

Users Guide to the Regulatory Solutions, Inc. Web Application

Release: Version 1.3
Author: Robert Olive
Date: 7/15/22

Table of Contents

PURPOSE:	3
REGISTERING AN ACCOUNT	3
PRODUCTS LIST	3
CREATING AN ACCOUNT	5
SELECTING A PRODUCT	6
THE DASHBOARD	8
FILER DATA	8
OTHER DATA SECTIONS	10

Users Guide to the Regulatory Solutions, Inc. Web Application

The Regulatory Solutions, Inc. (RSI) website is located at <https://www.regulatorysolutions.us>
Our Support Email is info@regulatorysolutions.us

Purpose:

This guide is intended to demonstrate the use of the website for:

- Registering an account
- Selecting and Purchasing Services
- Selecting the services that you offer your customers, so that we can create the correct FCC filings support data packages (i.e., Fiber, DSL, Fixed Wireless, Voice, etc.)
- Providing guidance for downloading template files and uploading bulk data upload files
- Viewing the status of your data upload activities
- Viewing your tower and AP data on a map

Registering an account

NOTICE: The FCC has very serious enforcement practices and fines in place. It is extremely important for the customer (you) to submit their network and subscriber data to RSI after it has been reviewed and validated by your staff. If incorrect data goes to the FCC (knowingly or recklessly) then the cost to repair that data is significant. The FCC will require that you resubmit your data with a PE Certification, within 30 days of the issue being reported, the statute of limitations is 1 year from the filing date, and you can be fined \$15,000 per occurrence. If the FCC data issues were associated with YOUR incorrect initial data submission to RSI, the cost to you for RSI to refile your corrected data will be the same as your cost to file the original data set to the FCC.

“Validated by your staff,” means that the data that you are submitting to Regulatory Solutions, Inc. has been collected by your company and to the best of your knowledge the data is correct in content and reflects the status of your network and subscriber base at the close of the FCC data collection period (June 30 or December 31).

Registering an account with RSI permits you to select and pay for services.
RSI offers several different packages, including:

Products List

The customer agrees that they will be billed for tower charges, if incurred, after the data sets have been created for and prior to submission to the FCC. Submission of the data sets to the FCC will be completed after the final invoices have been paid.

The Works

- Combines Form 477 and the BDC Preparation
- Includes PE Certification
- Filing with the FCC on your behalf
- 1 Free BDC Follow Up Response, on your behalf
- \$1695.00

BDC FCC Protection Plan

- RSI will assist the customer address FCC Enforcement and Crowdsourced BDC complaints.
- This plan will be enforced in accordance with Terms and Condition located at: <https://www.regulatorysolutions.us/terms.html>
- \$25/Monthly

The following statements clarify the extent of the BDC Support package being sold to RSI customers. (BDC is and FCC acronym meaning: Broadband Data Collection)

- If crowdsourced accusations of incorrect FCC submitted data are found to be false, RSI will present the evidence to the FCC attempting to prove the accuracy of the data and the methodologies used to create the data (with input from the customer) to the FCC on behalf of the customer, within 10 business days after notification from the customer in writing and the direction to proceed from the customer.
- If the BDC data issues are found to be correct (the FCC submitted data is incorrect) and were a result of RSI validation efforts, RSI will re-validate the data sets, re-submit for PE Certification, and re-file with the FCC at no cost to the consumer. RSI will not compensate the customer for any fines imposed by the FCC on the client for the data submitted. RSI shall maintain an Errors and Omission Insurance policy.
- If the BDC data issues are found to be correct (the FCC submitted data is incorrect) and were a result of incorrect data from the customer, your data submission to RSI (knowingly or recklessly), if requested by you, the customer, RSI will re-validate the data sets, re-submit for PE Certification, and re-file with the FCC for \$995.00/Per occurrence
- \$25/Month

Tower Count (only for networks with greater than 99 Towers)

- Tower Count is only applied to service plans, "The Works," "BDC Preparation," and "State Broadband Production,"
- If your network has more than 99 tower locations this is an additional surcharge.

477 Preparation and Filing

- Deployment Data Preparation
- Review/Correct the OSS Supplied Subscription Files Uploaded and Verified
- Assistance with FCC Follow up Queries for Form 477 Data

- \$325.00

BDC Preparation

- Preparation of the Data Based on your network
- PE Certification
- Files will be Returned to you for filing
- \$1495.00

State Broadband Review

- Validation of your OSS Generated Files
- Files will be Returned to you for filing
- \$95.00

State Broadband Production

- Validation of your OSS Generated Files
- Production of Files, if needed
- Files will be Returned to you for filing
- \$1495.00

Creating an Account

Go to <https://www.regulatorysolutions.us>

If you do not already have an account, select Register at the bottom of the registration page.

Login

Hello! Log in with your email.

Email address:

Email address

Email is required!

Password: [Forgot Password?](#)

Password

Remember me

LOG IN

Don't have an account? [Register](#)

Fill out the registration page. The items are as follows:

Full Name – this is the name of the person completing the registration form.

Company Name – Your company name

Address – All of the address information (address, Ste. city, state, zip) is for your company mailing address. Ste. Box# is not a required field

Mobile Number – Contact number of an individual who is supplying the data, or someone who can direct us to the person supplying the data. Format is no hyphens.

Email Address – email address of an individual who is supplying the data, or someone who can direct us to the person supplying the data.

Password and Confirm Password – We do not check for password strength. We recommend at least 8 characters, Capital Letters, Lower Case Letters, and other ASCII Characters as well (&^\$!)

Click Register

Press the Green, “Return to Application,” button.

Selecting a Product

Select the Filing Period from the drop-down box at the top of the page.

Select the services that you want by clicking on the box. The box will turn green to show that you have selected those services.

The screenshot shows a checkout interface. At the top, a red banner reads "Early Bird Special: Use code JULY at checkout for \$400 off!". Below this is a section for "Filing Period End Date:" with a dropdown menu currently set to "June 30, 2022". The main focus is a large green box titled "The Works" which lists the following details: "Combines 477 and BDC Prep", "PE Certification", "BDC + 477 Filing on you behalf", "1 free BDC follup up response", a price of "\$1695.00", and a note "+\$5/Tower Site over 10 Sites".

Go back to the top of the page and click on the blue button, "Checkout." We currently only accept credit or debit purchases on the website. Complete the "Pay with Card Section." A phone validation dialog box will appear, and you will need to enter the code sent to your phone on record. Once you have completed your purchase, the program will direct you to the Dashboard.

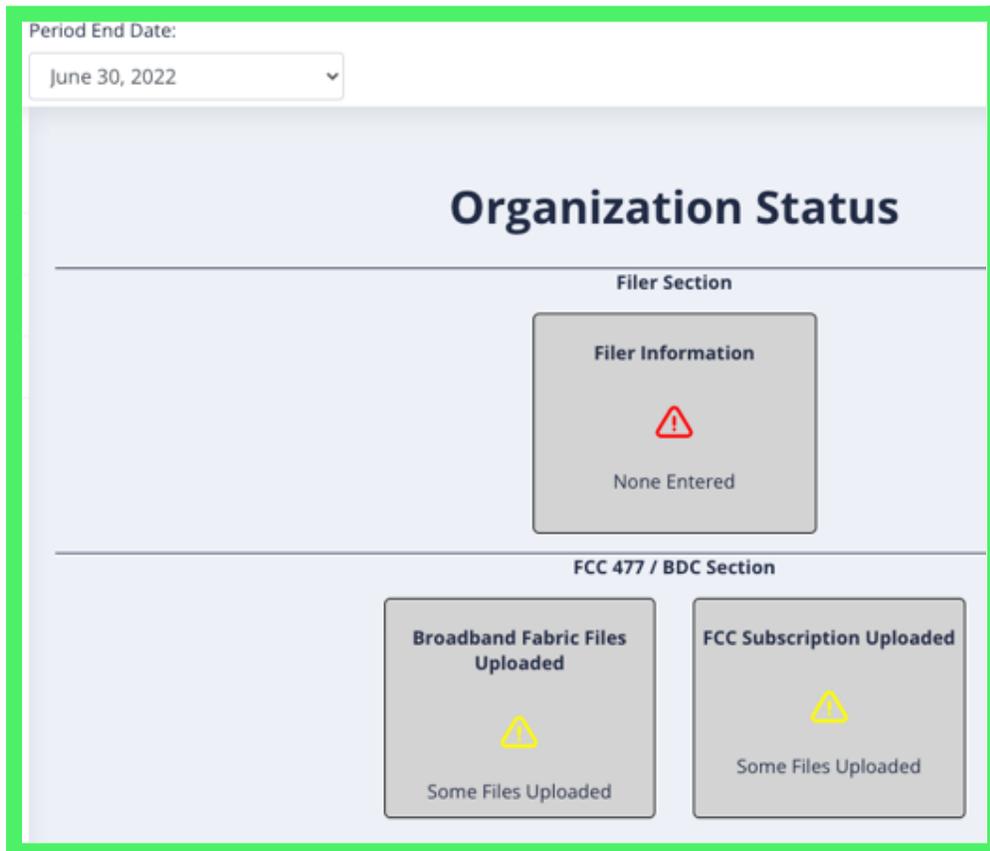
To date, taxes are only collected in NY, AZ, and TX due to a physical presence in each state. Other states may have taxes assigned later dependent upon total purchases made in the state and total income to the state over the period of a year. There will be no advance notice of taxes being added to future purchases given to registered users of this site.

The customer agrees to the following accounting principles. All Discounts will be remitted to the customer, within 60 days from the final date that the discount can be applied. If there are debits and credits due the customer, then the total amount to be remitted or charged to the customer will be reflected by the total credit minus debit amount.

Click on the "Return to Application." This will return you to the Dashboard. See Figure below.

The Dashboard

The dashboard identifies the data sets status, complete or incomplete. All the data sets need to be completed before we can file with the FCC. Clicking on the tile will take you to the proper location to upload/download templates for your data.



Filer Data

Click on the Filer Section.

The Filer Section has 4 parts all on the same web page. These are:

- **Filer Data**
 - This is where we select the technologies that we are submitting to the FCC
 - You may select as many technologies as you need
- **Company Info**
 - CnHeat has a polygon service. If you have polygons from CnHeat, please select this item so we can have you upload them to our servers
 - If you have a Subscription file from your billing platform, please make this selection
 - If you will be making a Voice submissions, select the upload on the Voice Subscription Radio button

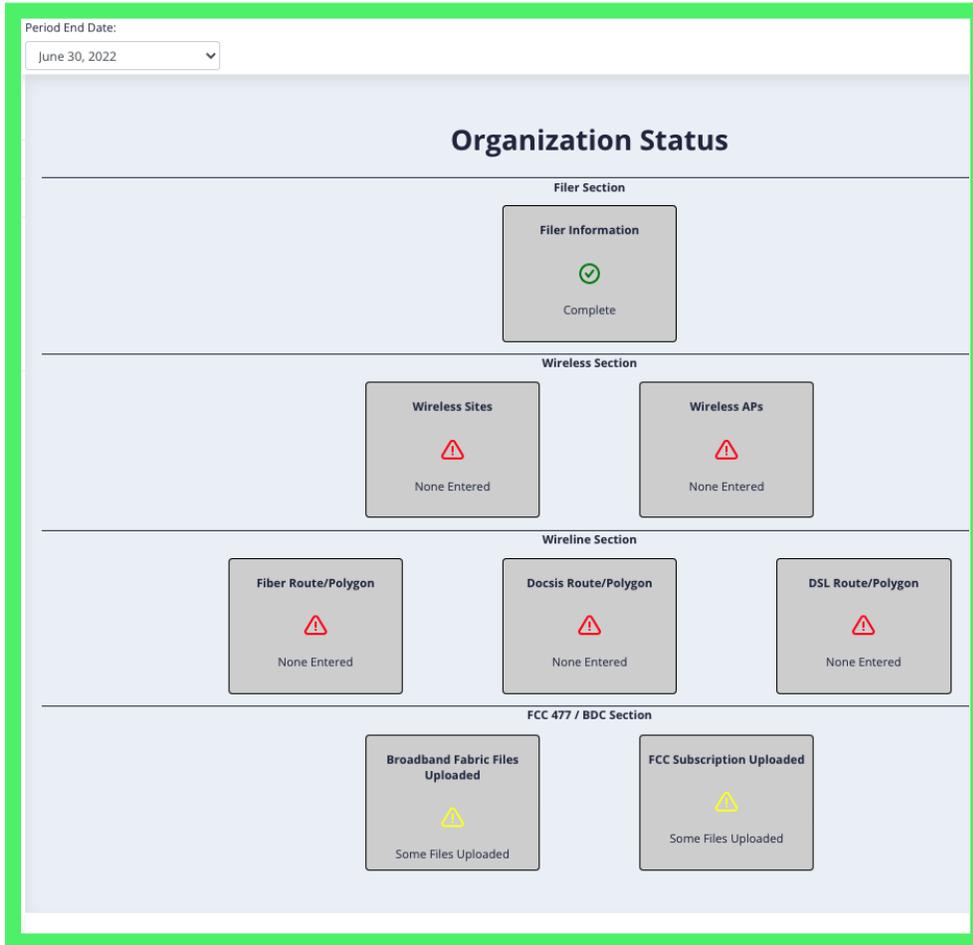
- Allow my data to be shared with other. Some banks and financial lenders are requiring that companies prove that they are in compliance with the FCC Form 477 and BDC data collection requirements. Please provide the email of the lender or bank that will be able to view your FCC submissions and PE Certifications
- If you are a government agency, please make this selection so we can add additional information to your service
- All Fields for the remainder of this section are required. If a field does not apply to you, enter, "Does Not Apply."
- Enter your Study Area Code, if you have one
- Enter your 499 Filer ID, if you have one
- **Filing contacts**
 - To enter new contact data data, click on, "[Add New Contact](#)," and enter the data below
 - Name
 - Title
 - Email
 - Phone
 - Extension, and click Submit
 - All three of these fields are required
 - If you have a certifying engineer, please enter his data by selecting the Certifying Engineer Radio Button
 - Data Contact is who we contact to discuss the data that you have submitted
 - Emergency Contact is the individual that we need to contact if there are errors with your submission and we cannot reach the Data Contact; or if we are coming up on important submission dates and we need data quickly
 - Certifying Contact has signature authority with your company. Active Owner, Director, President, CEO, Secretary, Other as identified
- **FCC Filing Info**
 - The FRN is required for you data submission; if you do not have one, you will need to get one immediately. Here is the link: <https://www.fcc.gov/wireless/support/universal-licensing-system-uls-resources/getting-fcc-registration-number-frn> if you have one, please enter it here.
 - If you are an FCC Cores user, please enter your username and password here. If you want to become a cores user, please follow this link: [https://www.fcc.gov/licensing-databases/commission-registration-system-fcc#:~:text=FCC%20Registration%20System%20\(CORES\)&text=CORES%2C%20which%20requires%20each%20user,digit%20FCC%20Registration%20Number%20\(FRN\)](https://www.fcc.gov/licensing-databases/commission-registration-system-fcc#:~:text=FCC%20Registration%20System%20(CORES)&text=CORES%2C%20which%20requires%20each%20user,digit%20FCC%20Registration%20Number%20(FRN))
 - **NOTICE: emails need to be in lower case.**

Click the Submit Button. A notice will come up showing that the data has been saved.

[CLICK BACK TO THE DASHBOARD](#)

Notice that the Filer Data Tile has a green completed checkmark.

I have selected all technologies for the purposes of this guide. See the Figure Below.



Notice that the Filer Section is completed.

In the following pages, we will describe each section below.

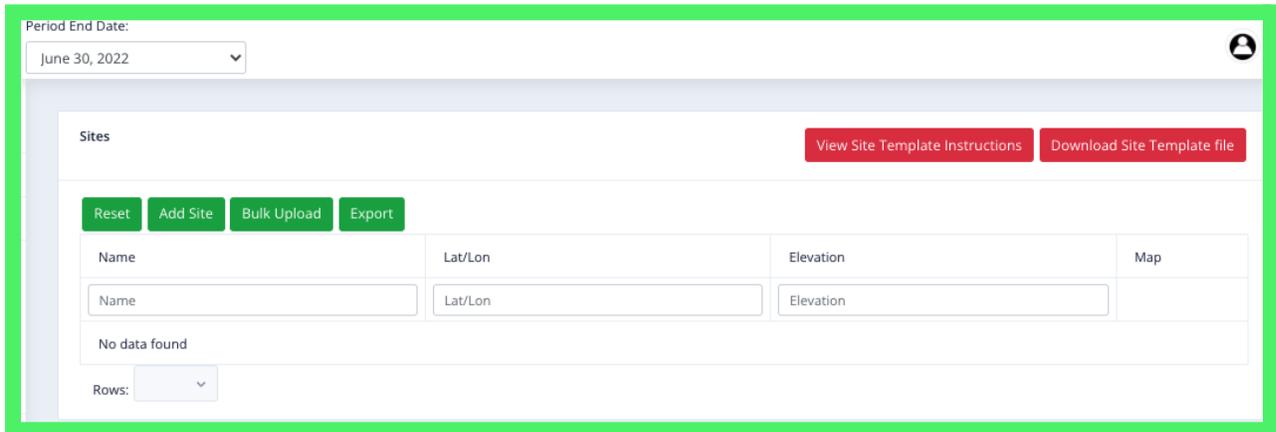
Other Data Sections

- Wireless Section
 - Wireless Sites
 - Wireless APs
- Wireline Section
 - Fiber Route/Polygon
 - Docsis Route/Polygon

- DLS Route/Polygon
- FCC 477/BDC Section
 - Broadband Fabric Files Uploaded
 - FCC Subscription Uploaded

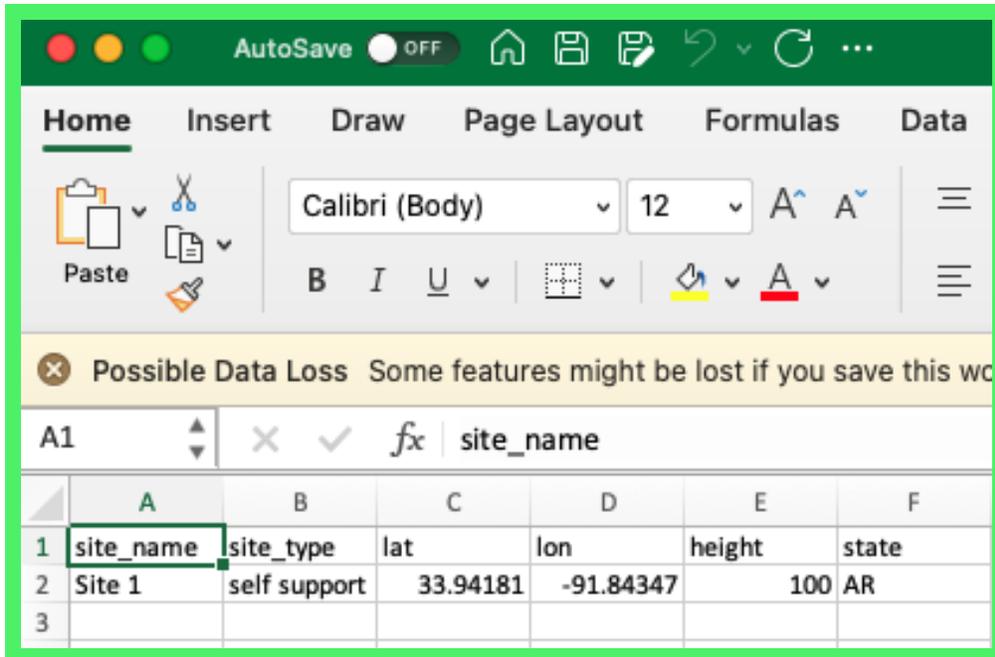
Wireless Section > Wireless Sites

Click on the Wireless Section > Wireless Sites Tile. See figure below:



You can enter your site directly by clicking on the Add Site button, or you can download a Site Template File by clicking on the red button.

If you open the downloaded Template file named, "towers_template.csv," with excel, you will see the following. Notice that there is sample data in the file. You can write over that data and add all of some of your sites. You do not need to all your sites at the same time, but rather you can make multiple files and add them separately.



If you download the towers_template instructions, you will see:

Tower Spreadsheet Instructions:

- site_name - name of the site
- site_type - type of site (i.e. self support tower)
- lat - latitude of the site in WGS84 Datum (most GPS and mapping software uses this as their default). For the US this is always a positive number
- lon - longitude of the site in WGS84 Datum (most GPS and mapping software uses this as their default). For the US this is always a negative number.
- height - the total height of the structure above the ground (AGL) in feet. This is not the AP mounting elevation, but the total structure height.(i.e. 150)
- state - the 2 letter abbreviation of the state in which this tower is located (i.e. AR)

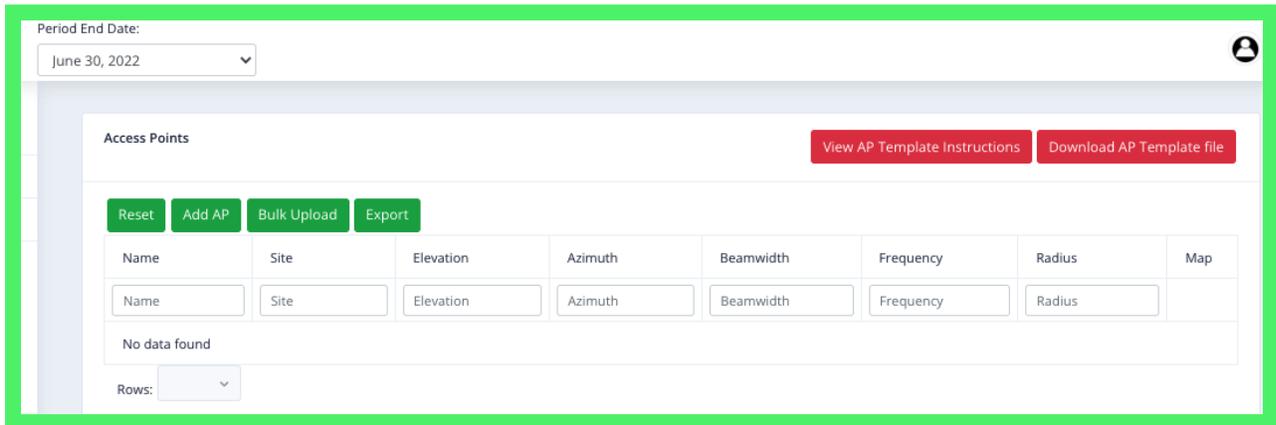
Enter your data. Lat and Lon are decimal values and height is in feet (**do not put in the units**). Once you have finished entering the data that you want, save the file to a name that you chose. Leave it as a .csv file and then click on Bulk Upload. It will permit you to chose a .csv file and to upload the data. Some of the data will appear in the table on the page.

You can also export the data for you own purposes by pressing Export.

Navigating back to the Dashboard, you will see the tile for Wireless Sites is not checked as completed. We only record that data has been entered and define that as complete. You may still have data to enter to finish putting in all the sites.

Wireless Section > Wireless Aps

From the Dashboard, click on the Wireless Section > Wireless APs Tile. See figure below:



You can enter your site directly by clicking on the Add Site button, or you can download an AP Template File by clicking on the red button.

If you open the downloaded Template file named, “APs_template.csv,” with excel, you will see the following. Notice that there is sample data in the file. You can write over that data and add all of some of your sites. You do not need to all your sites at the same time, but rather you can make multiple files and add them separately.

A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T
site_name	lat	lon	ap_name	ap_elevation	radio_model	antenna_model	ap_antenna_gain	tx_power_dbm	frequency_mhz	channel_width	azimuth	beamwidth	avg_noise_floor	coverage_rai	max_adverti	residential	business	lte	
Site 1	33.94181	-91.84347	S1AP1	100	Epmp 3000	RFE-60	18	24	5310	20	0	60	-80	3	25	10	1	1	0
Site 1	33.94181	-91.84347	S1AP2	100	Epmp 3000	RFE-60	18	24	5330	20	120	60	-80	3	25	10	1	1	0
Site 1	33.94181	-91.84347	S1AP3	100	Epmp 3000	RFE-60	18	24	5350	20	240	60	-80	3	25	10	1	1	0

If you download the APs_template instructions, you will see:

APs Spreadsheet Instructions:

Regulatory Solutions AP Spreadsheet Instructions

- site_name - site to which this AP belongs. Should match a site name in the sites spreadsheet.
- lat - latitude of the AP (WGS84 - most GPS and mapping systems use WGS84 as the default)
- lon - longitude of the AP (WGS84 - most GPS and mapping systems use WGS84 as the default)
- ap_name - name of the AP
- ap_elevation - elevation in feet above the ground (i.e. 100)
- radio_model - model of the radio you are using (i.e epmp 3000)
- antenna_model - model of the antenna you are using (i.e. HG3-TP-S30)
- ap_antenna_gain - maximum rated gain of the antenna in dBi. Do not add a unit. (i.e.18)
- tx_power_dbm - transmit power from your AP measured in dBm. Do not put units (i.e. 24)
- frequency - frequency on which you are transmitting in mHz. Do not put units (i.e. 5320)
- channel_width - width of your TX channel in mHz (i.e. 20)

- azimuth - the azimuth (direction it faces) of the antenna measured in degrees from true north. This will range from 0-359. (i.e. 30)
- beamwidth - the antenna beamwidth at the 3 dB point. This is the beamwidth most mfgs report. If they tell you it is a 60 degree antenna, then this would be 60.
- avg_noise_floor_dbm - this is the noise floor you see at this AP. Typically your AP stats will tell you this when you log in. In 5Ghz suburban areas this will probably be between -75 and -85 db. Put this in as a negative number. (i.e. -80)
- coverage_radius_mi - this is the estimated max distance in miles you would serve someone on this AP. (i.e. 3)
- max_advertised_download_speed - the maximum advertised download speed you offer from this AP in Mbps (i.e. 25)
- max_advertised_upload_speed - the maximum advertised upload speed you offer from this AP in Mbps (i.e. 10)
- residential - If you can service residential customers from this AP put a 1. If not, put a 0.
- business - if you can service business customers from this AP, put a 1. If not, put a 0.
- lte - if this is an LTE AP, put a 1. If not, put a 0.

Enter your data. **Yes, the FCC Requires all this data.** Lat and Lon are decimal values and height is in feet (**do not put in the units**). Once you have finished entering the data that you want, save the file to a name that you chose. Leave it as a .csv file and then click on Bulk Upload. It will permit you to chose a .csv file and to upload the data. Some of the data will appear in the table on the page. Due to size limitations, you cannot see all of the data that has been entered on this page.

You can also export the data for you own purposes by pressing Export.

Navigating back to the Dashboard, you will see the tile for APs Sites is checked as completed. We only record that data has been entered and define that as, “complete.” You may still have data to enter to finish putting in all your APs.

Wireline Section > Fiber Route/Polygon

If you have indicated that you provide service over fiber, coax, DSL, or other wireline type services, this section will allow you to upload polygons in .shp, .kml, or geojson format. We are looking for either a polygon that covers the homes you pass, or a series of lines that show your routes along the streets whether buried or aerial.

In addition to the polygon, you need to provide the maximum advertised down and up speeds you can deliver in each polygon. If you have places where you deliver different rates, you will need to upload multiple files, one for each area where the maximum residential advertised rate is different. If you need help with any of these, please reach out to our support team.

Fiber Polygons: June 30, 2022

Check this box if you have uploaded all of you Fiber polygons

[Add Fiber Polygon](#)

File	Tech Code	Max Download	Max Upload
------	-----------	--------------	------------

Cable (docsis) Polygons: June 30, 2022

Check this box if you have uploaded all of you Cable polygons

[Add Cable Polygon](#)

File	Tech Code	Max Download	Max Upload
------	-----------	--------------	------------

DSL / Copper Polygons: June 30, 2022

Check this box if you have uploaded all of you DSL/Copper polygons

[Add DSL Polygon](#)

File	Tech Code	Max Download	Max Upload
------	-----------	--------------	------------

As can be seen in the figure above, by clicking on Add Fiber Polygon, Add Cable Polygon or Add DSL Polygon, the associated windows ask for the Technology and other required data. See the Images below.

Fiber Polygons:

Fiber Polygons: June 30, 2022

Check this box if you have uploaded all of you Fiber polygons

Add Fiber Polygon

Technology

Max Download Mbps (integer)

Max Upload Mbps (integer)

Choose File No file chosen

Upload File

Cancel

- Technologies are selected from the dropdown Menu
- Max Download Speeds are in Mbps and are entered as a number without units and are an integer
- Max Upload Speeds are in Mbps and are entered as a number without units and are an integer

Cable (docsis) Polygons:

Cable (docsis) Polygons: June 30, 2022

Check this box if you have uploaded all of you Cable polygons

Add Cable Polygon

Technology

Max Download Mbps (integer)

Max Upload Mbps (integer)

Choose File No file chosen

Upload File

Cancel

File

Tech Code

Max Download

Max Upload

- Technologies are selected from the dropdown Menu
- Max Download Speeds are in Mbps and are entered as a number without units and are an integer
- Max Upload Speeds are in Mbps and are entered as a number without units and are an integer

DSL / Copper Polygons:

DSL / Copper Polygons: June 30, 2022

Check this box if you have uploaded all of you DSL/Copper polygons

Add DSL Polygon

Technology
Asymmetric xDSL

Max Download Mbps (integer)

Max Upload Mbps (integer)

Choose File No file chosen

Upload File **Cancel**

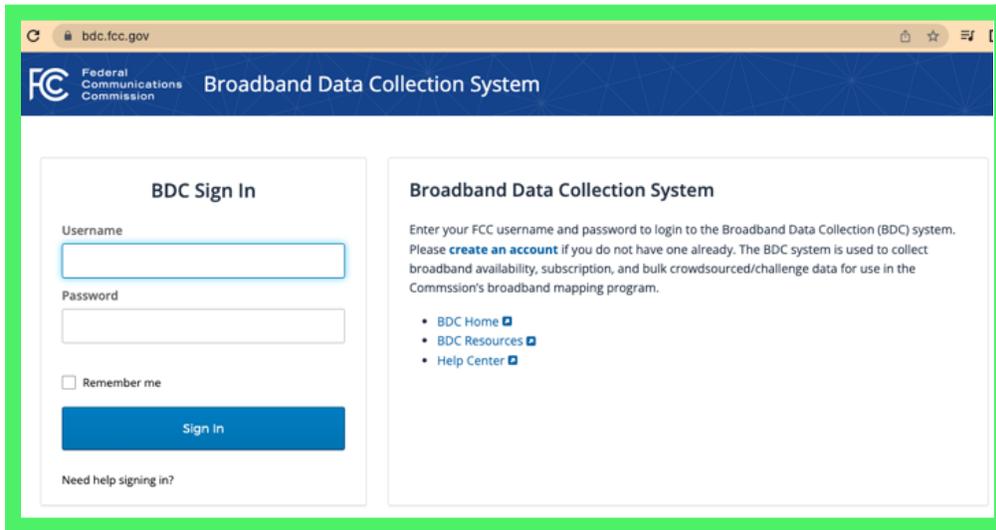
File	Tech Code	Max Download	Max Upload
------	-----------	--------------	------------

- Technologies are selected from the dropdown Menu
- Max Download Speeds are in Mbps and are entered as a number without units and are an integer
- Max Upload Speeds are in Mbps and are entered as a number without units and are an integer

Once you have completed entering all of your polygon data, click on the check box titled, "Check this box if you have uploaded all your polygons."

FCC 477 / BDC Section

Every service provider is required to create an FCC Broadband Data Collection account. The link is: www.bdc.fcc.gov. The website looks like this:



You can create an account by clicking on the hyperlink, "Create an account."

When you register with the FCC for BDC Data Collection, the FCC will send you the Data Fabric Files. Please add us as a third-party recipient. If you forget, you can send us those files with the FCC 477 / BDC Section. Just add the files and upload them to us.

In addition, we will need your FCC Subscription Data files. You can upload those to us on the FCC 477 / BDC Section, as well.

Once you have uploaded all the files provided by the FCC and the FCC Subscription data provided by your billing software, please click the button, "Check this box if you have uploaded all your FCC Files, or BDC Files."

Data File Uploads for FCC

FCC Wireless Data: June 30, 2022

FCC Subscription Data

Check this box if you have uploaded all your FCC files

[Upload Billing/OSS Subscription File](#)

File	Date Uploaded	Actions
------	---------------	---------

Broadband Fabric Files: June 30, 2022

Check this box if you have uploaded all your BDC files

[Upload File](#) [Export BDC Data](#)

File	Date Uploaded	Actions
------	---------------	---------

To log out of the program, go to the top right of the website and click on the Man Icon, and select Log out. See the figure below:

The screenshot shows the top right corner of the application. On the left, the text "Organization Status" is visible above a "Filer Section" label. On the right, there is a user profile icon (a person silhouette) which has opened a dropdown menu. The menu contains two items: "Profile" with a person icon and "Log out" with a door icon.

That is all the data files we will need to complete your BDC Data and Form 477 files. If you need assistance with anything further, please contact us at info@regulatorysolutions.us.