Mapping Enabled Winlink Forms Winlink for Emergency Communication

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Developed by The Winlink Development Team



Situation Reports and Other Mapping Enabled Forms

- Timely situation reports, weather reports, and other status reports are essential for incident management.
- Often reports come from no-Internet locations.
- Winlink supports a number of forms that provide position reports for mapping and data for CSV spreadsheet files.
- When received at the incident management center, Winlink Express can display a map showing status markers for reports, and it can generate a .csv spreadsheet data file with information from reports.

Sending a SPOTREP-2 Report

- Start composing a new message
- Click "Select Template"
- Select SHARES Spotrep-2.txt from the SHARES group.

| 1000 | | | | | | | | | | |
|------------|------------------|---------------------------------------|---------------------|---------------------|----------------|----|--|--|--|--|
| SE Ente | er a new message | 🛃 Temp | late Man | ager | | | | | | |
| Close | Select Template | Select | Close | Add | Remove | E | | | | |
| From: | NCS398 | ⊡ Standa | ard Templa | ates (vers | sion 1.0.170.(| 0) | | | | |
| To: | | ± A ⊕ AF | C Forms | mation | | | | | | |
| Cc: | | ⊡ C/ | STATE F | oms | | | | | | |
| Subject | : | E E C/ | ANADIAN RM Medic | Forms al Assista | ance | | | | | |
| Attach | | | MA Forms | | | | | | | |
| - Allacin. | | | | | | | | | | |
| | | ⊞∘Gl | ENERAL F | oms | | | | | | |
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| | | HI → HI | STATE to | ms | | | | | | |
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| | | | DIOGRA | M & RRI | Forms | | | | | |
| | | ⊟- Sł | ARES Fo | ms | | | | | | |
| | | | - SHARES | 6 Messag | ge Form2.txt | | | | | |
| | | | SHARE | S Radio I | nterference.t | xt | | | | |
| | | | SHARES | S Spotrep | o-2.txt | | | | | |

SPOTREP-2 Form

| RECEDENCE: (R) - Routine | DATE/TIME: 2021-11-12 17:32:49Z | TASK # |
|---|---|--------------------------------|
| ROM: NCS398 | | |
| 0: | | |
| | | |
| NFO (CC): | | |
| Call signs or E-mails entere | ed into the TO or INFO fields above, can be multiples separated by | a semicolon ; |
| . City/State/Territory: | | |
| LAtitude and longitude: LAT 36.0077 LAT and LON are required to map this | LON -86.7667 . MGRS Ex:11SNR01841952 SpotRep. If entering manually use Decimal Degree format or from a | 204 an attached GPS device. |
| . LandLines functioning? | ○ YES ○ NO | |
| Comments | | |
| 4. Cell Phones functioning? | 🔿 YES 🔿 NO 🖲 Unknown - N/A | |
| Comments | | |
| 5.AM/FM Broadcast Stations functioning? | 🔿 YES 🔿 NO 🖲 Unknown - N/A | |
| Comments | | |
| 6. TV Stations functioning? | 🔿 YES 🔿 NO 🖲 Unknown - N/A | |
| Comments | | |
| 7. Public Water Works functioning? | 🔿 YES 🔿 NO 🖲 Unknown - N/A | |
| Comments | | |
| 8. Commercial Power functioning? | 🔿 YES 🔿 NO 🖲 Unknown - N/A | |
| Comments | | |
| 9. Internet functioning? | 🔿 YES 🔿 NO 🖲 Unknown - N/A | |
| Comments | | |
| 40 Additional Commenter Priof ourse | nu of aurrent aituation - avacated autore times, major abo | convotional ata |
| In Additional Comments Brief Summa | ry of current situation - expected outage times, major obs | |
| | | |
| | | |

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Submitting the Report

- Enter one or more recipient addresses in the TO field. Separate recipients by comma or semicolon. You can specify both Winlink callsigns and e-mail addresses, but only Winlink Express can process reports.
- Enter latitude and longitude. If you have a GPS dongle, it will be entered automatically. Otherwise, it will default to the grid square position.
- Click Yes/No/Unknown buttons for each resource, and add any comments.
- Click Submit at the bottom of the form.
- This will generate a message ready to be posted to the Outbox.

SPOTREP-2 Message Ready to Send

| 8 | Ente | er a new message | | | | | | _ | | × |
|---|---|------------------|--------|----------|-----------------|----------------|-------------------|---------|-------------|---|
| C | lose | Select Template | Sitrep | SitRep | Attachments | Post to Outbox | Spell Check | Save in | Drafts | |
| | From: | NCS398 | \sim | Send as: | Winlink Message | ✓ Req | uest message rece | eipt Se | et Defaults | |
| | To: | NNA4TN | | | | | | | | |
| | Cc: | | | | | | | | | |
| | Subject: | //WL2K R/ SF | OTRE | P 2021-1 | 1-12 17:40:53Z | | | | | |
| | Attach: | RMS_Expres | s_Forr | n_Shares | _Spotrep-2_Vie | ewer.xml; | | | | |
| PR | ECED | ENCE: R | | | | | | | | ^ |
| TA FR TO INF BT | DATE/TIME Group: 2021-11-12 17:40:532 TASK# 1 FROM: NCS398 TO: NNA4TN INFO (CC): BT | | | | | | | | | |
| su | SUBJ SPOTREP 2021-11-12 17:40:53Z | | | | | | | | | |
| 1. C 2. L 3. L 4. C 5. A 6. T 7. F 8. C 9. II | 1. City/State/Territory: Brentwood, TN 2. Latitude :36.0077 Longitude:-86.7667 MGRS: 3. LandLines functioning? [NO] 4. Cell Phones functioning? [YES] 5. AM/FM Broadcast Stations functioning? [] 6. TV Stations functioning? [] 7. Public Water Works functioning? [YES] 8. Commercial Power functioning? [NO] 9. Internet functioning? [NO] | | | | | | | | | |

Reception of Reports

- When a message with an attached form data report is received by someone running Winlink Express, the information from the report is extracted from the message automatically and stored in a database.
- Messages do not need to be selected or displayed for the data to be added to the database; it's done on download.

Showing Maps and Creating csv Files



SPOTREP-2 Map

• Click a marker for information about the report.



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Click "Set Filters" to Filter Map Markers

Map Filters for SPOTREP-2

Select only recent reports

Display reports no more than this many hours old: 24

Filter Map by Field Values

Form reports are displayed if any of the field values match the selection value. If the Mark Red box is checked, markers will be red if the specified value matches.

Enable map filtering

| | Form field | Selection Value | Mark Red |
|-------------------|---------------------------------------|-----------------|----------|
| | AM/FM Broadcast Stations functioning? | (Ignore) ~ | |
| Select which | Phones functioning? | (Ignore) ~ | |
| reports are to be | Commercial Power functioning? | NO ~ | |
| displayed | Internet functioning? | NO | |
| | LandLines functioning? | (long) ~ | |
| | Precedence | (Ignore) ~ | |
| | works functioning? | (Ignore) ~ | |
| Mark selected | TV Stations functioning? | (Ignore) ~ | |
| outages in red | | | |
| | | | |
| | Clear all selections | | |
| | | | |

You Can Select Different Types of Maps

| 🗱 Maps and | CSV Files for Forms |
|---------------|---|
| | |
| Select form: | SPOTREP-2 ~ |
| Number of st | ored reports: 10 |
| Map provider: | Bing ~ |
| Form Repor | ArcGIC Imagry ArcGIS Physical ArcGIS Shaded Relief ArcGIS Streets |
| Delete rep | ArcGIS Terrain ArcGIS Topo |
| Delete | Bing Bing Hybrid Bing Satellite |
| Delete | Google Google Hybrid Google Satellite |
| Displa | Google Terrain Open Cycle Open Cycle Transport Open Street Map Wiki Map |
| | (Simple map for no Internet) |

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Simple map if no Internet and no cached map

Spreadsheet Report Data

- Export reports to a csv file and import them into a spreadsheet program.
- You can generate custom reports or use report positions for your own mapping.

| E | 3 🥰 🕯 | 5 ~ d | • - 🗲 | ÷ | | | | | Sit | trepPhil.csv - Excel | | | | Phil Sherro | d PS | 1 1 | |
|-----|----------|--------------|-------------------|---------------|----------------|-------|--------------|-----------------|----------------|----------------------|--------------------------|-------------------------|---------------|----------------------------------|----------------------------|------------------------------|----------|
| Fil | le Ho | me | Insert | Page l | Layout Form | ulas | Data | Review | View | Help Q Te | ell me what you v | vant to do | | | | | 년 Sh |
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| Cli | pboard | 2 | | Font | ۲ _۵ | | Alignm | ent | Γ <u>ν</u> | Number 🖓 | St | yles | | Cells | Ed | iting | |
| A1 | | • | × | $\sqrt{-f_x}$ | Message I | D | | | | | | | | | | | |
| | A | | В | с | D | | E | F | G | н | 1 | J | к | L | м | N | 0 |
| 1 | Message | ID | Task # | From | Date-Time | | Location | Latitude | Longitude | MGRS | Range (mi) | Bearing | Landlines | Landlines | Cell phon | Cell phon | AM/FM Br |
| 2 | EZAIFUS | 8PB0 | 1 | NCS398 | 10/31/2021 | 13:19 | Brentwoo | 35.0077 | -85.7666 | 16SFD1254274591 | 89 | 141 | Unknown | | Unknown | | Unknown |
| 3 | 6VPD418 | 2JPN | 1 | NCS398 | 10/31/2021 | 21:25 | Brentwoo | 37.0077 | -87.7666 | 16SDF3179796001 | 88.6 | 322 | Unknown | | Unknown | | Unknown |
| 4 | G8Y345ZJ | 90VV | 1 | NCS398 | 11/1/2021 | 15:59 | Brentwoo | 35.5077 | -85.0666 | 16SFE7534031066 | 101.3 | 109 | Unknown | | Unknown | | Unknown |
| 5 | 9LXUEX9 | QTBZ | 1 | NCS398 | 11/1/2021 | 19:15 | Brentwoo | 36.0078 | -86.7667 | 16SDF3178896012 | 0 | 328 | Unknown | | Unknown | | Unknown |
| 6 | Y10NOK | C9VJF | 1 | NCS398 | 11/1/2021 | 19:23 | Brentwoo | 36.0077 | -86.7667 | 16SDF3178896012 | 0 | 283 | Unknown | | Unknown | | Unknown |
| 7 | | | | | | | | | | | | | | | | | |

Recommended GPS Dongle

GlobalSat BU-353-S4 USB GPS Receiver (Black) (Improved-

New)

Brand: GlobalSat

★★★★★ ~ 1,198 ratings | 302 answered questions

Price: \$29.99

Get a **\$10 bonus** when you reload **\$100 or more** to your gift card balance (Restrictions apply).

Eligible for **amazon**smile donation.

Color: IMPROVED-NEW



| Brand | GlobalSat |
|-------------------------|--------------|
| Color | IMPROVED-NEW |
| Connectivity Technology | USB |
| Мар Туре | Satellite |

About this item

- Built-In GPS Patch Antenna
- Built-In Roof Mount Magnet
- 48-Channel All-In-View Tracking
- SiRF Star IV GPS Chipset
- WAAS/ EGNOS Support
- > See more product details



image to open expanded view

Setting up GPS in Winlink Express

- Open Settings GPS/Position Reports screen
- Select GPS serial port and speed (4800 baud)
- Tell it to update grid square from GPS position

| | GPS / Position Report | | | | | | | | |
|--------------------------------------|--|--|--|--|--|--|--|--|--|
| Set GPS serial port | GPS Serial Port GPS Serial Port: COM16 | | | | | | | | |
| | | | | | | | | | |
| GPS input should appear | GPS Status \$GPRMC,134011.000,A,3600.4629,N,08645.9969,W,0.00,167.12,151121,,A*72 | | | | | | | | |
| | Last fix at 2021-11-15 13:40:11 UTC | | | | | | | | |
| Your position will be | GPS Latitude: 36-00.46N GPS Longitude: 086-46.00W | | | | | | | | |
| shown | GPS Speed: 0.00 Knots GPS Course: 167 True | | | | | | | | |
| Update grid square from GPS position | Automatically update grid square from GPS position: EM660A | | | | | | | | |

Global Radio Email System

- Winlink team:
 - Lor Kutchins, W3QA (President, ARSFi)
 - Phil Sherrod, W4PHS (Developer and BoD)
 - Steve Waterman, K4CJX (Administrator and BoD)
- Winlink web site: <u>www.winlink.org</u>
- White papers about Winlink: <u>www.qrz.com/db/W4PHS</u>
- Support group: <u>https://groups.google.com/forum/#!forum/winlink-programs-group</u>