SmartCADMap

User Manual

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SmartCADMap

About SmartCADMap

SmartCADMap functions in conjunction with SmartCAD to provide dispatchers with a graphical representation of the data shown within SmartCAD. Dispatchers can see, geographically, where officers are in relation to CAD incidents or markers, making it possible for better-informed decisions regarding who can be dispatched to a given incident. Dispatchers are also able to initiate CAD functions directly from the map, creating incidents or markers that are, then, transmitted to SmartCAD.

Product Version Number

The content in this document refers to SmartCADMap version 9.1.

Prerequisites

SmartCADMap 9.1 requires Microsoft® .NET Framework 4.0 to be installed with all updates.

Support

The CTS America Customer Support Team is available 24 hours a day, 7 days a week. Call toll-free 1-800-374-0101, option 1 for assistance. The Customer Support Team can also be contacted by e-mail for non-critical issues at support@cts-america.com.

Exploring the Interface

SmartCADMap, upon first loading, zooms to the Workstation Extents defined for the workstation in the CAD Configuration module. If the user that this view is not accurate for the area covered, the view can be modified by panning and/or changing the zoom level. The new settings can be saved by entering *MSWE* into the command line of SmartCAD.

The Toolbar

The toolbar in SmartCADMap presents the user with six or seven options:

1) **Refresh Map**: This button, as the name suggests, refreshes the current map view. This can also be accomplished by pressing F5 on the keyboard.
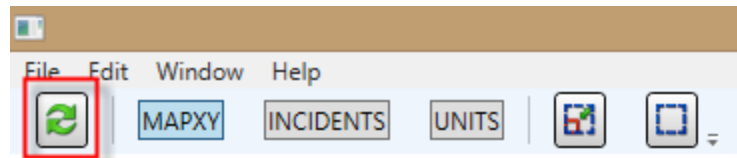

2) **Clear Route**: This button will only appear when there is an active unit route on the map and the Routing Pane to the right of the map. Clicking **CLEAR ROUTE** will clear the existing route from the map and close the Routing Pane.
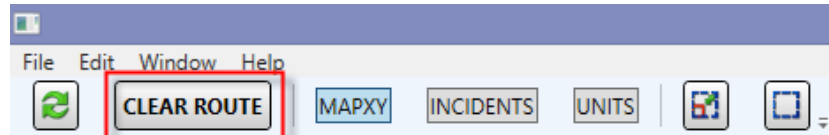
3) **Map XY**: This button shows or hides the latitude and longitude and the bottom left corner of the map. By default, this option is enabled at the time of loading SmartCADMap.

4) **Incidents**: This button shows and hides the incident pane. This list shows only those incidents with valid latitude and longitude information. By default, this is disabled. When active, the list is shown on the right side of the map.

5) **Units**: This button shows and hides the unit pane. This list shows only those units which have not engaged stealth mode in SmartMCT and are transmitting valid AVL information. By default, this is disabled. When active, the list is shown on the right side of the map.

6) **Workstation**: This button sets the map to the configured Workstation Extents. This is the default map view when SmartCADMap loads.
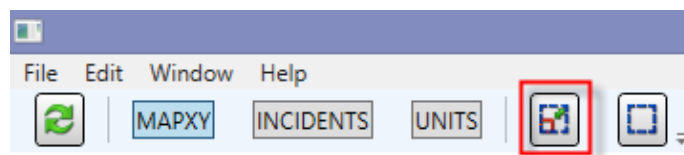
7) **Full**: This button sets the map to the configured full (or global) extents.
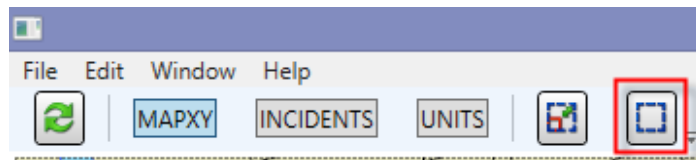
Layout Options (Select Layers)

Clicking on **Select Layers** at the top right corner of the map presents the user with options for layers to view or hide. The check boxes indicate whether or not that layer is active while the sliders indicate the transparency of the layer. By default, all sliders are to the far right, indicating no transparency. Moving the slider to the far left causes the layer to disappear, though it is still active. Any setting in between fades or darkens the layer in question.
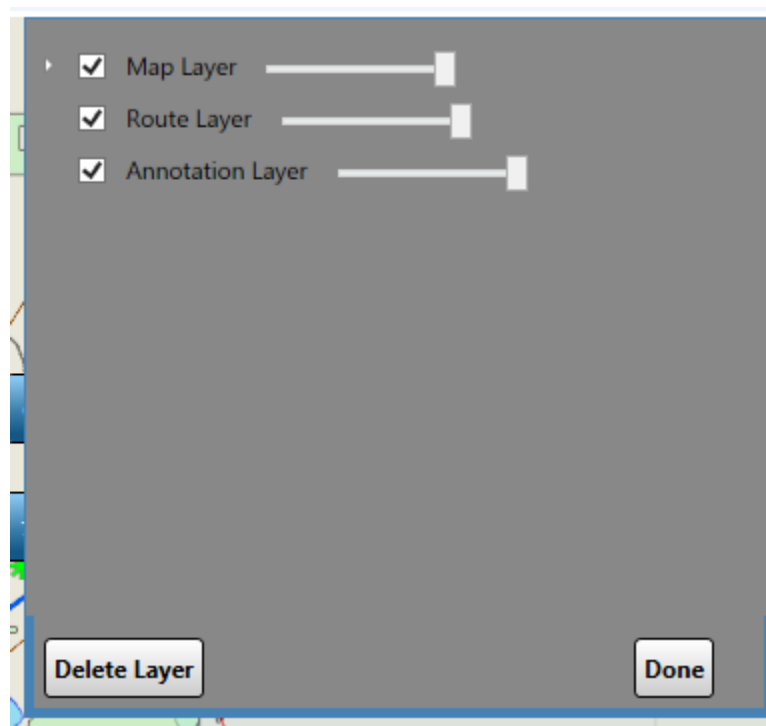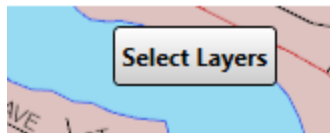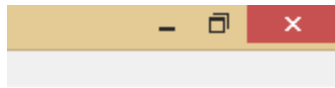
1) **The Map Layer**: This Layer contains the map, itself. Expanding this section gives options regarding what is shown on the map. Options include, bar are not limited to: Cities (small medium, or large), boat ramps, hospitals, state and federal highways, as well as troop or region areas. When active, the selected map information will display. Moving the slider left or right will fade or darken the map, respectively.
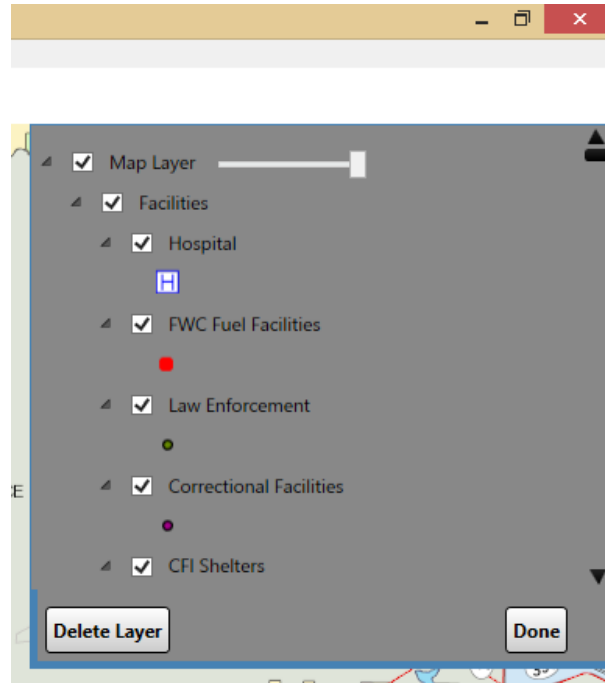
2) **The Route Layer**: When active, the route layer will show any routes currently requested by the user. Moving the slider left or right will fade or darken this information on the map, respectively.

3) **The Annotation Layer**: This layer controls the visibility of CAD calls, units, and markers. When enabled, all CAD information will appear on the map. Moving the slider left or right will fade or darken this information on the map, respectively.
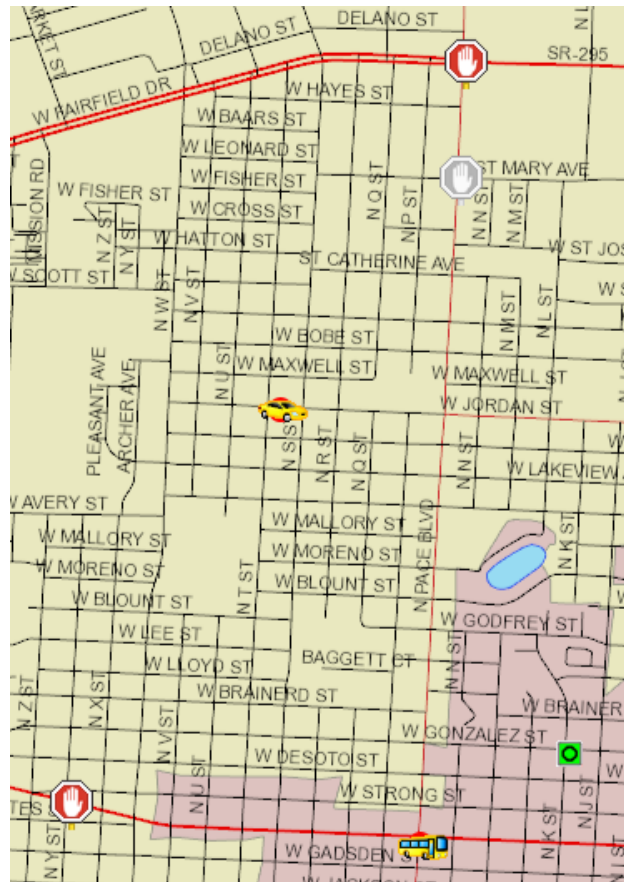
- ✓ The **Select Layers** button is always at the top right of the map, itself. If the Incident, Closest Unit, or Unit panes are active, the **Select Layers** button moves left to compensate.
- ✓ We advise leaving the layout options alone unless it is affecting workflow. However, if these settings do need to be changed, the layout should be saved by going to File>Map Settings>Save or pressing Alt+S. This will save the map settings to the user's Employee Master profile. The settings will, then, follow the user from one workstation or computer to another.
- ✓ Should the settings not load automatically, they can be manually loaded by going to File>Map Settings>Load or pressing Alt+L.

The Incidents Pane

The Incidents Pane shows all CAD incidents that have a valid latitude and longitude values within the area designated by the Workstation and Full Extents as the dispatch area. An incident must be selected to utilize the buttons at the bottom. Clicking **Center on Incident** will center the map on the selected incident. Clicking **Show Incident** will open the incident in SmartCAD.

✓ Centering on an incident can also be accomplished by clicking on Edit, clicking **Center on Incident**, entering the incident number, and clicking **OK**.

✓ If a given CAD incident is not seen on the list in SmartCADMap. Open the incident from within SmartCAD to confirm the address has been validated and has valid latitude and longitude values in the dispatch area. Coordinates of (00, 00) will not display on a map of the continental United States, as that is off the west coast of Africa.

✓ If the SmartCAD window is either hidden or minimized, clicking on **Show Incident** will appear to do nothing. Bring SmartCAD to the front to show the incident window.

The Units Pane

Units			CLOSE
Call Number	Status	Comment	
AA2	10-08	T	▲
676	10-51		
007	10-08		
TWR13	10-06		
002	10-08	T	
OP10	10-08		
009	10-51		
968	10-08	T	
969	10-08	T	
964	10-08	T	
W0080	10-97	X657OD	
013	10-08	T	
150	10-08	T	
W077	10-51		
153	10-06	10	▼
Center On Unit		Show Unit	Follow Unit
			SMAHAFFEY@SUP

The Units pane displays all units in the dispatch area that are transmitting valid latitude and longitude values to SmartCAD. A unit must be selected to utilize the functions provided at the bottom of the pane. Clicking **Center on Unit** will center the map on that unit. Clicking **Show Unit** will open the Last Location window for that unit in SmartCAD. Clicking **Follow Unit** will start following that unit on the map, panning the map as the unit moves.

TIPS

✓ Centering on a unit can also be accomplished by clicking on Edit, clicking on **Center on Unit**, entering the unit number, and clicking **OK**.

✓ Following a Unit can also be accomplished by clicking on Edit, clicking on **Set Follow Vehicle**, entering the unit number, and clicking **OK**.

✓ If a given unit does not appear in the list, check the last location of the unit in SmartCAD (LL [Unit Number]) to confirm the unit is transmitting valid latitude and longitude coordinates within the dispatch area. Coordinates of (00, 00) will not display on a map of the continental United States, as that is off the west coast of Africa.

✓ If the SmartCAD window is hidden or minimized, clicking **Show Unit** will appear to do nothing. Bring SmartCAD to the front to see the Last Location window.

Other Viewing Options in the Menu Bar

In the Window menu are other viewing options that are otherwise not available in SmartCADMap.

1) **Show Incidents**: Enabling this function displays a bubble next to each incident on the map showing the incident description

2) **Show Markers**: Enabling this function displays a bubble next to each marker showing the description of each marker.

3) **Show Stations**: Enabling this option displays a bubble next to each station on the map.

4) **Show Units**: Enabling this option displays a bubble next to each unit showing the unit number.

The Map

The map is the central tool provided by SmartCADMap. Through it, dispatchers are able to see unit locations, incidents and markers, view basic information concerning these items, create incidents and markers, and route units.

Information Bubbles

Clicking on a unit, incident or marker will cause a bubble to pop up providing basic information about the selection. In all cases, clicking on the "i" will open the item in SmartCAD.
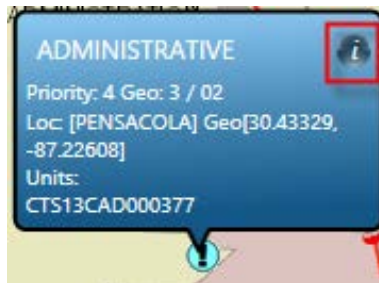
| *Unit* | *Incident* | *Marker* |

Context Menus

There are four context menus in SmartCADMap: Map Menu, Incident Menu, Map Marker Menu, and Unit Menu. These menus provide both CAD and mapping options, making it possible for CAD functions to be initiated quickly and easily from the map. Each of these menus are reached by right-clicking the object in question and provide specialized options thereto.

Map Menu
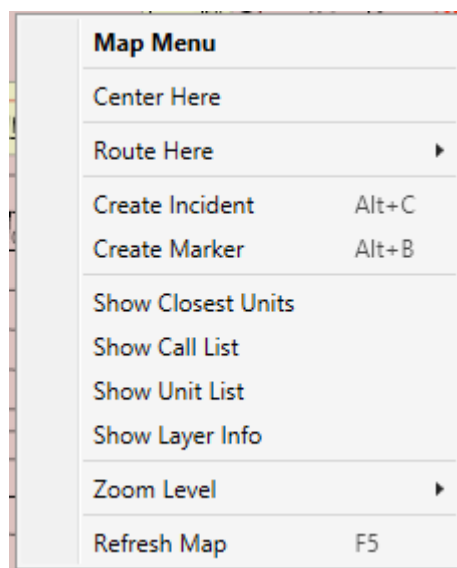
   1) **Center Here**: Right-click on a location on the map and select **Center Here** to center the map on a selected point

2) **Route Here**: Right-click on a location on the map and select **Route Here**, then select a unit number to generate a route from that unit's current location to the selected location.

Map Menu		369
Center Here		23456
Route Here	▶	308
		LAD3
Create Incident	Alt+C	ENG2
Create Marker	Alt+B	765A
Show Closest Units		042
Show Call List		134
Show Unit List		135
Show Layer Info		136
Zoom Level	▶	132
		A1330
Refresh Map	F5	AA2
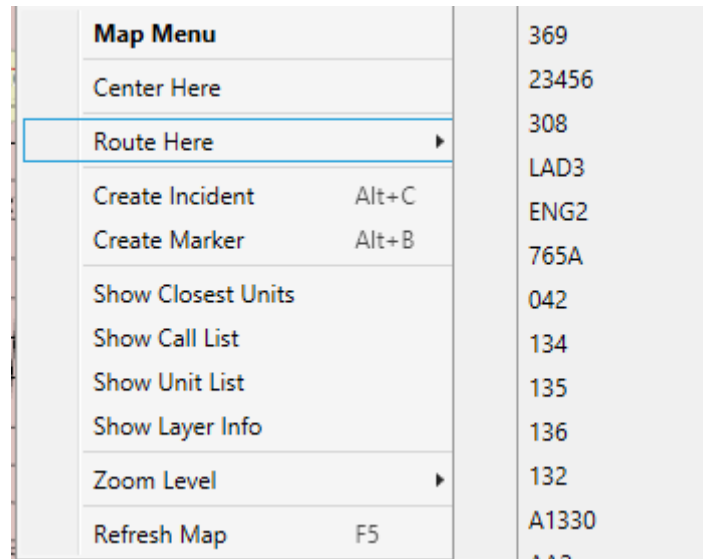
3) **Create Incident**: Right-click on a location on the map and select **Create Incident** to start creating an incident at the selected location. Performing this action will open a new incident in SmartCAD which has the location data pre-populated with the information sent from SmartCADMap. To finish the incident creation, verify the location information, complete the remaining required information, and then ship the call.

4) **Create Marker**: Right-click on a location on the map and select **Create Marker** to start creating a marker on the map. Performing this action will open the Map Marker Edit window in SmartCAD which has the location data pre-populated with the information sent from SmartCADMap. To finish the marker creation, verify the location information, complete the remaining required information, and then click **Save & Close**.

5) **Show Closest Units**: Right-click on a point on the map, an incident, a marker, or a unit and select **Show Closest Units** to get a list of all units nearest to that set map coordinates.

a) During calculation, the current status of the request is shown in the status bar under the map.

Show units closest to coordinates (-87.2202, 30.4345).

b) The list of units is shown in the Closest Units pane after processing is complete. The results are sorted automatically by the Distance column. Unit options are available at the bottom of the pane. If there are no results to display, the Closest Units pane will not appear.

✓ If the Closest Units pane does not appear, ensure that the destination is in the dispatch area. Routes are only available for the agency's jurisdiction.

6) **Show Call List**: Right-click on any point on the map and select **Show Call List** to display the Incidents Pane. Only incidents with valid latitude and longitude values within the dispatch area will display in the list and on the map. This pane can also be accessed by clicking **INCIDENTS** in the toolbar or clicking on the Window menu and selecting **Show Call List**. For more information, please refer to The Incidents Pane on page 6.

7) **Show Unit List**: Right-click on any point on the map and select **Show Unit List** to display the Units Pane. Only units transmitting valid latitude and longitude values within the dispatch area will display in the list and on the map. This pane can also be accessed by clicking **UNITS** in the toolbar or clicking on the Window menu and selecting **Show Unit List**. For more information, please refer to The Units Pane on page 7.

8) **Show Layer Info**: Right-click on any point on the map and select **Show Layer Info** to show the layer information for that point on the map. For example, right-clicking on a random location on "B" Street in Pensacola shows the following results:
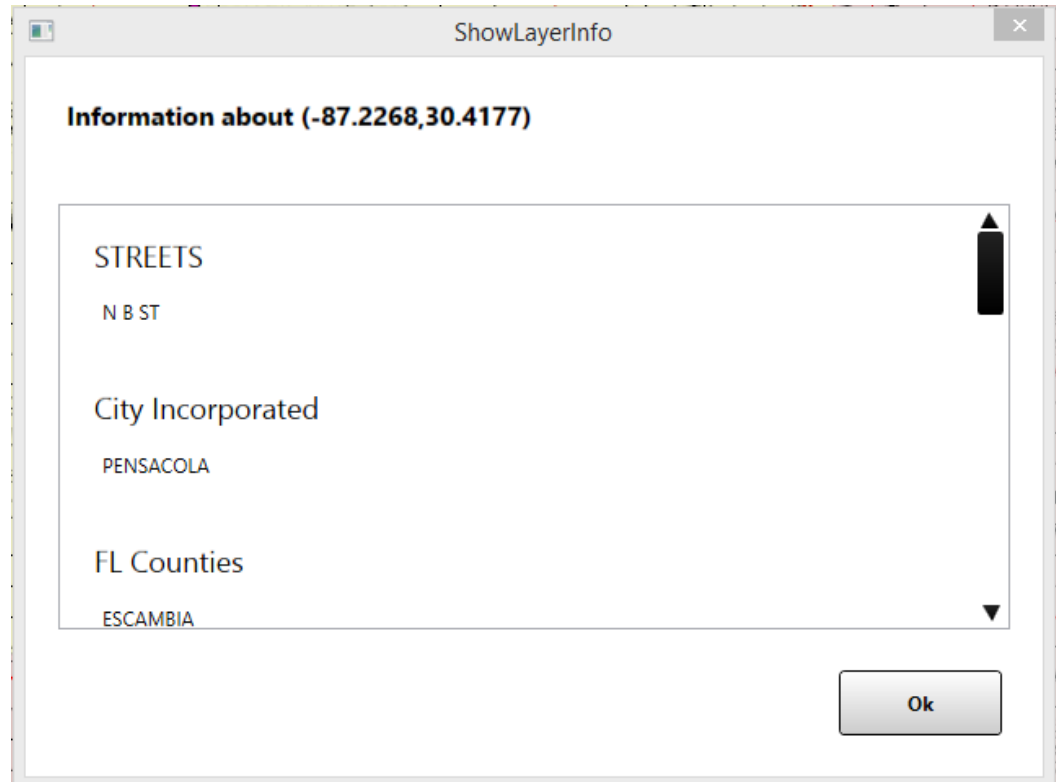
Scrolling through this information reveals all information about that point on the map as configured in the Map Layer. Click OK to exit the Layer Information Window. For further information about the Map Layer, please refer to the Layout Options on page 3.

9) **Zoom Level**: The Zoom Level sub-menu, as the name implies, provides options for changing the zoom level of the map. **Zoom In** and **Zoom Out** modify the zoom level in or out, respectively, one level at a time. **Workstation Extents** and **Full Extents** bring the map in compliance with the Workstation Extents or Global Extents, respectively, as set up in the Workstation Configuration in the CAD Configuration module. The **25%**, **50%**, **75%** options allow zooming in further by the given percentage of the current selected extents (**Full** or **Workstation**).

All of these options are also available by going to the Window menu and selecting the **Zoom Level** sub-menu. Zooming in and out can also be accomplished by scrolling the mouse wheel.
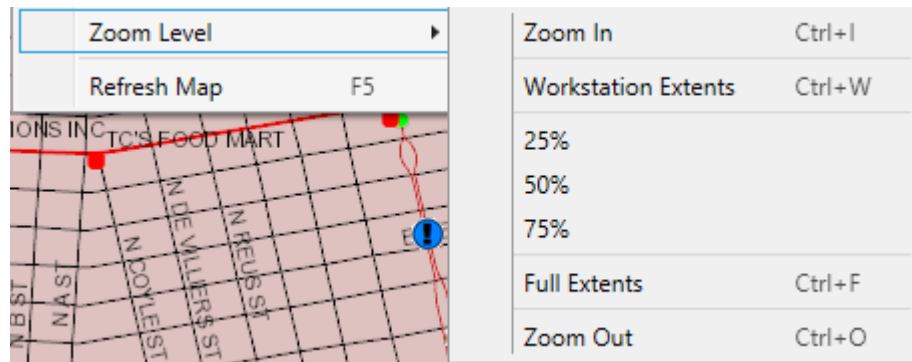
10) **Refresh Map**: This allows the user to manually refresh the map independent of the configured automatic refresh. The action can also be performed by clicking **REFRESH MAP** in the toolbar, clicking on the File menu and selecting **Refresh Map** or pressing **F5**.

Incident Menu

Right-click on an incident displayed on the map to receive options specific to that incident. Clicking on the menu heading (**Incident Menu**) provides a selection of SmartCAD commands specific to incidents as available in the LookUp menu in SmartCAD. Clicking **Incident Details** will bring up the incident in SmartCAD.
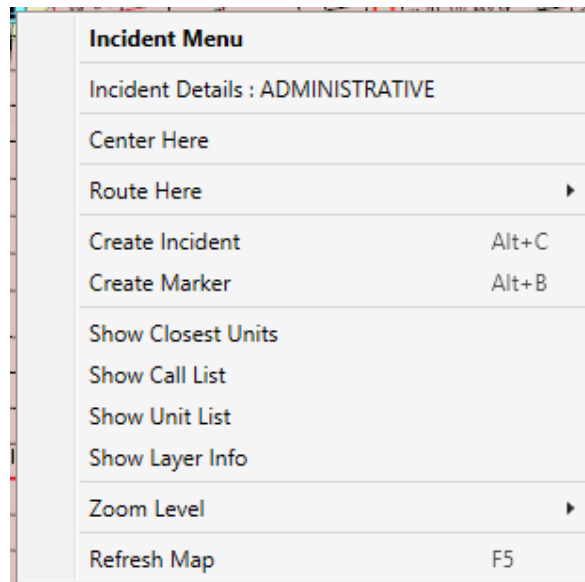
Initial Context Menu
(Right-click on an Incident)
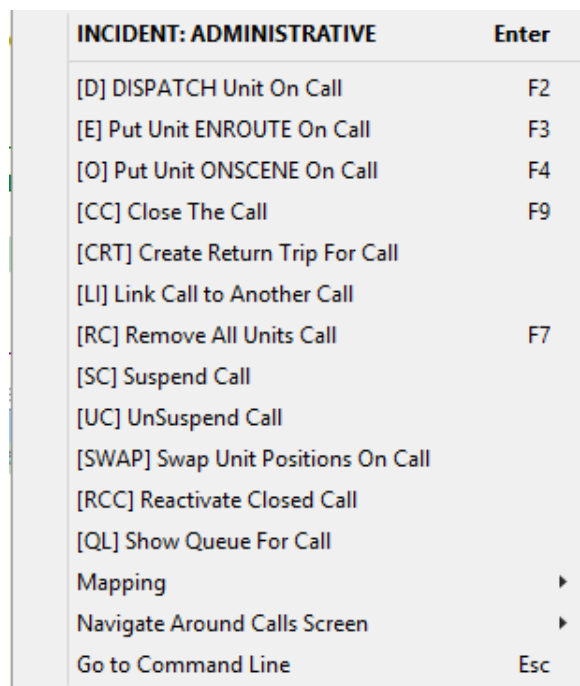
CAD command menu
(Clicking on menu heading)

Map Marker Menu

Right click on a map marker displayed on the map to receive options specific to that marker. Selecting **Marker Details** will open the Map Marker Edit window in SmartCAD.
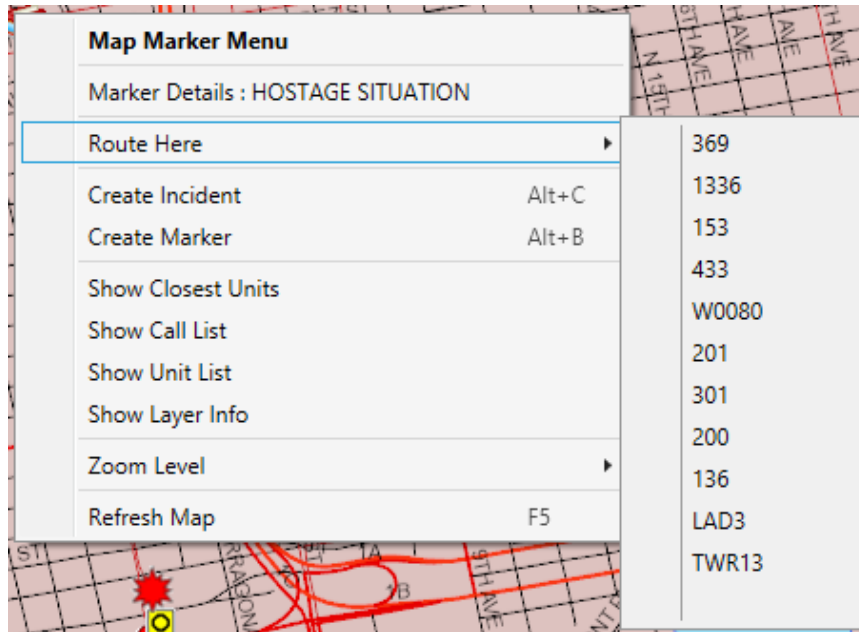
Unit Menu

Right click on a unit displayed on the map to receive options available for that unit. Clicking on the menu heading (**Unit Menu**) provides a selection of SmartCAD commands specific to units as available in the LookUp menu in SmartCAD. Selecting **Unit Details** will open the Last Location window for the selected unit in SmartCAD.

Select the **Route To** sub-menu to route the unit to an existing Incident.
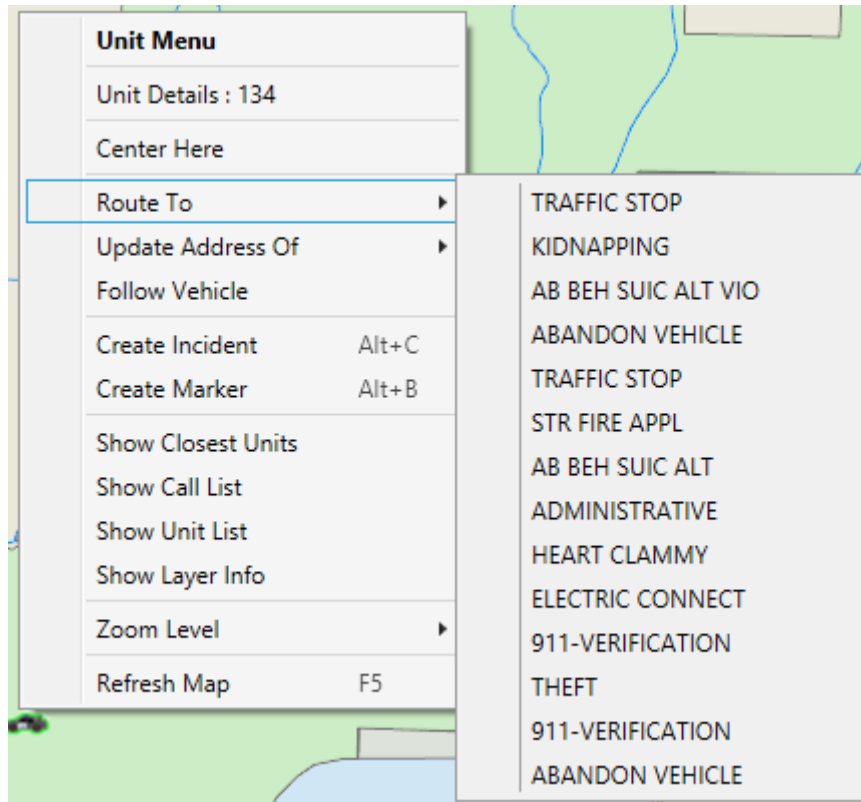
Routing the Unit to an Incident

Select the **Update Address Of** sub-menu to update the location information of a CAD incident to the unit's current location. The unit must be assigned to the address in question.
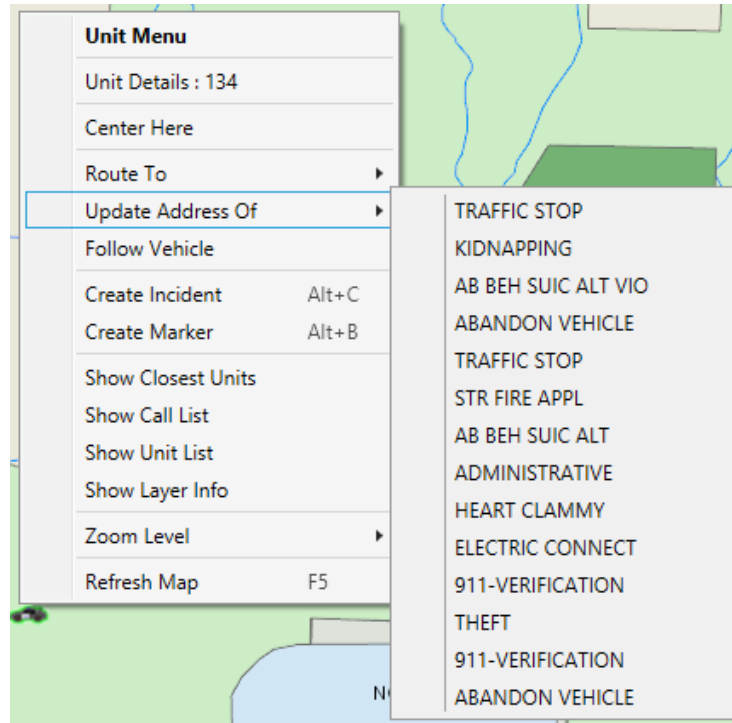
Update Incident Location with the Unit's Location
(Unit must be assigned to the Incident)

Select the **Follow Vehicle** option sets the map to move with the selected vehicle or clears the "follow" request.
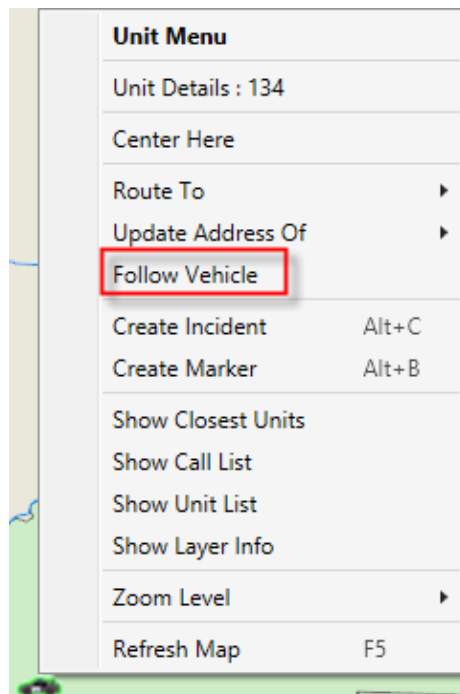
Similar to the Incident Menu, clicking on **Unit Menu** will show the CAD options available for units.

OPTIONS MENU FOR UNIT: 134

[EI] View Unit's Information
[D] DISPATCH Unit On Current Call
[E] Put Unit ENROUTE on Current Call
Put Unit ONSCENE ▶
Queue Unit ▶
Set Unit Transporting Status ▶
Change Unit's ONSCENE Status ▶
Change Unit's AVAILABILITY Status ▶
[RC] RELINQUISH Unit From Call They Are On
Unit Timers ▶
[LL] Display Last Unit Location
[CUA] Change Unit's ASSIGNMENT/COMMENT
Send Message To Unit ▶
Create New Call For Unit ▶
Alarm Location Settings ▶
[CUR] Change Current Unit Role
[CDR] Change Default Unit Role
[ULOG] View Activity Log For Unit
[ATR] Edit Unit's Attributes
[XD] Put Unit Off Duty
[UCA] Update Dispatch Location From AVL
Mapping ▶

Cancel and Close Menu

Common Functions

The tables below show common CAD functions that can be performed either from Map View or from SmartCAD.

To do this,	Press this key	Or use the mouse to click here
Mapping Options from Map View		
Refresh the map	F5	1) Right-click, select **Refresh Map**, or 2) Left-click **REFRESH MAP** in the toolbar
Create an incident at the mouse pointer location on the map	Alt+C	Right-click on the location, select **Create Incident**, finish entry in SmartCAD
Create a marker at the mouse pointer location on the map	Alt+B	Right-click on the location, select **Create Marker**, finish entry in SmartCAD
Show the closest unit to call	*n/a*	Right-click on the incident, select **Show Closest Units**
Show the call list on the map	*n/a*	1) Right-click, select **Show Call List**, or 2) Left-click **INCIDENTS** in the toolbar, or 3) Window>**Show Call List**
Show the unit list on the map	*n/a*	1) Right-click, select **Show Unit List**, or 2) Left click **UNITS** in the toolbar, or 3) Window>**Show Unit List**
Zoom to Full Extents	Ctrl+F	1) Right-click, select **Zoom Level**, select **Full Extents**, or 2) Window>**Zoom Level**>**Full Extents**
Zoom to Workstation Extents	Ctrl+W	1) Right-click, select **Zoom Level**, select **Workstation Extents**, or 2) Window>**Zoom Level**>**Workstation Extents**
Zoom In	Ctrl+I	1) Right-click, select **Zoom Level**, select **Zoom In**, or 2) Window>**Zoom Level**>**Zoom In**, or 3) Left-click on the map, scroll up on the mouse

To do this,	Press this key	Or use the mouse to click here
Mapping Options from Map View		
Zoom Out	Ctrl+O	1) Right-click, select **Zoom Level**, select **Zoom Out**, or 2) Window>**Zoom Level**>**Zoom Out**, or 3) Left-click on the map, scroll down on the mouse
Plot a route on the map (not to an existing incident)	*n/a*	1) Right-click destination, **select Route Here**, select unit, or 2) Alt+Left-Click+Drag unit to destination
Route Unit to Incident	*n/a*	Right-click unit, select **Route To**, select incident
Place Unit on Incident	*n/a*	Alt+Left-click+Drag unit to incident, confirm assignment request, select unit status in SmartCAD
Update Incident location or lat/long with that of the on-scene unit	*n/a*	1) Alt+Left-click+Drag incident to unit's location, confirm update request, select update option in SmartCAD, or 2) Right-click on the unit assigned to the incident, select **Update Address Of**, select assigned incident
Follow a vehicle	Alt+F (prompts for unit number)	1) Right-click vehicle, select **Follow Vehicle**, select **Set Follow Vehicle**, or 2) Edit>**Follow Vehicle**, enter Vehicle number, or 3) With the Units pane active, select a unit, click **Follow Unit**
Clear Follow Vehicle	*n/a*	1) Right-click vehicle, select **Follow Vehicle**, select **Clear Follow Vehicle**, or 2) Edit>**Clear Follow Vehicle**, or 3) With the Units pane active, select the followed unit, click **Follow Unit**

To do this,	Press this key	Or use the mouse to click here
Mapping Options from Map View		
Change followed units	*n/a*	1) Right-click the new unit to be followed, select **Follow Unit**, select **Set Follow Unit**, or 2) With the Units pane active, select the new unit to be followed, click **Follow Unit** Note: In either case, the prior unit follow command will clear automatically.
Change the map configuration settings	*n/a*	Click **Select Layers**, expand Map Layer, select or de-select options
Save the map configuration settings	Alt+S	File>**Map Settings**>**Save**
Load map configuration settings	Alt+L	File>**Map Settings**>**Load**
Reset map configuration to defaults	*n/a*	File>**Map Settings**>**Reset**
Pan Up (North)	Ctrl+U, Ctrl+Up	1) Window>**Pan**>**Up**, or 2) Hold down left-click, drag down
Pan Down (South)	Ctrl+D, Ctrl+Down	1) Window>**Pan**>**Down**, or 2) Hold down left-click, drag up
Pan Left (West)	Ctrl+L, Ctrl+Left	1) Window>**Pan**>**Left**, or 2) Hold down left-click, drag right
Pan Right (East)	Ctrl+R, Ctrl+Right	1) Window>**Pan**>**Right**, or 2) Hold down left-click, drag left
Close context menu	Esc	Click off the menu
Center on Incident	*n/a*	With the Incidents pane enabled, select an incident, click Center On Incident
Center on Unit	*n/a*	With the Units pane enabled, select a unit, click Center On Unit

To do this,	Press this key	Enter this command	Or use the mouse to click here
Mapping Options from CAD View			
Show or hide the map	*n/a*	MAP	Lookup>Mapping>Show/Hide Map
Center the map on current incident	*n/a*	MCI	1) Lookup>Mapping>Center on Incident, or 2) Right-Click Incident, select Mapping, select Center on Incident

To do this,	Press this key	Enter this command	Or use the mouse to click here
Mapping Options from CAD View			
Show the closest hydrants to a call	*n/a*	MHYD	Lookup>Mapping>Show Closest Hydrants
Show the closest units to a call	*n/a*	MSU	Lookup>Mapping>Show Closest Units
Change the Full extents of the map to the current view	*n/a*	MSGE	Lookup>Mapping>Set Global Extents
Return the map to Full extents	*n/a*	MGE	Lookup>Mapping/Show Global Extents
Return the map Workstation extents	*n/a*	MWE	Lookup>Mapping>Show Workstation Extents
Change the Workstation extents to the current view	*n/a*	MSWE	Lookup>Mapping>Set Workstation Extents
Validate address & center on map	*n/a*	MVAL	Lookup>Mapping>Show Address Validation / Center on Map
Pan North on the map	*n/a*	MPN	Lookup>Mapping>Step Pan North
Pan South on the map	*n/a*	MPS	Lookup>Mapping>Step Pan South
Pan East on the map	*n/a*	MPE	Lookup>Mapping>Step Pan East
Pan West on the map	*n/a*	MPW	Lookup>Mapping>Step Pan West
Zoom in on the map	*n/a*	MZI	Lookup>Mapping>Step Zoom In
Zoom out on the map	*n/a*	MZO	Lookup>Mapping>Step Zoom Out
Clear the last route currently displayed	*n/a*	MCR	Lookup>Mapping>Clear Last Route
Center the map on the Unit	*n/a*	MCU	Right-click unit, select Mapping, select Center on Unit
Follow the unit on the map	*n/a*	MFU	Right-click unit, select Mapping, select Follow Unit
Stop following the unit on the map	*n/a*	MSF	Right-click unit, select Mapping, select Stop Following Unit
Route the unit to the selected call	*n/a*	MRU	Right-click unit, select Mapping, select Route Unit to Selected Call
Display the travel and distance of a unit from the selected call	*n/a*	MUD	Right-click, select Mapping, select Get Distance from Selected Incident
Refresh map	F5	MREF	Lookup>Mapping>Refresh Map