Bulk Site Creation

In this section, we will learn how to create multiple sites at once via a CSV file upload. This feature is intended to ease the project manager's efforts when setting up a large number of sites and site groups for the first time.

> You must ensure that you have the accurate location coordinates for each of the site in WKT format, along with the buffer area (where applicable).

For example, if you want to survey telecom towers located throughout the city, instead of creating sites one by one for each area within the city, you can upload the location of all the sites in WKT format through the CSV file upload option.

> The number of sites that can be uploaded through a single CSV file upload is limited to 50. Any additional or duplicate records will be ignored.

1. In the **Sites** module, under the **Site Groups** tab:
   - In the **Card view**, click **View** on the card of the site group to which you want to link sites.
   - In the **List view**, click the name of the site group to which you want to link sites.
2. On the displayed site group page, click **LINK SITES TO SITE GROUP** and then click **Create Site From File**. The **Create Sites From File** page is displayed.
3. Click **Download Sample** and save the data template to the local hard disk.
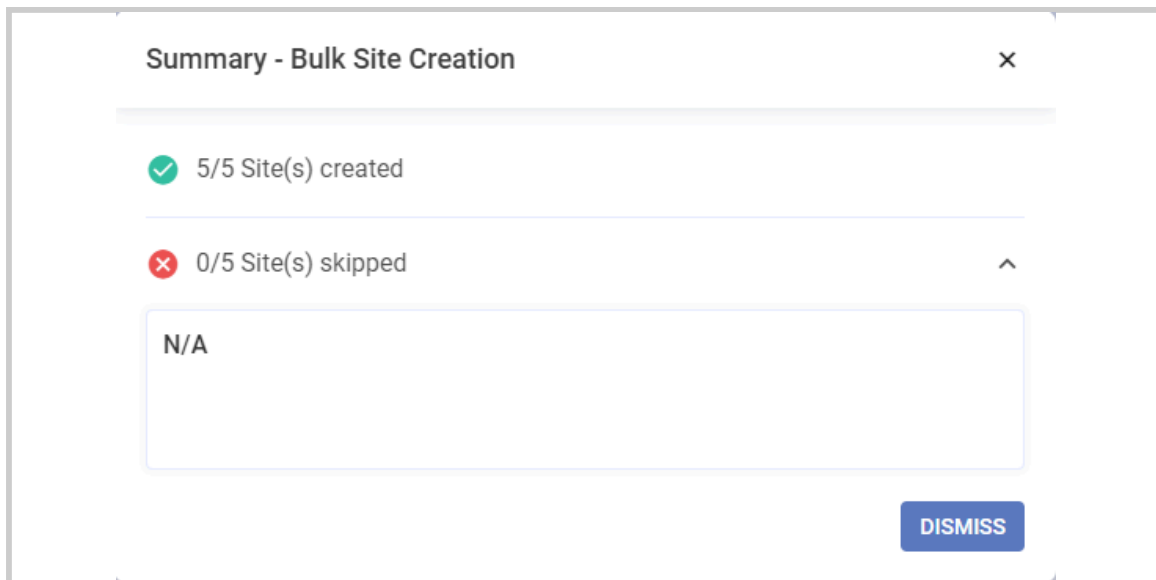4. Fill out the required details in the downloaded template file.

The following table describes the columns in the template CSV file:

Field	Description
Site Name	Enter a name for the site The Site name must contain 5 to 50 characters.
Site Type	Enter the site type you are creating. For example, Agriculture.
Description	Describe the purpose of this site.
Location (WKT)	Enter the site boundary in WKT format. You can do so in the following - Point - Line String - Polygon For more information, click **here**.
Buffer	Enter the buffer area that you want around the site boundary. This is only applicable to Telecom and Pipeline site types other sites, please use null. For more information, click **here**.
Site Group	Enter the name of the site group to which you want to link this site.

	A	B	C	D	E	F
1	Site Name	Site Type	Description	Location (WKT)	Buffer	Site Group
2	Andheri	Telecom	Cell tower	POINT((13.0784))	2	Mumbai
3	Kurla	Telecom	Cell tower	POINT((12.5925))	2	Mumbai
4	Santa Cruz	Telecom	Cell tower	POINT((14.1532))	2	Mumbai
5	Bhagasara	Pipeline	Gas pipelilne	LINESTRING((24.5	5	Gujarat
6	Damnagar	Pipeline	Gas pipelilne	LINESTRING((24.5	5	Gujarat
7	Vallabhipur	Pipeline	Gas pipelilne	LINESTRING((24.5	5	Gujarat
8	Brigade Luxuria	Construction	Housing Society	POLYGON((31.07	null	Noida
9	IP Health	Construction	Hospital	POLYGON((43.07	null	Noida
10	Lotus Valley	Construction	School	POLYGON((56.88	null	Noida

Sample CSV File for Bulk Site Upload

5. Once you have added all the site details to the file, save the file.
6. Now on the **Create Sites From File** page, click **Browse** and upload the CSV file. A preview of the file is displayed.
7. Click **Create Site**. The newly created site(s) are added to the site inventory and linked to the respective site group(s) as defined in the CSV file. You can also view these sites on the respective site group's page.
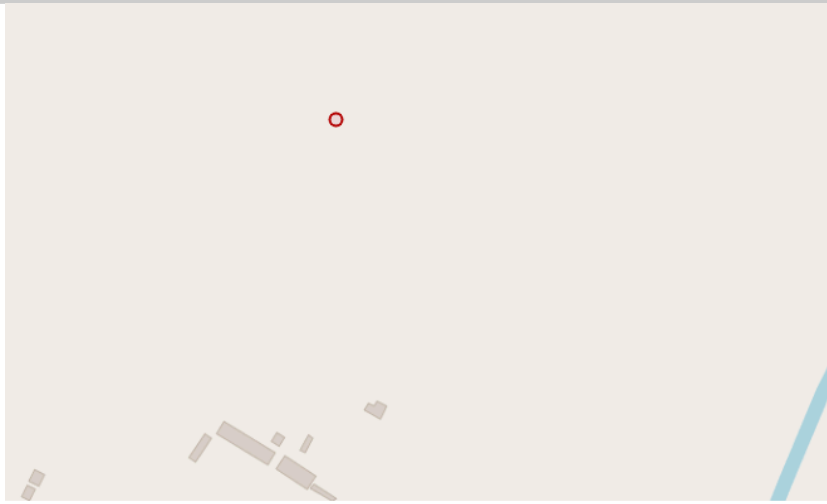
Bulk site creation summary

> Click **here** for common errors that could happen in this step.

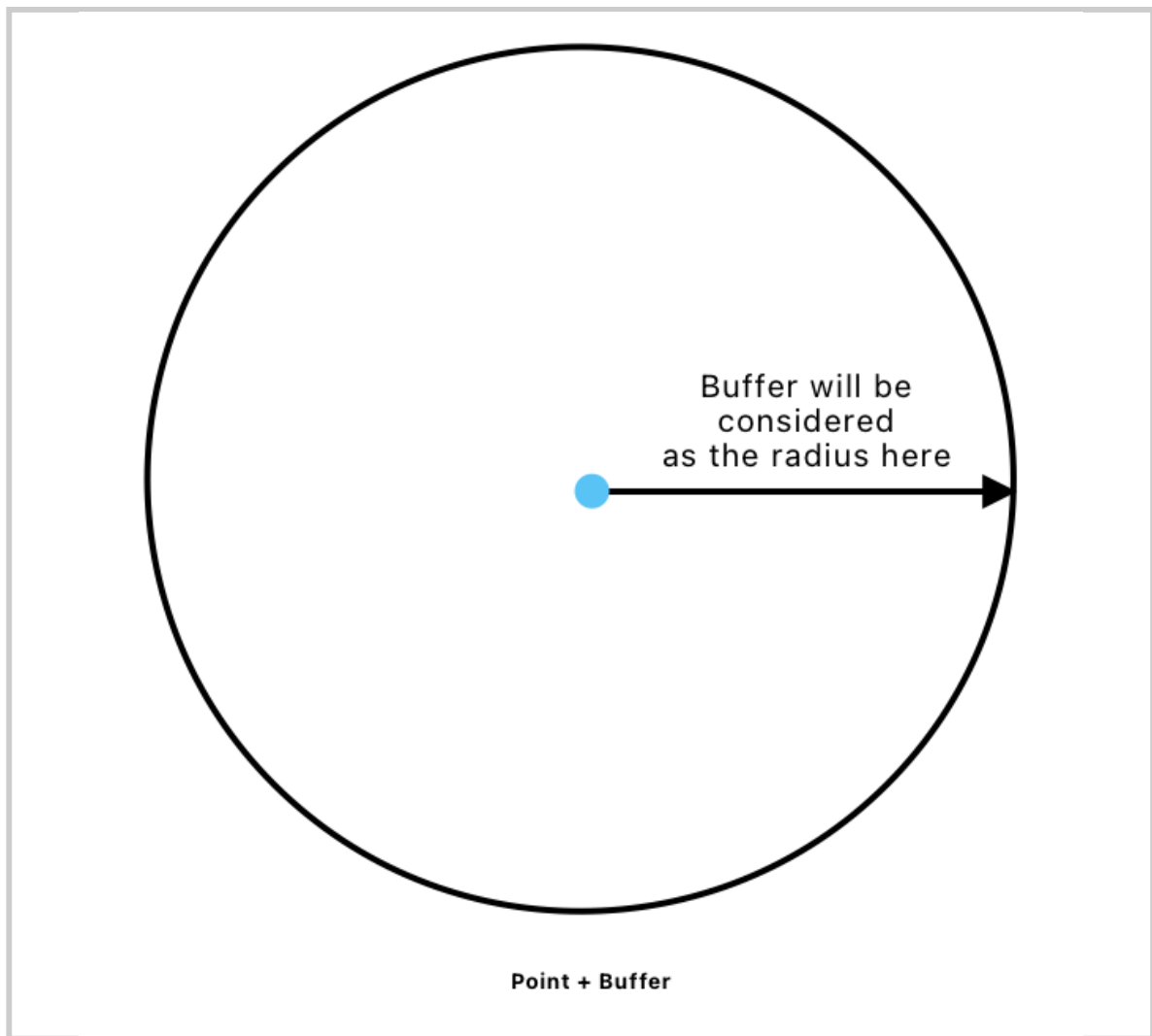## Defining the Site Boundary with Location (WKT) and Buffer

Except in the case of a polygon, when defining a site boundary you must factor in the Location (WKT) and buffer values for it to be considered as a complete site boundary. WKT (Well Known Text) is a text representation of a geometric shape like points, lines and polygons.

> Ensure that you have the accurate location coordinates for each of the site in WKT format, along with the buffer area (where applicable).
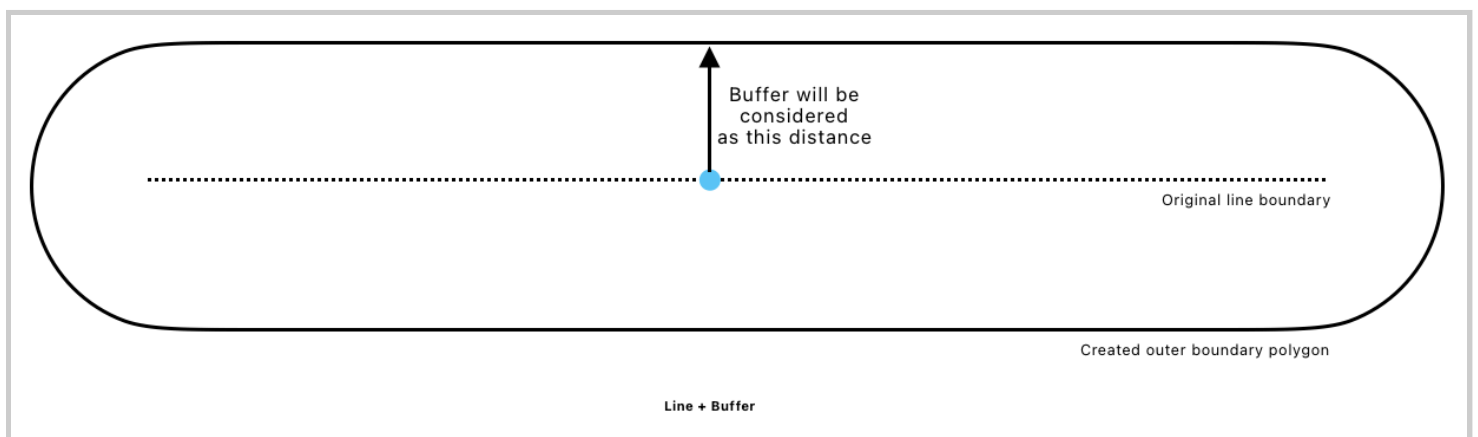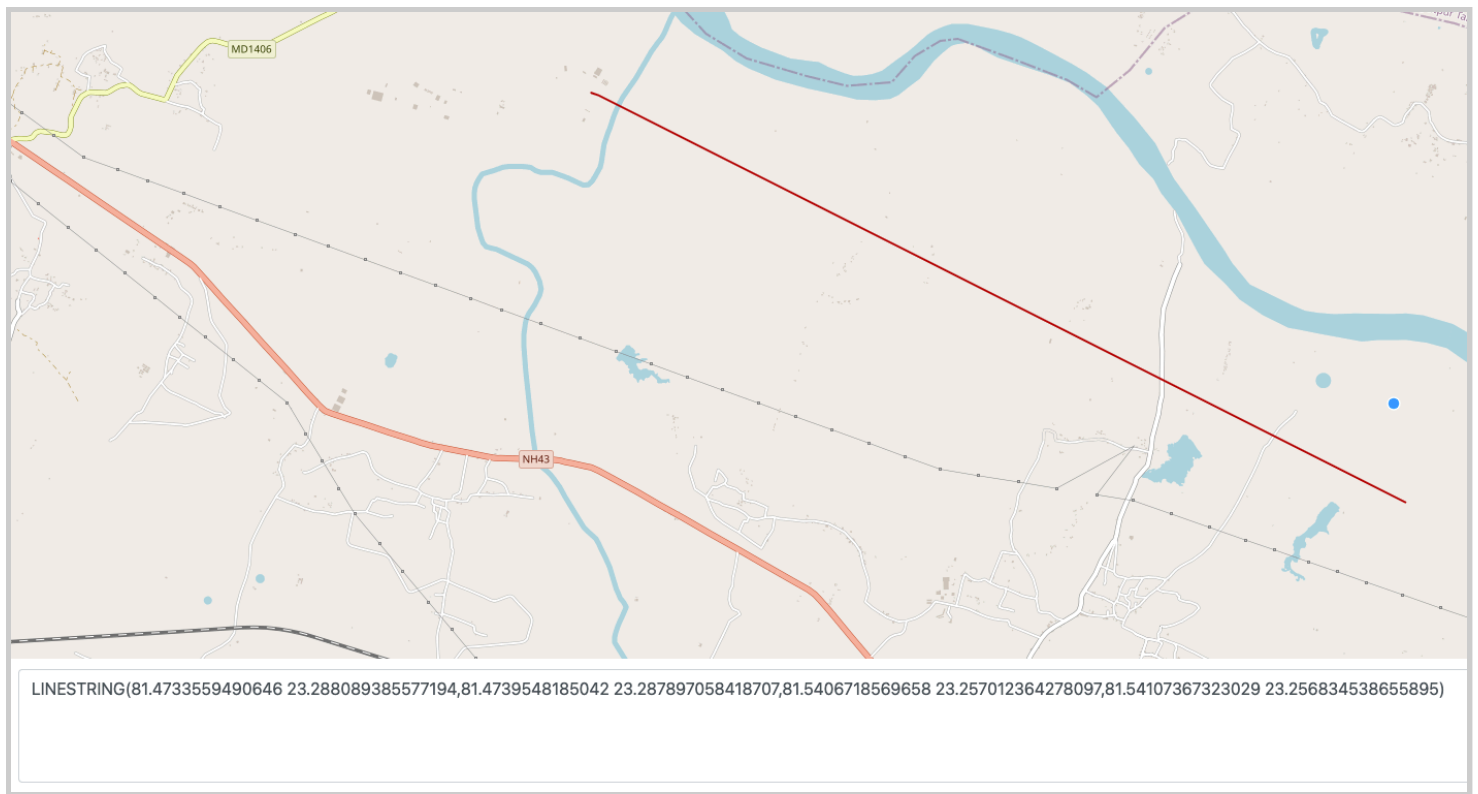
- **Defining the Site Boundary as a Point**: The boundary information can be given in a POINT (Latitude, Longitude) format only for Telecom sites. However, you must add the buffer in 'meters', where the entered value will be taken as the radius around that point and a circle is then drawn. This circle is then saved as the site boundary. This is particularly useful if you only know the exact latitude and longitude of the telecom tower and if you want to create a site surrounding it to carry out a mission.

POINT(81.4733559490646 23.288089385577194)

Buffer will be considered as the radius here

Point + Buffer

- **Defining the Site Boundary as a Line String**: The boundary information can be given in a Line String format (Point 1, Point 2, Point 3, …, Point n) only for Pipeline sites. However, you must add the buffer (in meters) which will be used to extend the area to create a larger polygon for the site to include the pipeline in it. This makes it easier to conduct missions on top of it.
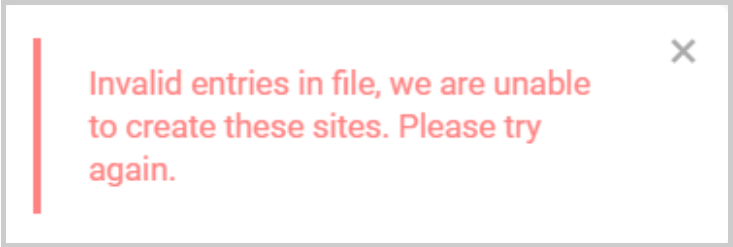
LINESTRING(81.4733559490646 23.288089385577194,81.4739548185042 23.287897058418707,81.5406718569658 23.257012364278097,81.54107367323029 23.256834538655895)

Buffer will be
considered
as this distance

Original line boundary

Created outer boundary polygon

Line + Buffer

- **Defining the Site Boundary as a Polygon**: The boundary information can be given in a polygon format for all site types. The format used here is (Point 1, Point 2, Point 3, …, Point n, Point 1).
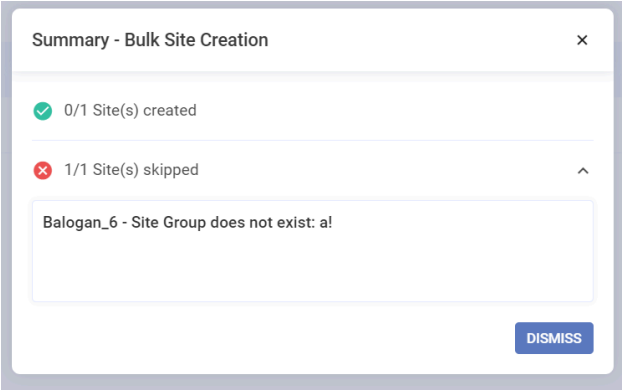
Buffer is not required when defining the site boundary as a polygon.

Common Errors

- **Invalid File Alert**: This pop-up notification is displayed on the screen if you:

Invalid entries in file, we are unable to create these sites. Please try again.

- Enter a site type that is not included in the license agreement.
    - Misspell the name of the site type.
    - Leave any column, except Buffer and Description, empty.
    - Enter a site name that already exists.
- **Failure Summary**: This dialog box is displayed on the screen if you:

- Enter a Site Group that does not exist
    - Do not define the Buffer as an integer for LINESTRING or POINT (For example, the buffer is defined as A2010)
    - Enter the Location type as LINESTRING when the Site Type is other than **Pipeline**
    - Enter the Location type as POINT when the Site Type is other than **Telecom**

When there are multiple records, this dialog box shows results for created and skipped sites.