

# Lines

Lines allow you to group installations together. They don't require a physical location, though most often they are used to follow a physical track or path. Lines can be used however it makes sense within your project.

When adding installations, you can associate them with a particular line. This allows you to create records and reports which are filtered by their line.

Check out this YouTube video about how to use lines here:  
<https://www.youtube.com/watch?v=c0pJOoL6OEq>

- [Adding lines](#)
- [Editing lines](#)
- [Managing line installations](#)
- [Downloading line information](#)
- [Creating Lines from track logs](#)

# Adding lines

<https://www.youtube.com/embed/c0pJOoL6OEq?t=81>

## How to add a line to your project

1. Select your project from your [My Projects](#) list.
2. Click on the [Lines](#) section of your project.
3. Select [Add line](#) from the Lines menu.
4. Enter the details for the line (required fields are indicated by \*).
  - **Line name\*:** Give the line a descriptive name
  - **Line type\*:** Lines can be used to group any combination of traps, bait stations and/or monitoring stations. Select the types of stations which will be on this line (you can select more than one choice by holding down the control on your keyboard while clicking).
  - **Select colour:** Choose which colour you want the line to be on the map.
  - **Location:** Lines don't require a physical location on the Trap.NZ system - some projects use lines simply to group installations together, though most often they are used to follow a physical track or path.

There are three different ways to add a line location:

1. [Using the map:](#)
  1. Use the — tool at the bottom of the map to draw the line on the map
  2. Double-click to finish drawing.
  3. If the line is not in the right place, delete it using the "Delete features" button, and re-draw the line.
2. Using the Data field below the map:
  - The Data field allows you to cut and paste shape data in WKT format [recorded from the Trap.nz App](#), or from GIS systems such as ArcGIS or Quantum. If you add WKT here it will be used instead of the map drawing.
  - Note: the [CRS is EPSG:4326](#)
3. Using GPX:
  - If you have a GPX file for the line, you can upload it then click the "Place line using GPX file" button to place the line on the map. Note that the GPX file should contain

a route or track log, not installation locations or points.

5. Click the green "Save" button at the bottom of the page

# Editing lines

<https://www.youtube.com/embed/95wSktxZNzQ>

1. Start from the [Lines](#) section of your project (If you have more than one project, check that you're in the right one)
2. Scroll down to the list of lines under the map, and select the line you wish to edit.
3. Click on the “Edit” button above the map
4. Here you can edit the line name, type, colour and location. (For instruction on how to edit the line on the map, watch the video above.)
5. When you are done, click the green “Save” button at the bottom of the page.



[https://www.youtube.com/watch?v=kFW\\_Hngk\\_vY](https://www.youtube.com/watch?v=kFW_Hngk_vY)

# Managing line installations

*Only users with an "Administrator" role in a project can access these tools.*

Note: The line needs to exist in your project before any installation can be added to it. You can learn how to [create lines here](#).

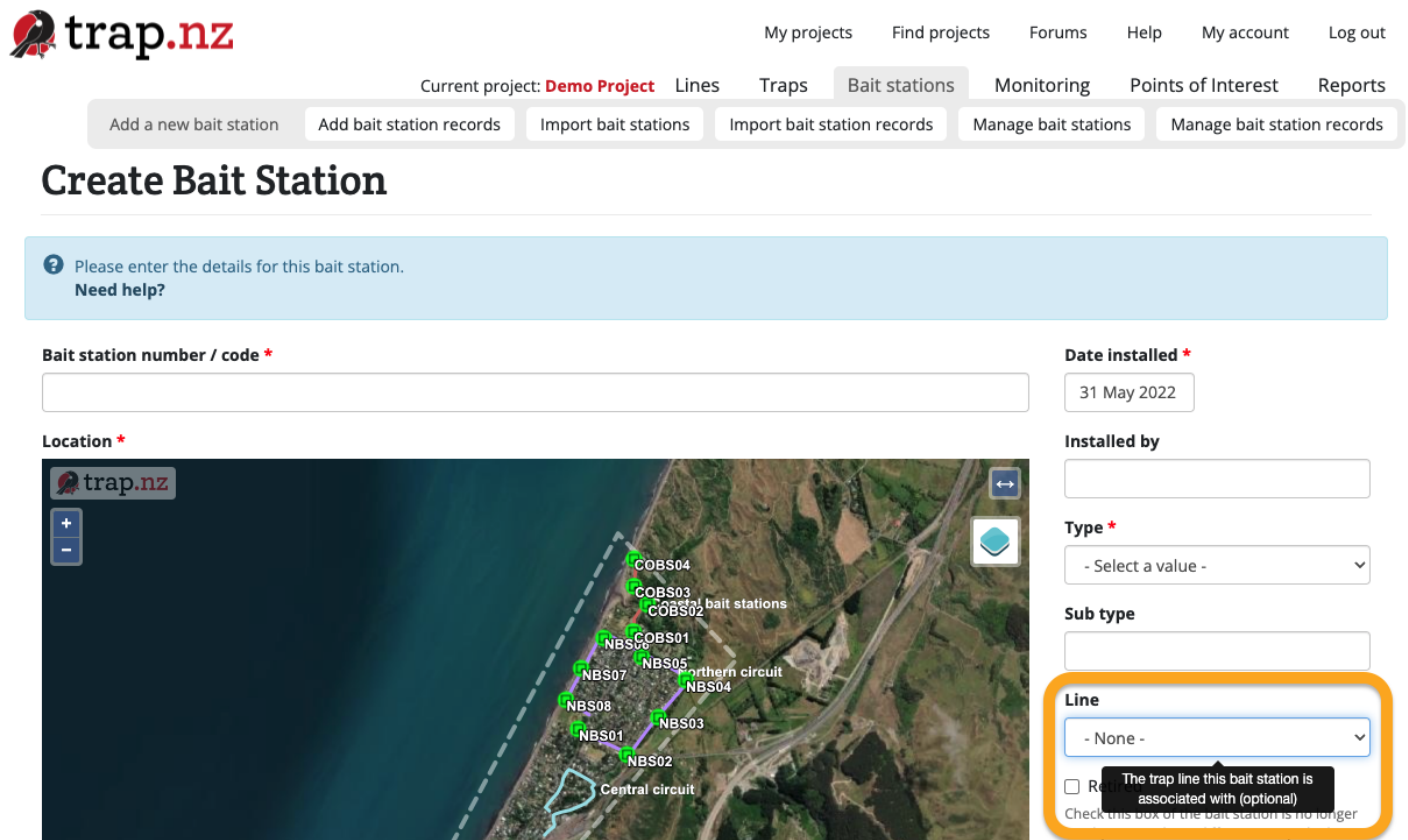
Managing line installations can be done at the individual level by setting the Line field while [editing an installation](#), however in many cases it makes more sense to do this via [bulk editing](#).

## Adding a single installation to a line

To add a new installation to a line:

When you're adding an installation to your project, you can add them to a line at this stage by selecting the line from the dropdown menu labelled "Line" on the Create Installation form.

e.g. When creating a new Bait Station



**trap.nz**

My projects Find projects Forums Help My account Log out

Current project: **Demo Project** Lines Traps Bait stations Monitoring Points of Interest Reports

Add a new bait station Add bait station records Import bait stations Import bait station records Manage bait stations Manage bait station records

### Create Bait Station

? Please enter the details for this bait station.  
Need help?

**Bait station number / code \***

**Date installed \***  
31 May 2022

**Installed by**

**Type \***  
- Select a value -

**Sub type**

**Line**  
- None -

☐ Remember this trap line this bait station is associated with (optional)  
Check this box if the bait station is no longer

**Location \***

trap.nz

Map showing bait stations (NBS01, NBS02, NBS03, NBS04, NBS05, NBS06, NBS07, NBS08) and COBS (COBS01, COBS02, COBS03, COBS04) along a coastline. The map includes a dashed line indicating a boundary and a blue line indicating a route. The map also shows a road and a body of water.

## To add an existing installation to a line:

If you want to add an existing installation to a line, you can do this by editing the installation, and selecting the line from the "Line" dropdown menu.

## Adding multiple installations to a line

You can add multiple installations to a line from the "[Manage Traps](#) / [Manage Bait Stations](#) / [Manage Monitoring Stations](#)" menu.

While multiple installation types (e.g. Traps and Bait Stations) can be part of the same line, each installation type needs to be added one-by-one (e.g. you can add multiple traps to a line using the instructions below, then to add multiple bait stations, repeat the same steps in the Bait Stations section of the website).

## To add multiple installations to a line:

1. Select the project from your [My Projects](#) list.
2. Go to the [Manage Traps](#) / [Manage Bait Stations](#) / [Manage Monitoring Stations](#) section of your project.
3. (Optional) If you have a lot of installations, you can search for the particular installations that you want to edit using the filter bar. Click the green "Apply filter" button to show the filtered traps.
4. Select the checkboxes of the installations you want to edit.
5. From the Operations dropdown menu, select Change trap details / Change bait station details / Change station details.
6. Click the "Execute" button.
7. Select the "Line" checkbox, and select the line that you want to add the installations to.
8. Click the "Next" button.
9. Check your changes and click the green "Confirm" button to save your changes.

For video instructions click this link <https://www.youtube.com/watch?v=g4bkmiPNlqs>

## Removing installations from a line

To remove installations from a line, follow the instructions above, but instead of selecting a line, select "None".

# Downloading line information

Line information (line name, colour, and a wkt string describing the line path) can be downloaded to a CSV file. CSV files can be viewed and edited easily in spreadsheet programs like Excel or Google Sheets.

To download line information:

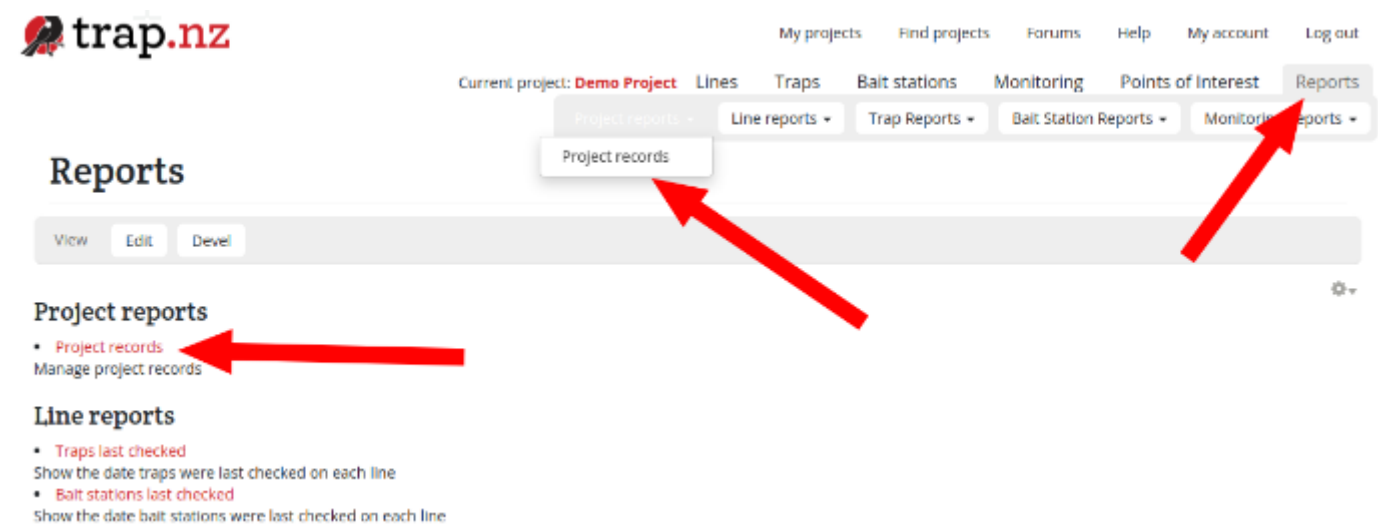
1. Navigate to the [Lines](#) section of your project.
2. (Optional) Choose which line(s) you want to download from the line filter list. Click the green "Apply" button to apply the filter.
3. Scroll down to the bottom of the page and click the "Download CSV" button.
4. When prompted, select a location on your device to save the file.

# Creating Lines from track logs

This is an effective method to create an exact line for your project. Generally it is better to use recorded tracks as only a starting point for creating lines as often they contain too much detail, and way finding errors.

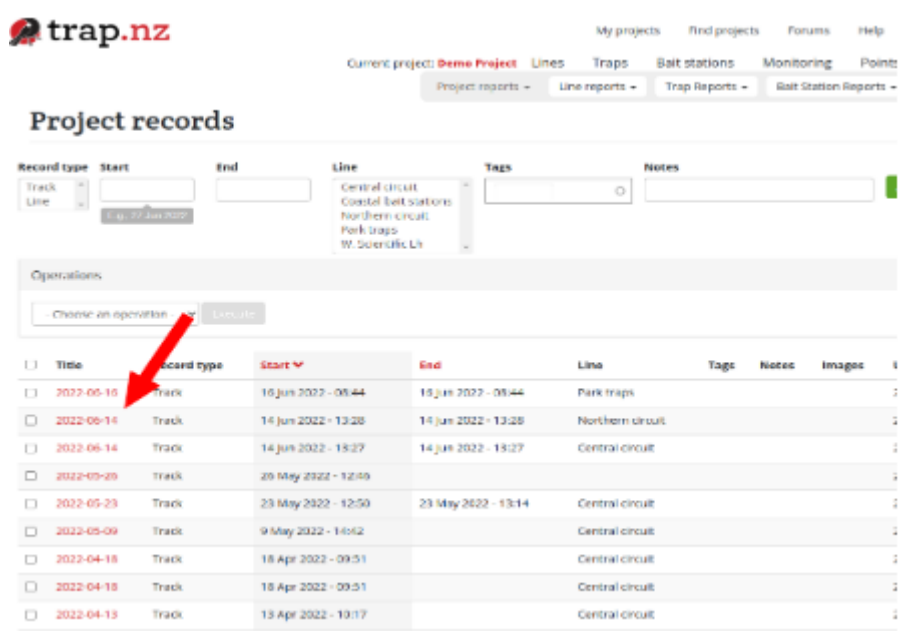
## Creating Lines from track logs

If you have used the Walk a Line (proximity) function in the app, track logs will be listed in the [project records](#).



The screenshot shows the 'trap.nz' web interface. At the top, there's a navigation bar with links: 'My projects', 'Find projects', 'Forums', 'Help', 'My account', and 'Log out'. Below this, a secondary bar shows 'Current project: Demo Project' and tabs for 'Lines', 'Traps', 'Bait stations', 'Monitoring', 'Points of Interest', and 'Reports'. The 'Reports' tab is active, and a dropdown menu is open, showing 'Project reports' (selected), 'Line reports', 'Trap Reports', 'Bait Station Reports', and 'Monitoring reports'. Below the dropdown, the 'Project reports' section is visible, with a sub-menu containing 'Project records' (selected) and 'Manage project records'. Further down, the 'Line reports' section is visible, with sub-items 'Traps last checked' and 'Bait stations last checked'. Red arrows indicate the path from the 'Reports' tab to 'Project records' and then to the 'Project records' sub-item.

Select the track line you are wanting to create a track log from



The screenshot shows the 'trap.nz' web interface for 'Project records'. At the top, there's a navigation bar with links: 'My projects', 'Find projects', 'Forums', and 'Help'. Below this, a secondary bar shows 'Current project: Demo Project' and tabs for 'Lines', 'Traps', 'Bait stations', 'Monitoring', and 'Points of Interest'. The 'Project records' tab is active, and a dropdown menu is open, showing 'Project reports', 'Line reports', 'Trap Reports', and 'Bait Station Reports'. Below the dropdown, the 'Project records' section is visible, with a sub-menu containing 'Project records' (selected) and 'Manage project records'. Further down, the 'Line reports' section is visible, with sub-items 'Traps last checked' and 'Bait stations last checked'. Below this, there's a table with columns: 'Record type', 'Start', 'End', 'Line', 'Tags', 'Notes', and 'Images'. The table contains several rows of track records. A red arrow points to the 'Track' record type in the first row of the table.

Record type	Start	End	Line	Tags	Notes	Images
Track	10 Jun 2022 - 08:44	10 Jun 2022 - 08:44	Park traps			
Track	14 Jun 2022 - 13:28	14 Jun 2022 - 13:28	Northern circuit			
Track	14 Jun 2022 - 13:27	14 Jun 2022 - 13:27	Central circuit			
Track	20 May 2022 - 12:09					
Track	23 May 2022 - 12:50	23 May 2022 - 13:14	Central circuit			
Track	9 May 2022 - 14:52		Central circuit			
Track	18 Apr 2022 - 09:51		Central circuit			
Track	18 Apr 2022 - 09:51		Central circuit			
Track	13 Apr 2022 - 10:17		Central circuit			



It will then display as a map with your track on it



Click on the edit tab and the coordinates will show in the data field, copy the coordinates



Select lines - [Add line](#)

Place the copied GPX coordinates in the data field

Select "Place line using GPX file"

Save the line

**Note: if the file has created with speech marks at the beginning and end these will need to be removed before the file will work properly.**

Select colour

Choose a colour for this line's display on the map

Location



Data

```
LINESTRING (174.95483725861 -40.984916473179, 174.95483725861 -40.984916473179, 174.9548219058 -40.9849156073, 174.95476672181 -40.984948697296, 174.95478433911 -40.985022097289, 174.95483671398 -40.985030747487, 174.95484820506 -40.985041731572, 174.95486050905 -40.985034420445, 174.95487294023 -40.985033344092, 174.95480633963 -40.985044279263, 174.95486641296 -40.985050219033, 174.95483067075 -40.985046664923, 174.95479597203 -40.985055233428, 174.95476505322 -40.985070756149, 174.95477130927 -40.985098045711, 174.95481031085 -40.985114626251, 174.95483478494 -40.985146546129, 174.9548601897 -40.985171528477, 174.95483937673 -40.985202214722, 174.95492908194 -40.9852229151839, 174.95495702891 -40.985248371346, 174.95498620043 -40.985271452743, 174.95498620043 -40.985271452743)
```

Place line using GPX file

Use the line tool to draw your trap line. Double click to finish.