

SmartTruckRoute Android

Developer Documentation v3.23

help@smarttruckroute.com

SmartTruckRoute allows developers and fleet managers to easily send (or push) destinations directly to the app from their own apps or simply texting or emailing the points. The different methods available to you for communicating with SmartTruckRoute to accomplish truck specific routing and navigation are outlined below. This document also provides links to sample code. Feel free to contact us if you have any questions.

Pushing Destination to SmartTruckRoute

Android developers and dispatchers can push destination coordinates to the SmartTruckRoute app by following these examples:

1) <u>Address Search</u>: Brings up Address Search View and uses the text after "daddr=" as the search query. https://www.smarttruckroute.com/via/truck?daddr=44+School+Boston+MA or the same using tiny URL.

2) <u>Route using GPS coordinates</u>: Directly routes to the lat/lon after "@" and uses the text after "daddr=" as the destination label.

https://www.smarttruckroute.com/via/truck?daddr=Boston,+MA@42.3581,-71.0636

3) <u>Route using address</u>: Directly routes to the first result in the Google address search results for the string. https://www.smarttruckroute.com/via/truck?daddr=44+School+Street+Boston+MA+02108 or the same using tiny URL.

Note that it is more accurate to search with zip code in case of multiple results with the same street names within the same city.

4) <u>Sending multiple destinations</u>: In the same email include multiple links.

https://www.smarttruckroute.com/via/truck?daddr=https://www.smarttruckroute.com/via/truck?daddr=New+York+NY@40.7127,-74.0059

5) Send multiple destinations within the same link via email or text email

https://www.smarttruckroute.com/via/truck?daddr=LastStop_CompanyStore@42.142378,-71.2087947&vaddr=Stop2_Factory@42.0926 43,-71.055228&vaddr=Stop3+PickParts@41.905831,-71.0526167&vaddr=Stop4_HomeDepot2@42.0083858,-71.1921208 or to make sure you avoid any line breaks in your message send the same message using tiny URL like the one that codes message above bit.ly/2UvOvU4

You can also send an optimized or non optimized route with stops directly from <u>SmartTruckDispatch</u>. Each link sent can be hyperlinked to have a better appearance.

6) Send to route with multiple destinations and with avoids in the same the same link

https://www.smarttruckroute.com/via/truck?daddr=LastStop_CompanyStore@42.142378,-71.2087947&vaddr=Stop2_Factory@42.0926 43,-71.055228&vaddr=Stop3+PickParts@41.905831,-71.0526167&vaddr=Stop4_HomeDepot2@42.0083858,-71.1921208 or to make sure you avoid any line breaks in your message send the same message using tiny URL like the one that codes message above bit.ly/2C1dQix

7) Send to route with different starting location using saddr parameter

https://www.smarttruckroute.com/via/truck?daddr=New+York+NY@40.7127,-74.0059&saddr=FirstStop_CompanyStore@42.2462748,-71.20374346

8) Route requests.

There are two ways to push destination coordinates to the SmartTruckRoute app.

By App to App

"http://smarttruckroute.com/route/{type?params}"

By Web Links

"http://smarttruckroute.com/via/{type?params}"

ex. "https://www.smarttruckroute.com/route/car?daddr=Home@41.12345,-72.12345"

ex2. "https://www.smarttruckroute.com/route/truck?daddr=Warehouse@41.12345,-72.12345&vehConfig =us,162,636,102,80000,0,5,1,1"

ex3.

"https://www.smarttruckroute.com/via/truck?daddr=LastStop_CompanyStore@42.142378,-71.2087947&vaddr=Stop2_Factory@42.092 643,-71.055228&xaddr=Stop3+PickParts@41.905831,-71.0526167&vaddr=Stop4_HomeDepot2@42.0083858,-71.1921208&minimize Tolls=0&vehConfig=us,163,636,102,80000,0,5,1,1"

lat: double value for latitude in the range -90.0 to 90.0

Ion: double value for longitude in the range -180.0 to 180.0

type: "car" or "truck"

Params:

"daddr": Destination address *Always required

ex. "daddr=label@lat,lon"

"vaddr": Optional via address; can have multiple "vaddr" and are processed in the order received

ex. "vaddr=label@lat,lon"

ex2. "vaddr=MyViaLabel1 @41.12345,-71.12345&vaddr=MyViaLabel2@42.12345,-72.12345" "minimizeTolls": Optional toll setting.

"1" is true, routes will avoid tolled roads as much as possible.

"0" or if omitted, routes will use tolled roads as normal.

"vehConfig": Optional vehicle configuration for requested route. Car routes ignore this parameter. For non-car routes, if omitted, existing client settings are used.

ex. "vehConfig=units,height,length,width,weight,hazmat,axles,trailers,5thWheel"

ex2. "vehConfig=us,162,636,102,80000,0,5,1,1"

ex.3. "vehConfig=us,162,636,102,80000,2|4,5,1,1" 2|4 indicates multiple hazmats

ex3. "vehConfig=us,162,636,102,80000|4000|2000,2|4,5,1,1" 2|4 indicates multiple hazmats and multiple trailers 8000 & 4000 & 2000

Units: "us" for inches or pounds or "m" for centimeters or kilograms

Height:Length,Width: Integer value in inches or centimeters depending on units

Weight: Integer value in pounds or kilograms depending on units

Hazmat: Hazardous materials permit class, range 0 to 9 (0 for none)

Axles: Total number of axles, range 2 to 33

Trailers: Total number of trailers, range 0 to 3 (0 for none)

5thWheel: "0" for drawbar towing or none. "1" for kingpin with 5th Wheel coupling

8) Example of sending a route directly from one Android Application or a Web page to SmartTruckRoute with truck parameters and configuration. Code is:

https://www.smarttruckroute.com/via/truck?daddr=Warehouse@42.283695,-71.607620&vehConfig=us,162,636,102,80000,0,5,1,1

9) Example of sending a route directly from one Android Application or a Web page to SmartTruckRoute with intermediate stops Code is

https://www.smarttruckroute.com/via/truck?vaddr=WP1,8900_NW_35th_Ln_Doral_FL33172@25.8072391,-80.3392561&vaddr=WP2,2 425Princess_Anne_Rd_VirginiaBeach_VA23456@36.7522145,-76.054795&daddr=WP3,5681_Kingsport_Dr_Atlanta_GA30342@33.9 096952,-84.383362

or to make sure you avoid any line breaks in your message send the same message using tiny URL like the one that codes message above bit.ly/3hl3xGb\

10) Example with Route Type Configuration "routeType": Optional route type setting for Truck only. Value can be one of the below route types, if omitted or any number not listed will default to Truck Quickest (8).

TRUCK FREEWAY = 7 TRUCK QUICKEST = 8; TRUCK FERRY = 9; TRUCK SHORTEST = 10;

TRUCK AVOID FREEWAY = 24;

https://www.smarttruckroute.com/via/truck?daddr=44+School+Street+Boston+MA+02108&routeType=10

No fractional allowed in VehConfig

No Special Charachters in the string

JOB%23 will appear within SmartTruckRoute as JOB#

Features Available for Developers

- 1. Elements of vehicle tracking are built into IFTA, free of charge.
- 2. Log in code to IFTA Tax Reporting .

3. Retrieve IFTA devices' information and the total miles per state between two dates for an account. IFTA also offers historical data location (based on re-routes) of a vehicle. Select Tracking History from the report. Documentation, Samples.

4. Retrieves multiple IFTA devices' information by Serial ID and the total miles per state between two dates for a device. Documentation.

5. Retrieves multiple IFTA devices' information by Order Id and the total miles per state between two dates for a device. Documentation

- 6. Send messages to our customers by Firebase. Documentation
- 7. To optimize routing you are welcome to take advantage of our SmartTruckDispatch free web service.
- 8. To transfer, re-assign, or reactivate a subscription by URL. Documentation .
- 9. Import TEXT or CSV files into SmartTruckRoute Favorites. Sample CSV file that can be imported into SmartTruckRoute.

10. SmartTruckRoute is supported by NOX Player Android emulator for Windows. See FAQ #9 here <u>https://www.smarttruckroute.com/Android-FAQ2.htm</u> for details on how to implement.

11 Messaging to Android devices to trigger on and off features.

12. For special characters use <u>RFC 3986 - Uniform Resource Identifier (URI): Generic Syntax (ietf.org)</u>

Ex https://www.smarttruckroute.com/reset?PREFS_MAP_OPTIONS_SATELLITE,PREFS_MAP_OPTIONS_TERRAIN

Send message to Android device. Ask client to click on it and then restart SmartTruckRoute app

Additional Sample Code:

Java code to call SmartTruckRoute and parameters that can be embedded.

SmartTruckRoute Route Protocol

https://www.smarttruckroute.com/docs/ver2-SmartTruckRouteApi.zip

<u>Start / Check / Awake SmartTruckRoute with Destination with sample program and code for the sample APK called</u> <u>IsSTR2Runningwaddresss.apk</u>

Licensing & Source Code:

Licensing is available at the SmartTruckRoute webstore.

Source code and/or customization can be purchased separately by contacting TeleType Company.

Developer Support:

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