displays.

Note: When navigating in the United Kingdom, type the post code with spaces, but without the last two letters.
 - To select an area, type the name of a geographical location such as a town, city, state or county in the **Area** box. Select the area from the list that displays.
 - To select a road, type the name of a road in the **Road** box. Select the road from the list that displays.
 - To select a house number, type the house number in the **House No** box. Select the road from the list that displays.
4. Complete one of the following:
 - To calculate and display the route to the address, tap . The *3D Map* screen will open.
 - To display the address without calculating the route, tap . The *Map* screen will open.
 - To add the address as a favourite, tap .
 - To configure routing settings, tap . The *Routing Setup* screen will open.

To the Intersection of Two Streets

1. From the *Main Menu*, tap **Destination**, then **Intersection**. The *Destination Intersection* screen will open.



2. Select a country from the **Country** drop-down box.
3. Type and select the destination address:
 - To select an area, type the name of a geographical location such as a town, city, state or county in the **Area** box. Select the area from the list that displays.
 - Type the name of one of the intersecting roads in the **Int. of** box. Select the road from the list that displays.
 - Tap the **And** box. A list of roads that intersect with the road specified in the **Int. of** box will display. Select a road from the list that displays.
4. Complete one of the following:
 - To calculate and display the route to the intersection, tap . The *3D Map* screen will open.
 - To display the address without calculating the route, tap . The *Map* screen will open.
 - To add the intersection as a favourite, tap .
 - To configure routing settings, tap . The *Routing Setup* screen will open.






To a Point of Interest (POI)

A POI is a named site, feature, landmark or public venue. POIs are stored in **Categories**, such as parks and museums. POIs can be displayed as icons on a map.

Note: You can also navigate to a POI via the pop-up Map menu. See page 24.

1. From the *Main Menu*, tap **Destination**, then **Points of Int.** The *Points of Interest* screen will open.








2. Type and select the POI search criteria:
 - Select a category of POI from the **Category** drop-down box.
 - Select a type of POI from the **Type** drop-down box.
 - Select a country from the **Country** drop-down box.
 - Type the name of a geographical location such as a town, city, state or county in the **Area** box. Select the area from the list that displays.
3. Tap  to open the *Points of Interest Results* screen displaying your search results.
4. Select a POI from the list of search results. Only the first 100 search results will display.
 - If the list is long, begin typing the name of the POI in the **Name** box. The list of POIs will reduce to match your search.
5. Complete one of the following:
 - To calculate and display the route to the POI, tap . The *3D Map* screen will open.
 - To display the address without calculating the route, tap . The *Map* screen will open.
 - To add the POI as a favourite, tap .
 - To view POI information, tap . The *Points of Interest Information* screen will display.

To a Destination Using Palm Contacts

Addresses stored in your Palm Contacts database can be used to set a destination. The contact address must be applicable to an installed map.

1. From the *Main Menu*, tap **Destination**, then **Contacts**. The *Find Contact* screen will open.



2. Type the surname of your contact in the **Surname** box. Select the contact name from the list that displays. The address will automatically appear below.
3. Confirm that the correct details are displayed. Tap .
 - If the details of the contact address are incorrect they will display in red. A correct address from the handheld Contacts file may not precisely match the SmartST database. In this case, tap  to the right of the **Road**, **Area** or **Country** drop-down boxes. A list of options should display. If not, type the address or select from the list that displays.
4. Complete one of the following:
 - To calculate and display the route to the contact address, tap . The *3D Map* screen will open.
 - To display the address without calculating the route, tap . The *Map* screen will open.
 - To configure routing settings, tap . The *Routing Setup* screen will open.

To a Recent Destination

The last 20 routes are stored as recent destinations.

1. From the *Main Menu*, tap **Destination**, then **Recent**. The *Recent Destinations* screen will open.



2. Select a destination from the list.
3. Complete one of the following:
 - To calculate and display the route to the Recent Destination, tap . The *3D Map* screen will open.
 - To display the address without calculating the route, tap . The *Map* screen will open.
 - To configure routing settings, tap . The *Routing Setup* screen will open.

Multiple Destination Points with the Trip Planner







You can use the Trip Planner to set multiple destination points for your trip. SmartST will calculate a route via each of these points in the specified order. Destination points can be added via the *Trip Planner* screen or by selecting **Add to Trip** from the *Map* pop-up menu. A maximum of sixteen destination points may be added to each trip.

Creating a Trip



1. From the *Main Menu*, tap **Trip Planner**. The *Trip Planner* screen will display.



2. Tap to add a destination point. The *Destination* screen will open.



3. Tap **Address**. The *Destination Address* screen will open.
Note: You can also add destination points using Intersections, Points of Interest, Favourites, your Palm Contacts database and recent destinations.
4. Select a country from the **Country** drop-down box.
5. Type and select the destination address:
 - To select a postcode or zip code, type up to five characters of the postcode in the **Postcode** box, or the zip code in the **Zip Code** box. Select the postcode or zip code from the list that displays.
Note: When navigating in the United Kingdom, type the post code with spaces, but without the last two letters.
 - To select an area, type the name of a geographical location such as a town, city, state or county in the **Area** box. Select the area from the list that displays.
 - To select a road, type the name of a road in the **Road** box. Select the road from the list that displays.
 - To select a house number, type the house number in the **House No** box. Select the road from the list that displays.
6. Tap . The destination point is added to your trip. The *Trip Planner* screen will display.
 - To add another destination point, go to step 2.
7. To manage the trip, tap  to the right of the point. The pop-up *Trip Planner Menu* will display.
 - To move a point up, select **Move Up**.
 - To move a point down, select **Move Down**.
 - To delete a point, select **Delete**.
 - To delete all points, select **Clear All**.
 - To skip all prior destination points, select **Skip To**.
8. To save the trip to your handheld or memory card:
 - Tap . The *Trip Name* screen will open.
 - Type a name for the trip in the **Trip Name** box.
 - Tap , then tap . The *Trip Planner* screen will display.
9. Tap . The *3D Map* screen will open. SmartST will calculate and display the trip.

Loading a Trip

1. From the *Main Menu*, tap **Trip Planner**. The *Trip Planner* screen will display.
2. Tap  and select the trip to be loaded from the drop-down box.
3. Tap . The *3D Map* screen will open. SmartST will calculate and display the trip.

Using the Map or 3D Map Screen to Plan a Route

You can plan a route directly from the *Map* or *3D Map* screen using the pop-up *Map* menu. *For more information on the pop-up Map Menu, see page 24.*

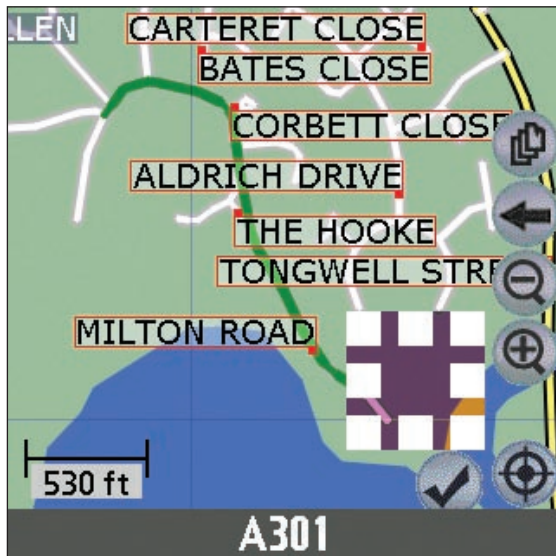
1. From the *Main Menu*, tap **Map**.
2. Scroll the map by dragging the stylus and then lifting it off the map. Repeat until your destination is visible.
 - Zoom in or out of the map as required to locate your destination using  to zoom in and  to zoom out.
3. Tap and hold the road or POI icon that represents your destination. The pop-up *Map* Menu will display.
4. Select **Navigate to** from the pop-up *Map* menu. SmartST will calculate and display the route to your destination.

10. Avoiding an Area

SmartST enables a route to be calculated that avoids a specified area on the map. Up to 10 Avoid Areas can be added. Avoid Areas are displayed as shaded areas.

Adding an Avoid Area

1. From the *Main Menu*, tap **Map**.
2. Tap and hold the area that you want to avoid.
3. Select **Add Avoid Area** from the pop-up *Map* menu. An Avoid Area is displayed.



4. Set the Avoid Area to the correct size and position.
 - To position the Avoid Area, tap and drag it to the area you want to avoid.
 - To size the Avoid Area, tap and drag the sizing boxes to the size required.
5. Tap the below the Avoid Area to enable it.

Deleting an Avoid Area

1. From the *Main Menu*, tap **Map**.
2. Tap and hold the Avoid Area that you want to delete.
3. Select **Delete Avoid Area** from the pop-up *Map* menu. The Avoid area is deleted.

Deleting all Avoid Areas




1. From the *Main Menu*, tap **Map**.
2. Tap and hold the *Map* screen outside of an Avoid Area.
3. Select **Clear Avoid Areas** from the pop-up *Map* menu. All Avoid areas are deleted.

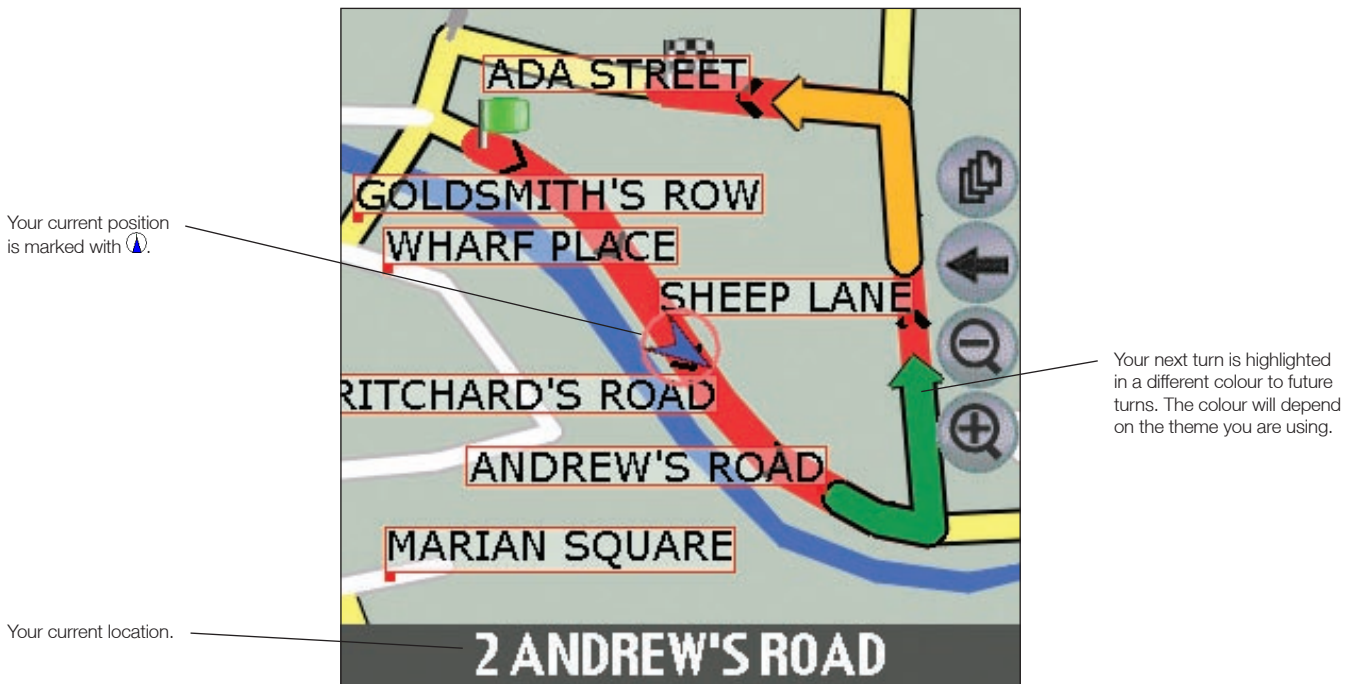
11. Viewing your Route

Once a route has been calculated, there are several ways to view it. Cycle through the screens by tapping .

Map Screen






The *Map* screen is always oriented North, and shows your current position and surrounding street names. If the route has been calculated, the route and all turns are highlighted.

- To view the *Map* screen, either tap  to cycle through the screens until the *Map* screen is displayed, or tap **Map** on the *Main Menu*.
- Zoom in and out by tapping  to zoom in and  to zoom out.
- Navigate around the map by dragging the stylus across the screen.
- Tap and hold to access the *Map* pop-up menu.




3D Map Screen

The *3D Map* screen displays when a route is calculated, oriented to the travelling direction with an adjustable horizon.

- To view the *3D Map* screen, either tap  to cycle through the screens until the *3D Map* screen is displayed, or tap **Map** on the *Main Menu*.
- Zoom in and out by tapping  to zoom in and  to zoom out.
- To change the viewing angle, set the Information button to Angle, then use  to decrease the angle and  to increase the angle, or tap and hold the angle number to the right of the Information button, moving the slider left to decrease the angle and right to increase the angle.
- Tap and hold to access the *Map* pop-up menu.

Direction of next turn.
Tap to hear the next instruction.

Your current position is marked with .

Information Button
Tap to cycle through the following display options:

- Speed
- Time
- Heading (HDG)
- Distance to go to destination (DTG)
- Expected time of arrival at destination (ETA)
- Time to go to destination (TTG)
- Angle




Your next turn is highlighted in a different colour to future turns. The colour will depend on the theme you are using.

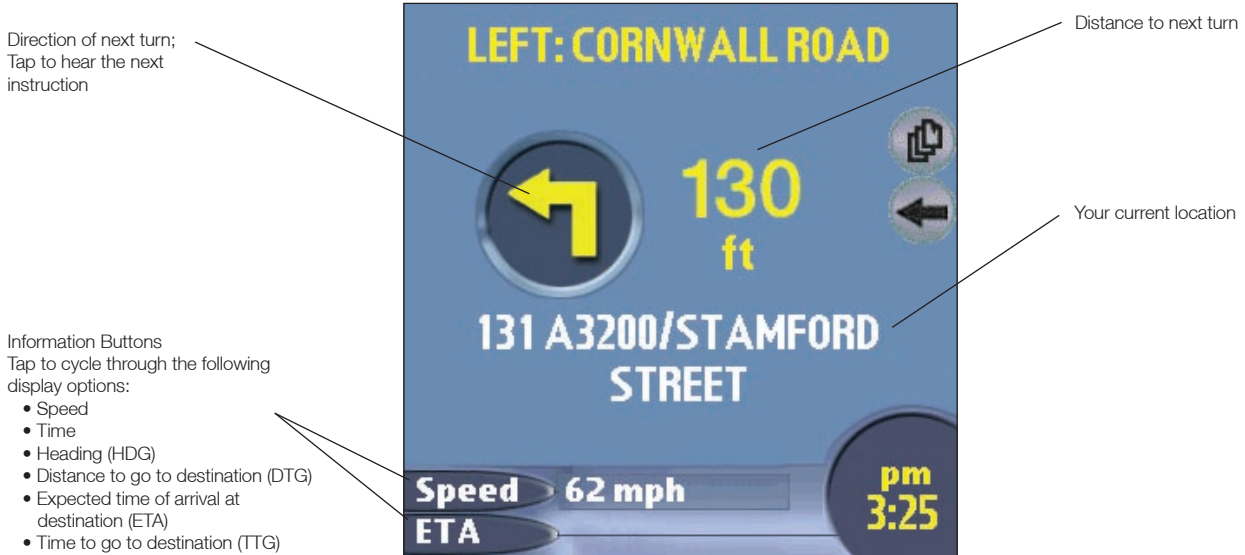
Distance to next turn.

Your current location.

Next Instruction Screen


The *Next Instruction* screen displays information that you need for the next turn, the direction of the turn and the distance to the turn.

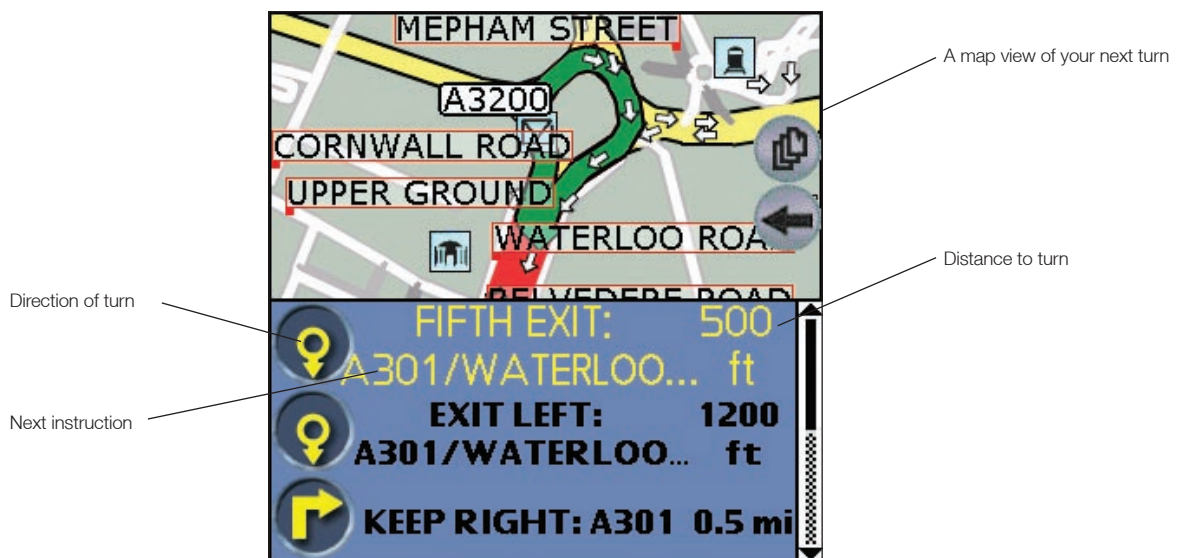
- To view the *Next Instruction* screen, either tap  to cycle through the screens until the *Next Instruction* screen is displayed, or tap **Map** on the *Main Menu*.



Turn List View Screen

The *Turn List View* screen displays a map view of your next turn in the top half of the screen, and a list of the remaining turns to your destination in the bottom half of the screen. Each distance shown in the right-hand column represents the distance from your current location to that turn. The next turn is highlighted.

- To view the *Turn List View* screen, either tap  to cycle through the screens until the *Turn List View* screen is displayed, or tap **Map** on the *Main Menu*.
- Scroll up and down the list of instructions using the scrollbar.



Turn List Screen

The **Turn List** screen displays a list of the remaining turns to your destination with the direction of the turn, the street name and the distance to the turn. Each distance shown in the right-hand column represents the distance from your current location to that turn. The next turn is highlighted.

- To view the *Turn List* screen tap **Turn List** on the *Main Menu*.



Viewing the Route Summary

A summary of the calculated route can be displayed on the *Map* or *3D Map* screen.

The route summary includes:

- Departure street.
- Destination street.
- Distance of route.
- Time to go to destination (TTG).
- Distance to go to destination (DTG).
- Percentage of route completed (measured by distance).

To display the route summary:

1. Tap and hold the *Map* or *3D Map* screen.
2. Select **Route Summary** from the *Map* pop-up menu. The route summary will display.



Viewing the Location Summary

A summary of a location can be displayed on the *Map* or *3D Map* screen.

The location summary includes:

- Name of street, POI, Favourite or Quick Nav
- Description of location.
- Latitude and Longitude of location.

To display the location summary:

1. Tap and hold the *Map* or *3D Map* screen.
2. Select the location name from the top of the *Map* pop-up menu. The location summary will display.



Back-On-Track™ Automatic Rerouting

Your route is recalculated if you make a wrong turn. The **Rerouting** symbol will display on the *3D Map* and *Next Instruction* screens while the route recalculates.



Automatic rerouting is set on the *Route Settings* screen.

12. Map Screen Pop-up Menu

The pop-up *Map* menu is displayed from the *Map* or *3D Map* screens by tapping and holding a point on the screen.

Note: Available options depend



Menu Option	Description
Location	The name of the road, POI, Favourite or Quick Nav. Select to display the location summary.
Set as departure	Sets the selected point as your departure point.
Navigate to	Sets the selected point as your destination point. SmartST will calculate and display the route to your destination.
Add to favourites	Adds the selected point to your Favourites.
Add To Trip	Adds the selected point to your trip as a destination point.
Route Detour	Reroutes your route to avoid the next 1, 2, 5 or 10 kilometres or miles.
Add Avoid Area*	Adds an Avoid Area for you to size and locate.
Delete Avoid Area*	Deletes the selected Avoid Area.
Clear Avoid Areas*	Deletes all Avoid Areas.
Route Summary	Displays the route summary.
Route Demonstrator	Starts the Route Demonstrator, demonstrating navigation from your current position or departure point to your destination.
Cancel Demonstrator	Cancels the Route Demonstrator.
Cancel Route	Cancels current route.
Nearest Points of Interest	Opens the <i>Points of Interest</i> screen. Select the POI to navigate to.

* *Map* screen only.

13. Route Demonstrator

The Route Demonstrator allows you to:

- Preview a route.
- Plan and view a route without a GPS fix, such as when you are inside a building.

Step 1. Select Departure Point

If you have a GPS fix, you do not need to select a departure point unless the demonstrated route is to start elsewhere.

1. Find your departure point by scrolling the map with the stylus.
2. Tap and hold the road or POI icon that represents your location.
3. Select **Set as departure** from the pop-up *Map* menu.

Step 2. Select Destination Point

1. Find your destination point by scrolling the map with the stylus.
2. Tap and hold the road or POI icon that represents your destination.
3. Select **Navigate to** from the pop-up *Map* menu. The *3D Map* screen will display.

Step 3. Activate Route Demonstrator

1. From the *Main Menu*, tap **Map**.
2. Tap and hold the *Map* screen.
3. Select **Route Demonstrator** from the pop-up *Map* menu. The Route Simulator will start your route.
 - If you have selected the *Repeat Route Demonstrator* check box on the *General Setup* screen, the Route Demonstrator will repeat until you stop it.

To Disable Route Demonstrator

1. Tap and hold the *Map* screen.
2. Select **Cancel Demonstrator** from the pop-up *Map* menu.

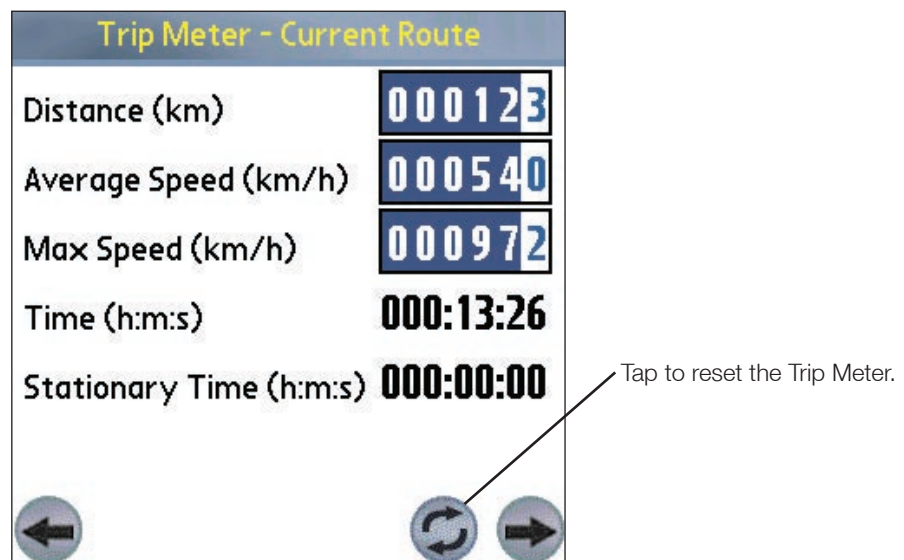
14. Trip Meter

The *Trip Meter - Current Route* screen is used to view the distance travelled, average speed, maximum speed, time taken and stationary time for your current trip.

- From the *Main Menu*, **Trip Meter**. The *Trip Meter - Current Route* screen will open.

The *Trip Meter - Totals* screen is used to view the distance travelled, average speed, maximum speed, time taken and stationary time for all of your trips to date, or since the trip meter was last reset.

- From the *Trip Meter - Current Route* screen, tap . The *Trip Meter - Totals* screen will open. Tap  to redisplay the *Trip Meter - Current Route* screen.




15. Favourites and Quick Navs



Favourites are used to access frequently used destinations without having to re-enter information. Favourites are accessed from the *Favourite List* screen.

You are able to save your three most frequently used Favourites as Quick Navs. Using a Quick Nav is the quickest and easiest way to set your destination. Quick Navs are accessed from the *Quick Nav* screen, or from the pop-up *Map* menu on the *Map* or *3D Map* screens.


Saving a Favourite

- From the *Main Menu*, tap **Destination**, then **Address**.
Note: You can also add an Intersection or POI as a Favourite.
- Select a country from the **Country** drop-down box.
- Type and select the destination address:
 - To select an area, type the name of a geographical location such as a town, city, state or county in the **Area** box. Select the area from the list that displays.
 - To select a road, type the name of a road in the **Road** box. Select the road from the list that displays.
 - To select a house number, type the house number in the **House No** box. Select the number from the list that displays.
- Tap . The favourite is saved with the name of the road.


Converting a Favourite to a Quick Nav

- From the *Main Menu*, tap **Destination**, then **Favourites**.
- Select the Favourite to convert to a Quick Nav.
- Tap . The *Favourite Edit* screen will display.
- In the **Save as** box, select a Quick Nav to save this favourite to.
- Tap  to save the Quick Nav. The *Favourite List* screen will display.

Editing a Favourite or Quick Nav

- From the *Main Menu*, tap **Destination**, then **Favourites**.
- Select the Favourite to edit.
- Tap . The *Favourite Edit* screen will display.








4. In the **Name** box, type a name for the Quick Nav.
5. To change the icon displayed on the *Map* and *3D Map* screen:
 - a. Tap the **Icon** icon. A list of icons will display.
 - b. Tap the icon you want for the Favourite.
6. Tap  to save the Quick Nav. The *Favourite List* screen will display.

Using Quick Navs

1. From the *Main Menu*, tap **Quick Nav**.
2. Tap your previously saved Quick Nav destination. The *3D Map* screen will open. SmartST will calculate and display the route to the Quick Nav.


Using Favourites

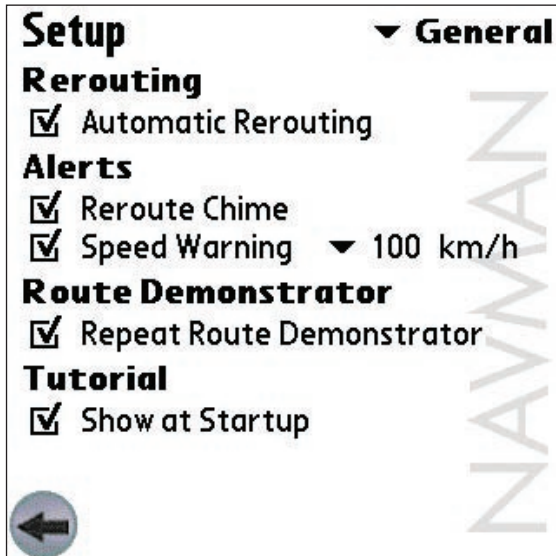
1. From the *Main Menu*, tap **Destination**, then **Favourites**.
2. Select a Favourite from the list.
3. Select one of the following options:
 -  - Displays the *Routing Setup* screen.
 -  - Opens the *Favourite Edit* screen to edit the Favourite.
 -  - Deletes the Favourite.
 -  - Displays the Favourite on the *Map* screen.
 -  - Calculates the route to the Favourite and displays it on the *3D Map* screen.



16. Settings

You can modify the following settings to suit your preferences:

General Settings


1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *General* from the drop-down box. The *General Setup* screen will open.

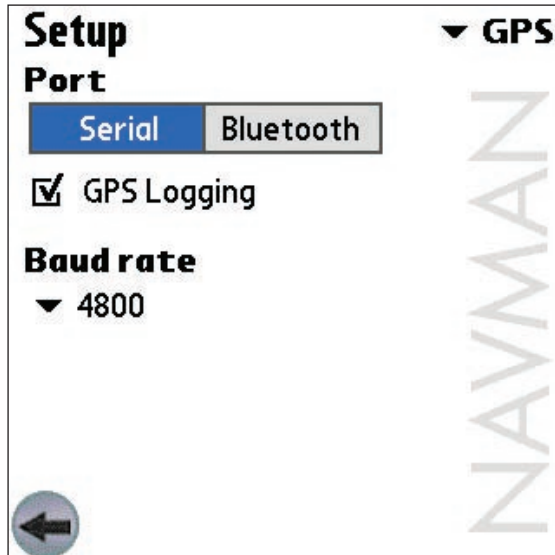



2. Modify the settings as required:
 - To enable the automatic rerouting function when you take a wrong turn, select the **Automatic Rerouting** check box.
 - To enable an audible chime when Back-on-Track™ Automatic Rerouting is activated, select the **Reroute Chime** check box.
 - To enable an audible warning when travelling over a specified speed, select the **Speed Warning** check box. Then tap  and select the speed over which the warning will sound.
 - To enable continuous repetition of the Route Demonstrator, select the **Repeat Route Demonstrator** check box.
 - To show the SmartST tutorial each time you start up SmartST, select the **Show at Startup** check box.
3. Tap  to return to the *Main Menu* screen.

GPS Settings


For Serial GPS Receivers

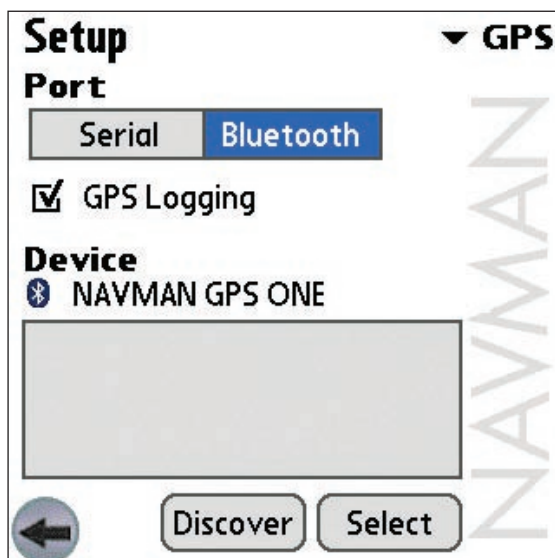
1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display.
2. Tap  in the upper right-hand corner, then select *GPS* from the drop-down box. The *GPS Setup* screen will open.




3. Tap **Serial** in the **Port** section.
4. Refer to the instructions supplied with your GPS receiver to select the **Baud rate**.
5. Tap  to return to the *Main Menu*.


For Bluetooth GPS Receivers

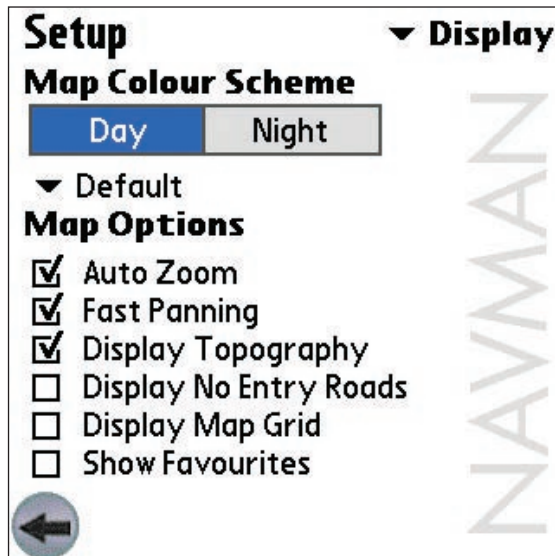
1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display.
2. Tap  in the upper right-hand corner, then select *GPS* from the drop-down box. The *GPS Setup* screen will open.





3. Tap **Bluetooth** in the **Port** section.
4. To connect the handheld to your GPS receiver, tap **Discover**. The handheld will search for active Bluetooth devices.
5. Select the name of your GPS receiver in the **Device** section and tap **Select**. Your handheld will now obtain a GPS fix. A clear view of the sky is required.
6. Tap  to return to the *Main Menu*.


Display Settings

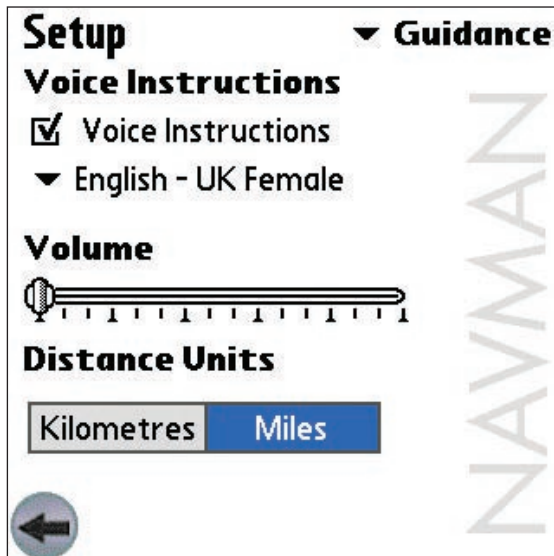
1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *Display* from the drop-down box. The *Display Setup* screen will open.





2. Modify the settings as required:
 - To improve colour contrast in light or dark conditions, select either **Day** or **Night** in the **Map Colour Scheme** section.
 - To change the colour scheme of the *Map* screen, tap  in the **Map Colour Scheme** section and select your preferred colour scheme from the drop-down box .
 - To enable auto-zoom when navigating to your destination, select the **Auto Zoom** check box. If selected, the *Map and 3D Map* screen will automatically zoom in or out depending on your speed to allow optimal view of your route.
 - To enable fast panning, select the **Fast Panning** check box. Fast panning speeds up map panning when viewing or planning a route across a large or high-density map area.
 - To display a topographical map on the *Map* screen, select the **Display Topography** check box.
 - To display No Entry icons on blocked roads on the *Map* screen, select the **Display No Entry Roads** check box.
 - To display grid lines on the *Map* screen, select the **Display Map Grid** check box.
 - To display favourites icons on the *Map* screen, select the **Show Favourites** check box.
3. Tap  to return to the *Main Menu* screen.

Guidance Settings


1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *Guidance* from the drop-down box. The *Guidance Setup* screen will open.





2. Modify the settings as required:
 - To enable voice guidance during navigation, select the **Voice Instructions** check box.
 - To change the voice scheme used for voice guidance during navigation, tap  and select your preferred voice scheme from the drop-down box in the **Voice Instructions** section.
 - To change the units used to measure distance in SmartST, select either **kilometres** or **miles**, in the **Distance Units** section.
3. Tap  to return to the *Main Menu* screen.

Active Map Selection Settings

The *Active Map Selection Settings* screen allows you to specify which of the available maps are to be used. SmartST uses program memory to store map regions, so it is recommended that you only select the map or maps that you currently require.


1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *Maps* from the drop-down box. The *Maps Setup* screen will open.

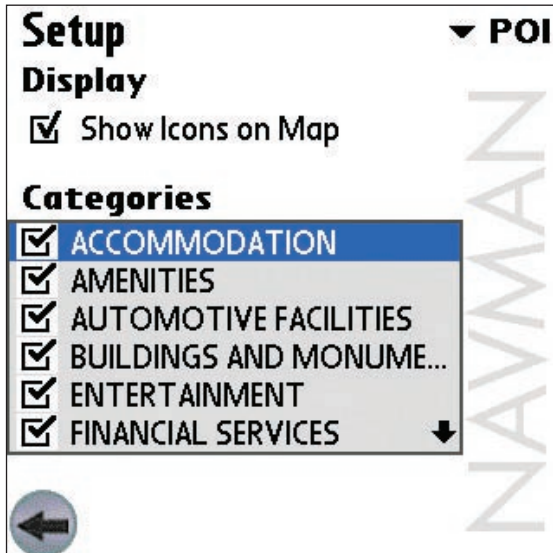



2. Tap  and select a memory location from the drop-down box to display a list of the maps installed in the location.
3. Select or clear the appropriate check boxes until only those maps that you would like to use are selected.
4. Tap  to return to the *Main Menu* screen.

Points of Interest (POI) Settings

Points of Interest (POIs) in a region are grouped into **Categories**. This function allows you to select the categories you need. For example, you may be interested in entertainment venues only, and want to disable other POI categories such as financial services.



1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *POI* from the drop-down box. The *POI Setup* screen will open.




2. To enable POIs to be displayed on the *Map* screen, select the **Show Icons on Map** check box.
3. Select or clear the appropriate check boxes in the **Categories** section until only those POI categories that you would like to display on the *Map* screen are selected.
4. Tap  to return to the *Main Menu* screen.

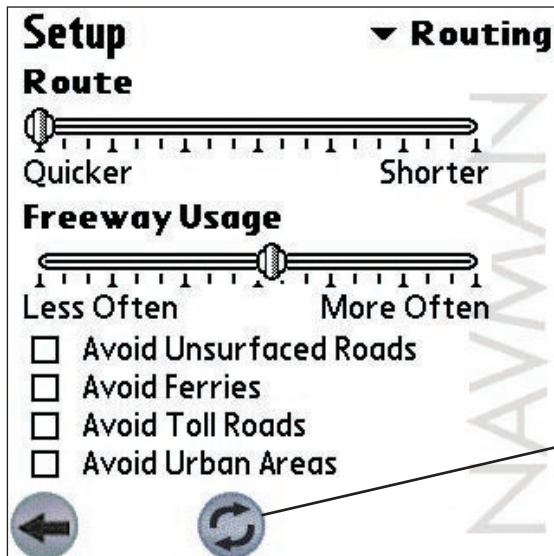
Active Points of Interest (POI) Settings

Active POIs are custom POIs that are announced when in close proximity. Custom POIs are added from the SmartST Desktop POI Editor.

1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *Active POIs* from the drop-down box. The *Active POIs Setup* screen will open.
2. Select the checkbox of the custom POI to be configured from the **Type** list.
3. Modify the settings for the selected POI as required:
 - Select the distance from the POI at which the visual warning should display or the audible chime should be heard, from the **Distance** drop-down box.
 - To enable a visual warning when the POI is in close proximity, select the **Visual Warning** check box.
 - To enable an audible chime when the POI is in close proximity, select the **Sound Warning** check box.
4. Tap  to return to the *Main Menu* screen.

Routing Settings

1. From the *Main Menu*, tap **Setup**. The *Setup* screen will display. Tap  in the upper right-hand corner, then select *Routing* from the drop-down box. The *Routing Setup* screen will open.



2. Modify the settings as required:

- Move the **Route** slider towards **Shorter** for SmartST to give more weighting to the shortest distance when calculating a route. Move the **Route** slider towards **Quicker** for SmartST to give more weighting to the fastest travel time when calculating a route.
- Move the **Freeway Usage** slider towards **Less Often** for SmartST to use freeways less often when calculating a route. Move the **Freeway Usage** slider towards **More Often** for SmartST to use freeways more often when calculating a route.
- To prevent unsurfaced roads from being included in the calculated route, select the **Avoid Unsurfaced Roads** check box.
- To exclude ferries from the calculated route, select the **Avoid Ferries** check box.
- To exclude toll roads from the calculated route, select the **Avoid Toll Roads** check box.
- To exclude urban areas from the calculated route, select the **Avoid Urban Areas** check box.

3. Tap  to return to the *Main Menu* screen.

17. SmartST Desktop Advanced Features

Find a City or Town

To search for a City or Town to verify the map region to be installed:





1. From the **Map** menu, click **Find City**. The **Find City** window will open.
2. Type the name of the City or Town in the **City Name** box. The list of available Cities will reduce to match your search.
3. Double-click the name of the City or Town. The Desktop Map will rotate to centre on the selected City or Town.



Map Colours and Textures

To access the **Desktop Colours** section: *Desktop tab > Settings > Colours*.

Adjust the settings to change the look of the map type.

Colour Settings	Description
	Controls map colours
	Displays the: <ul style="list-style-type: none"> • map border colour • map colour • map border width
	Adjusts the map border width
	Controls the map display: <ul style="list-style-type: none"> • solid colour • no colour • crosshatch texture
<input checked="" type="checkbox"/> Show Globe Texture	Controls geographic features displayed on the map Features are only visible if the map has no colour or crosshatch texture.

Map Layers

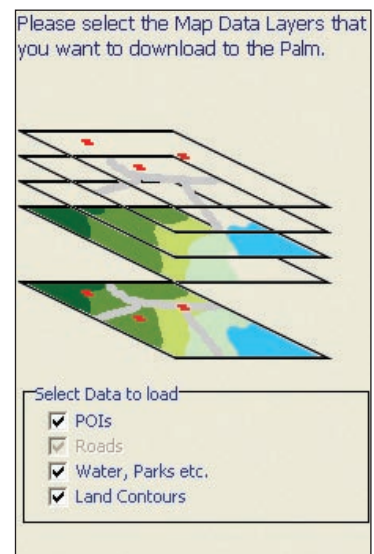
To conserve space on your handheld and memory card, you can choose map layers to install.

The layers you can choose from are:

- Points of Interest (POIs)
- Water, parks
- Land contours.

To access the **Map Layers** section: *Desktop tab > Settings > Layers*.

Select or clear each checkbox to indicate the layers to be installed with each map.



Points of Interest (POI) Editor

You can add custom Points of Interest (POIs) using the POI Editor. Custom POIs can be set to announce when in close proximity at the *Active POI Settings* screen.

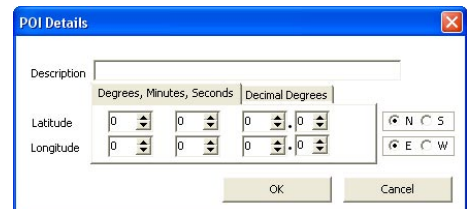
Step 1. Create a Custom POI File

1. Create a New POI File.

- On the **Map** menu, click **POIs**. The **POI Editor** window will open.
- On the **File** menu of the POI Editor, click **New Text File**. The **POI File Name** window will open.
- Type a name for the file in the **File Name** box and click **OK**. The file name can be up to eight characters with no spaces.

2. Add a POI to the POI File.

- On the **Edit** menu, click **New**. The **POI Details** window will open.
- Type a description for the POI in the **Description** box.
- On the **Degrees, Minutes, Seconds** tab, type or select the degree, minute and second of the POI longitude in the **Longitude** boxes.
- On the **Degrees, Minutes, Seconds** tab, type or select the degree, minute and second of the POI latitude in the **Latitude** boxes.



3. Repeat step 2 until all POIs have been added to the POI file.

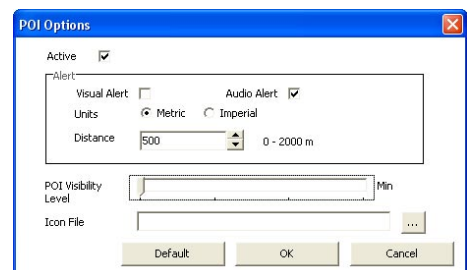
4. On the **File** menu, click **Save**. The POI file is saved.

Step 2. Save Custom POI File to your handheld

1. On the **File** menu, click **Save to Device**. The **POI Options** window will open.

2. Modify the POI settings as required:

- To activate the POI select the **Active** check box. If you do not activate the POI, you will only be able to configure the **Importance** and **Icon File** settings.
- To enable a visual warning when the POI is in close proximity, select the **Visual Alert** check box.
- To enable an audible chime when the POI is in close proximity, select the **Audio Alert** check box.
- To change the units used to measure distance for this POI, select the **Metric** or **Imperial** option.
- Select the distance from the POI at which the visual warning should display or the audible chime is heard, from the **Distance** box.
- Move the **Importance** slider left or right to indicate the priority that the POI has where two or more POIs are in the same locale.
- Type the path to the icon file to be used to represent the POI, in the **Icon File** box, or select the icon file from your local or network drive clicking **...**, locating the file and clicking **Open**. The file must be a bitmap (.BMP) graphic with a minimum of 6x6 pixels and a maximum of 32x32 pixels.



3. Click **OK** and follow the prompts. The POI file is saved to the handheld.

- If you want to change the name of the file, edit the name for the file in the **File Name** box of the **POI File Name** window and click **OK**. The file name can be up to eight characters with no spaces.

Deleting a Custom POI File from your handheld

1. On the **Device** menu, click **Manage POI Files**. The **Manage POI Files** window will open, displaying a list of custom POI files installed on your handheld.
2. Click the **File Name** or **Size** of the POI file to delete.
3. Click **Delete**. The file is removed from the list, but is not yet deleted.
4. If you want to delete more than one file, go to step 2.
5. Click **OK** and accept the changes. The selected file or files are deleted.

18. Continuous Continental Navigation*

You can seamlessly navigate *between* installed maps without the need for installing all maps en route. This is achieved by using a *Basemap*. A Basemap is a map of a large area, such as West Europe or the United States, containing main roads that connect cities and towns. You can select a road or POI on the Basemap as your start point or destination.

Basemaps:

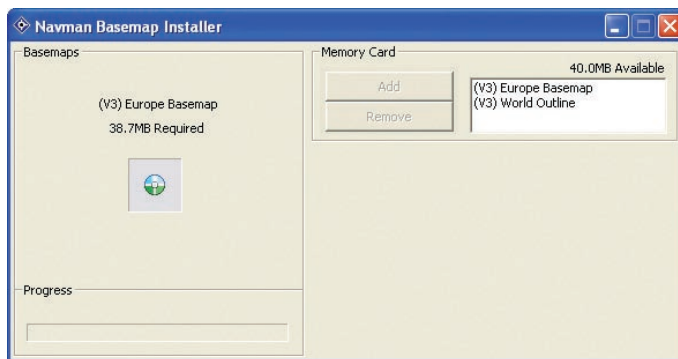
- contain roads and ferry connections of high national and international importance.
- use less memory than would be necessary to install all equivalent detailed maps.
- do not include smaller roads and have a reduced level of geographical detail.

You can add and remove Basemaps using the Basemap Installer.

* Navigating in Australia or New Zealand does not require a Basemap

Install Basemap

1. Connect the handheld to your computer.
 - Connect your handheld to your computer via Microsoft® ActiveSync® 3.5 or higher.
 - Close all open programs on your handheld.
2. Open SmartST Desktop if it is not already open: *Start > Programs > Navman > SmartST Desktop*.
3. On the **Map** menu, click **Basemaps**. The **Basemap Installer** window will open.



4. Select the Basemap to install.
5. Click **Add** to install the Basemap to the memory card reader.

Activate Basemap

1. From the *Main Menu*, tap *Setup*, then the *Maps* tab. The *Active Map Selection Settings* screen will open.
2. Select a memory location from the **Location** drop-down box to display a list of the maps installed in each location.
3. Select the check box of the Basemap you require.
4. Tap **ok** to accept the change and open the *Map* screen.

Remove Basemap

1. Connect the handheld to your computer.
 - Connect your handheld to your computer via Microsoft® ActiveSync® 3.5 or higher.
 - Close all open programs on your handheld.
2. Open SmartST Desktop if it is not already open: *Start > Programs > Navman > SmartST Desktop*.
3. On the **Map** menu, click **Basemaps**. The **Basemap Installer** window will open.
4. Select the Basemap to remove.

19. Improving Performance

Reducing Number of Active Maps

SmartST uses program memory to store maps, so it is recommended that you only specify the map or maps that you currently require. The *Active Map Selection Settings* screen allows you to specify which of the available maps are to be used. See page 32 for more information.

20. Accessories

The following accessories are available for your handheld:

External Antenna

Required for vehicles with heated windshields, and to boost GPS performance in weak signal areas.

Memory Card Reader

Connects to your computer and allows you to download maps to SD or MMC memory cards. Downloading maps to a memory card via a memory card reader can be faster than via your handheld.

Software Product License

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Limited Warranty

IMPORTANT: The following terms and conditions may vary from country to country. Please check with Your Navman dealer from where You purchased the product.

Software Product

Navman warrants that (a) the software will perform substantially in accordance with the accompanying written materials for a period of 90 days from the date of purchase, and (b) any technical support provided by Navman or its approved Service Centres shall make commercially reasonable efforts to solve any problem or issues. Some countries, states and jurisdictions do not allow limitations on duration of an implied warranty, so the above limitation of 90 days may not apply to You.

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Support Information

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www.navman.com

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Bluetooth™ GPS Receiver

4100 / 4420 / 4470

User Manual



NAVMAN

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1. Introduction

Whether you travel in your own country, or overseas, the Bluetooth™ GPS Receiver will provide you with a Global Positioning System (GPS) based location accurate to within 5 m (15 ft) for 95% of the time.

The Bluetooth GPS Receiver contains:

- A GPS antenna to receive signals from the GPS satellites,
- An internal microcomputer to calculate the position of the receiver on Earth, and
- A Bluetooth link to send the GPS position to your PDA within a radius of less than 10 m (33 ft).

When using in a vehicle, the Bluetooth GPS Receiver can be mounted on your dash or back window in a position where it has a clear view of the sky and can receive GPS signals easily.

GPS and GPS Signals

The Global Positioning System (GPS) is a network of satellites that transmit accurate time and position information worldwide. GPS receivers receive signals from these satellites, and use the information to determine their exact location.

GPS satellites orbit the Earth at around 12,000 miles. While a GPS receiver can detect signals from up to 12 satellites at any time, only three are needed to provide a two-dimensional position or “fix” (latitude and longitude) required for vehicle navigation systems. GPS data is available free of charge for any user.

The Bluetooth GPS Receiver will send the GPS position information to your PDA which may then be used by your third-party software to plot your position on a map and direct you to your destination.

Safety Notice

In a vehicle, it is your sole responsibility to place, secure and use the Bluetooth GPS Receiver in a manner that will not cause accidents, personal injury or property damage. It is your sole responsibility to observe safe driving practices and to ensure that the vehicle mount installation instructions are read carefully, understood and used consistently with the laws of operation for each country in which the device is used.

It is your sole responsibility to adhere to the following safety instructions at all times:

- Do not operate the Bluetooth GPS Receiver while driving or place the receiver in a position that obstructs the driver's view
- Do not mount in a way that interferes with airbags or other safety equipment
- Do not leave in view while your vehicle is unattended, especially in strong sunlight
- Do not use or handle the Bluetooth GPS Receiver when it is hot, leave it to cool out of direct sunlight.

Navman disclaim all liability for use of this product in a way that may cause accidents, damage or that may violate law.

2. Bluetooth GPS Receiver Features

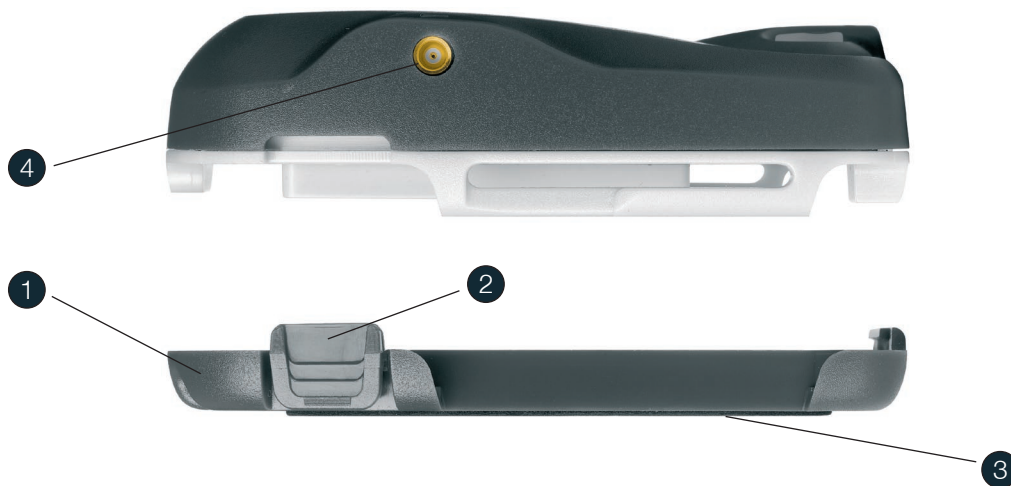
It is recommended that you familiarise yourself with the basic operations of your Bluetooth GPS Receiver:

Top Components



	Component	Description
1	On/Off Button	<p>To turn on: Press for two seconds and release.</p> <p>To turn off: Press for two seconds and release.</p> <p>The Bluetooth GPS receiver will automatically turn off three minutes after the Bluetooth connection is closed or lost.</p>
2	Indicator Light	<p>The indicator light is built into the On/Off button.</p> <p>Off: The Bluetooth GPS Receiver power is off.</p> <p>Single flash every 1.5 seconds: The Bluetooth GPS Receiver is connected to the PDA via Bluetooth.</p> <p>Double flash every 1.5 seconds: The Bluetooth GPS Receiver is not connected to the PDA via Bluetooth.</p> <p>Light is blue: Battery voltage is good.</p> <p>Light is red: Battery voltage is low. Change the batteries.</p>
3	External Power Adapter Socket	<p>If the vehicle power adapter is plugged in, the Bluetooth GPS Receiver will use the external power supply instead of the internal batteries.</p> <p>Note: The external power adapter does not charge the internal batteries.</p>

Side Components



	Component	Description
1	Battery Cover	Forms the base of the Bluetooth GPS Receiver and protects the internal batteries. Remove by squeezing the two side-clips while pulling the cover away from the main unit.
2	Side Clip	Holds the battery cover in place.
3	Non-Slip Pad	Prevents the receiver from slipping when it is not in the receiver cradle.
4	External GPS Antenna MCX Socket	If an external GPS antenna is plugged in, the Bluetooth GPS Receiver will use the external antenna instead of the internal antenna.

Specifications

Property/Item	Description
Size	95 x 62 x 26 mm (3.7 x 2.4 x 1 in)
Weight	223 g (7.9 oz) without batteries
Case	UV stable plastic
Internal Batteries	3 x AAA alkaline supplied
External Power Supply (optional)	5 V DC, centre pin is positive
Operating Temperature	-10 to +60°C (14 to 140°F)
Interface	<ul style="list-style-type: none"> • Bluetooth™ Class 3 • Version 1.1 SPP (Serial Port Profile) • Within 10 m (33 ft) range with no obstruction • NMEA 0183 v.2.20, GPGGA, GPGSA, GPRMC and GPGSV • Baud rate 57600
GPS Antenna	25 x 25 x 4 mm (1 x 1 x 0.2 in) ceramic patch
GPS Receiver	<ul style="list-style-type: none"> • SiRF low power chipset • 12 channel parallel, automatic selection
Time to First GPS Fix	<ul style="list-style-type: none"> • Hot Start - 8 seconds typical • Warm Start - 38 seconds typical • Cold Start - 45 seconds typical

3. Connecting the Bluetooth GPS Receiver to your PDA

To establish a Bluetooth connection between your PDA and the Bluetooth GPS Receiver, complete the following steps:

1. Turn on the Bluetooth GPS Receiver.
 - Press the **On/Off** button for two seconds.
 - The **On/Off** button will flash blue twice every 1.5 seconds to indicate it is not connected to another Bluetooth device.



2. Turn on your PDA.
3. Turn on Bluetooth on your PDA and connect to the Bluetooth GPS Receiver.
 - Ensure that the light on the Bluetooth GPS Receiver is still flashing. The receiver will turn off after three minutes if a Bluetooth connection is not established.
 - Turn on Bluetooth on your PDA and establish a connection with the Bluetooth GPS Receiver by following the documentation supplied with your PDA or Bluetooth card.
 - If you are prompted for a Passkey or Device PIN, use the appropriate Passkey / Device PIN as follows:

Device Name	Passkey / Device PIN
NAVMAN GPS ONE	NAVMAN
NAVMAN BT GPS	1234

- When a connection has been established between your PDA and Bluetooth GPS Receiver, the light on the receiver will change to flash once every 1.5 seconds.
4. **Pocket PC Only** — Determine the Bluetooth COM Port.
 - Identify the outbound COM port used to create a serial port connection between your PDA and the Bluetooth GPS receiver by following the documentation supplied with your PDA or Bluetooth card.
 - Specify the outbound COM port in your third-party software to receive GPS data from the Bluetooth GPS Receiver.
Note: If using Navman™ SmartST™, the COM Port is specified on the GPS Status screen. See the SmartST User Manual for more information.

You are now ready to obtain a GPS fix.

Getting a GPS Fix

The term "GPS fix" is used to describe when your Bluetooth GPS Receiver has enough information from three or more GPS satellites to calculate your position. You can monitor the strength of the GPS signal using your third-party software.
Note: If using Navman SmartST, the GPS status can be monitored on the GPS Status screen. See the SmartST User Manual for more information.

When you turn on your Bluetooth GPS Receiver, it may take several minutes to get the first GPS fix. You can minimise the amount of time this takes by:

- Positioning the Bluetooth GPS Receiver according to the guidelines in Chapter 4.
- Remaining stationary until the Bluetooth GPS Receiver has a GPS fix.

4. Positioning the Bluetooth GPS Receiver in a Vehicle

Use the following guides to choose a suitable position for the Bluetooth GPS Receiver:

- The receiver must have a good view of the sky and horizon.
- The receiver must not obstruct your view, or interfere with the operation of the vehicle or the vehicle safety equipment.
- The receiver must be accessible so that you can operate the **On/Off** button and replace the batteries.
- Avoid placing the receiver near sources of electrical interference or noise.
- Avoid locations subjected to excessive shock or vibration.
- The receiver must be within 10 m (33 ft) of your PDA.
- The receiver is not waterproof — mount it where it will not get wet (including condensation).

Note: If your vehicle is fitted with an athermic (heat reflecting) or a heated windscreen, you may need to purchase a Navman external antenna to allow your Bluetooth GPS Receiver to receive GPS signals inside the vehicle. See page 11.

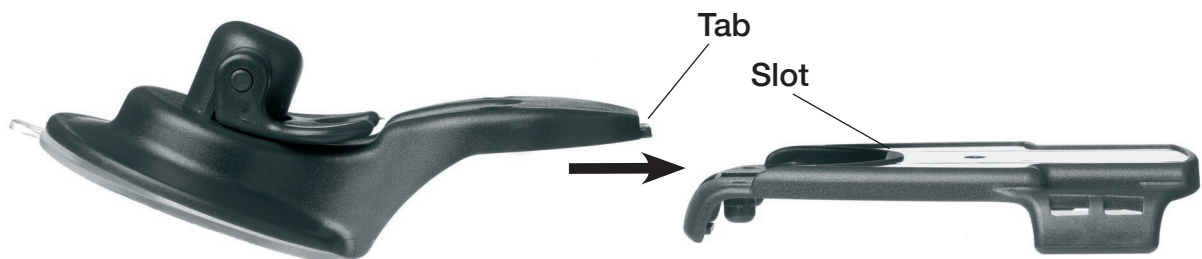
The Bluetooth GPS Receiver and your PDA are mounted separately in your vehicle. Follow these instructions carefully to ensure proper installation. For security purposes and to avoid overheating, do not leave the Bluetooth GPS Receiver or your PDA on the dash or attached to the windscreen while your vehicle is unattended, especially in strong sunlight.

Positioning your Receiver

Option One: Windscreen Suction Mount

You can position the Bluetooth GPS Receiver on the inside of your vehicle windscreen or back window using the receiver windscreen suction mount and receiver cradle:

1. Insert the tab on the receiver windscreen suction mount into the receiver cradle slot.



2. Fasten the receiver cradle to the receiver windscreen suction mount by using the two screws provided.
3. Find a suitable position in your vehicle for the Bluetooth GPS Receiver to be mounted.
4. Use the alcohol swab to thoroughly clean the window area that the suction cup will be mounted to. Do not touch the area after it is cleaned.
5. Do not touch the bare suction cup surface. Press the suction cup firmly to the window, then pull the lever down and away from the window.
6. Slide the Bluetooth GPS Receiver into the receiver cradle.

To remove the receiver windscreen suction mount from the windscreen or back window, press the lever down and toward the window and gently lift the tab on the rim of the suction cup.



Option Two: Mounting Pad on Dashboard (Permanent)

You can attach the Bluetooth GPS Receiver to the dashboard using the receiver cradle and mounting pad:

Warning: This is a permanent solution – the mounting pad cannot be removed once fixed and will mark the dashboard if forcibly removed.

1. Remove one of the backing layers from the receiver mounting pad.
2. Attach the sticky side of the mounting pad to the under-side of the receiver cradle.
3. Find a suitable position in your vehicle for the Bluetooth GPS Receiver to be mounted.
4. Use the alcohol swab to thoroughly clean the area of the dashboard that the cradle will be mounted to. Do not touch the area after it is cleaned.
5. Remove the second backing layer from the mounting pad.
6. Press the cradle firmly to the dashboard for 30 seconds.
7. Slide the Bluetooth GPS Receiver into the receiver cradle.

Positioning your PDA

Option One: Windscreen Suction Mount

You can position your PDA on the inside of your vehicle windscreen using the PDA windscreen suction mount (see figure one) and PDA cradle (see figure two):

1. Attach the PDA cradle to the PDA windscreen suction mount by inserting the four tabs at the end of the suction mount arm into the four slots on the cradle. Ensure that the **Close** arrow on the suction mount is pointed toward the top end of the cradle.
 2. Find a suitable position on your windscreen where the PDA will be clearly visible by the driver.
- Warning: Do not mount your PDA in a way that interferes with airbags or other safety equipment.*
3. Use the alcohol swab to thoroughly clean the window area that the suction cup will be mounted to. Do not touch the area after it is cleaned.
 4. Do not touch the bare suction cup surface. Press the suction cup firmly to the window, then push the lever toward the window.
 5. Place your PDA in the PDA cradle.
 6. Squeeze the side arms of the cradle firmly until they are securely holding your PDA.
 7. Bend the arm of the suction mount so that the PDA will be clearly visible by the driver.

To remove the PDA windscreen suction mount from the windscreen, pull the lever away from the window and gently lift the tab on the rim of the suction cup.



Figure One



Figure Two

Option Two: Mounting Disc on Dashboard (Permanent)

You can position your PDA on the dashboard using the PDA windscreen suction mount (see figure one), PDA cradle (see figure two) and PDA mounting disc (see figure three).

Warning: This is a permanent solution – the mounting disc cannot be removed once fixed and will mark the dashboard if forcibly removed.

1. Attach the PDA cradle to the PDA windscreen suction mount by inserting the four tabs at the end of the suction mount arm in the four slots on the cradle. Ensure that the **Close** arrow on the suction mount is pointed toward the top end of the cradle.
2. Find a suitable position on your dashboard where the PDA will be clearly visible by the driver.

Warning: Do not mount your PDA in a way that interferes with airbags or other safety equipment.

3. Use the alcohol swab to thoroughly clean the area of the dashboard that the disc will be mounted to. Do not touch the area after it is cleaned.
4. Remove the backing from the mounting disc.
5. Press the mounting disc firmly to the dashboard for 30 seconds.
6. Insert the suction cup in the mounting disc, then push the lever down.
7. Place your PDA in the PDA cradle.
8. Squeeze the side arms of the cradle firmly until they are securely holding your PDA.
9. Bend the arm of the suction mount so that the PDA will be clearly visible by the driver.

To remove the PDA windscreen suction mount from the mounting disc, pull the lever up and gently lift the tab on the rim of the suction cup.



Figure Three

Powering the Bluetooth GPS Receiver with the Vehicle Power Adapter

You can use the vehicle power adapter to power the Bluetooth GPS Receiver when in a vehicle. If the vehicle power adapter is plugged in, the receiver will use the external power supply instead of the internal batteries.

1. Plug the smaller end of the vehicle power adapter in to the external power adapter socket on the Bluetooth GPS Receiver.
2. Remove the cigarette lighter from your cigarette lighter socket.
3. Plug the larger end of the vehicle power adapter in your cigarette lighter socket.

5. Batteries

When using the vehicle power-adaptor, you need not remove the batteries. For minimum time to obtain a GPS fix, ensure that the three AAA batteries are always in the Bluetooth GPS Receiver.

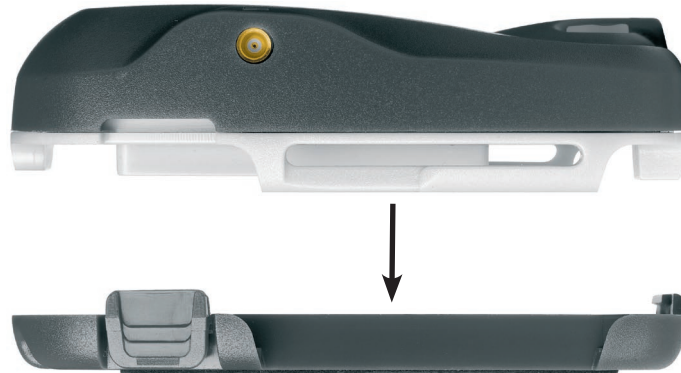
Battery life is up to 30 hours of active use; however, results vary with battery type.

Replacing the Batteries

When the light in the On/Off button turns red, replace the batteries in the Bluetooth GPS Receiver.

To replace the batteries:

1. Remove the battery cover by squeezing the two side-clips while pulling the cover away from the main unit.



2. Remove the old batteries and insert three new AAA dry-cell, rechargeable, or alkaline batteries.
3. Replace the battery cover by inserting the clip in to the bottom slot on the main unit and pressing the side-clips back in the side slots.

6. Optional Accessories

External Antenna

If your vehicle is fitted with an athermic (heat reflecting) or a heated windscreen, GPS signals to the Bluetooth GPS Receiver are greatly reduced or blocked.

An external antenna is available to ensure that sufficient GPS signal is available. The antenna is attached by a magnet to the outside of your vehicle, usually on the roof. The antenna cable is plugged in to the External GPS Antenna MCX Socket. The cable may be threaded through the door opening.

The external antenna is available from your *Navman* retailer.

Warranty Agreement

IMPORTANT: The following terms and conditions may vary from country to country. Please check with Your Navman dealer from where You purchased the product.

Hardware Product: Navman warrants its products to be free from defects in materials or workmanship under normal use for one year from the date of purchase (the Warranty Period) to the original owner (You). To claim under this warranty, You must return the product to the place of purchase, or a service centre approved by Navman (Service Centre). You must produce an original sales receipt as proof of purchase. You will be solely responsible for all shipping charges, freight, insurance and proper packaging to prevent breakage in transit. Navman will, at its discretion, repair or replace any defective product or its components at no cost to You for parts and labour. The replacement product or component takes on the warranty status of the original product or component. This is Your exclusive remedy for defective products.

Limitations: This warranty does not apply to products that have been damaged or rendered defective: (a) as a result of incorrect installation, misuse, mishandling, misapplication, accident, abuse, breakage or other external causes; (b) by operation outside the usage specifications stated in the product documentation; (c) by modification or service other than by Navman or its approved Service Centres.

Limitation of Liability: To the fullest extent permitted by law, Navman will not be liable in any event, whether in tort (including negligence), contract or otherwise for any damage including loss of profits, any consequential, indirect or special damage, loss or injury of any kind suffered by You or any other person. Except as expressly set out in this warranty, Navman makes no other warranties, express or implied, including any implied warranties of merchantability and fitness for a particular purpose. If any limitation or exclusion or liability contained in this warranty is held to be invalid for any reason and Navman becomes liable for loss or damage that would otherwise have been excluded, such liability will be limited to the total amount actually paid by You for the product.

FCC Statement

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a normal installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an output on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced technician for help.
- A shielded cable must be used when connecting a peripheral to the serial ports.

CAUTION: Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

Support Compliance

Operation is subject to the following two conditions: (1) this device may not cause interference, and (2) this device must accept any interference, including interference that may cause undesired operation of the device.

EMC compliance

- CE (Europe): EN301489, 300328-2
- E-mark (Europe): Annex VII and VIII 95/54/EC
- FCC (USA): Part 15 Class B, 15.247, 15.35, 15.209
- C-tick (Australia): AS/NZS 3548
- MIC (Korea): R-LARN-03-0450

Safety compliance

- UL60950, EN60950.
- EN50371 SAR requirements
- FCC SAR guideline

NMEA compliance

- NMEA 0183 Version 2.20
- Communicate at 57,600 Baud

Environmental compliance

- Not waterproof

Support Information

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