

Importing Data

Import data to R

There are R packages to import all types of data. In this course, we'll cover the most common imports: csvs and Excel workbooks.

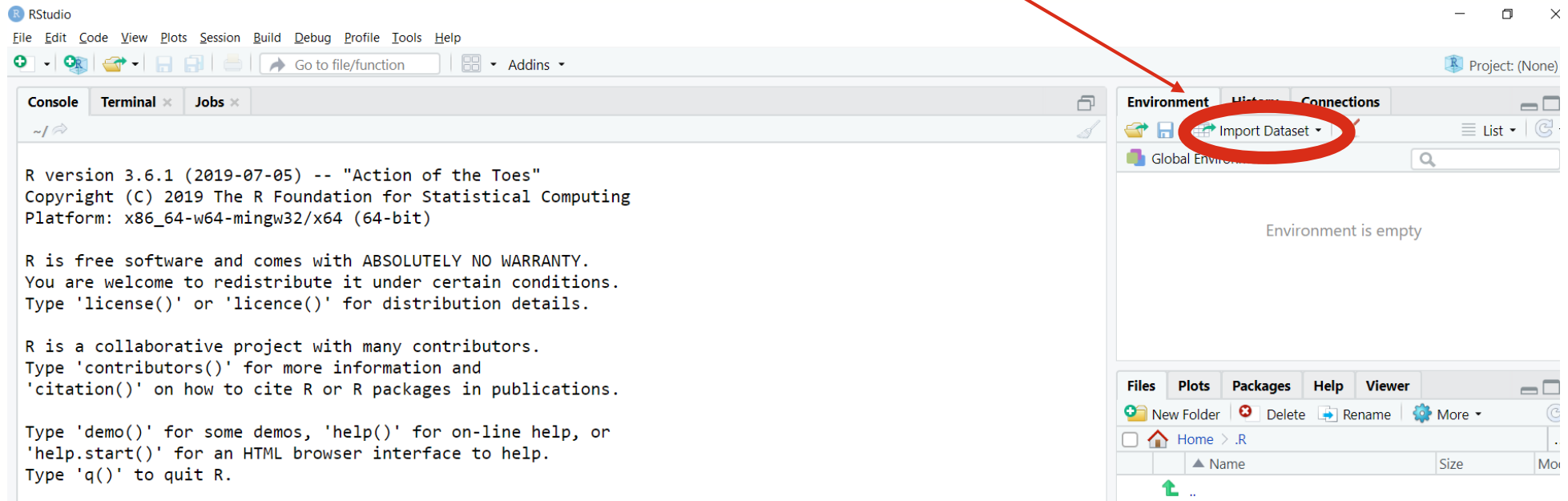
Import data to R

We'd like to import the `capacity_ae.csv` file.

While we could write code from scratch to do this, it's often easier to get the import wizard to do this for you.

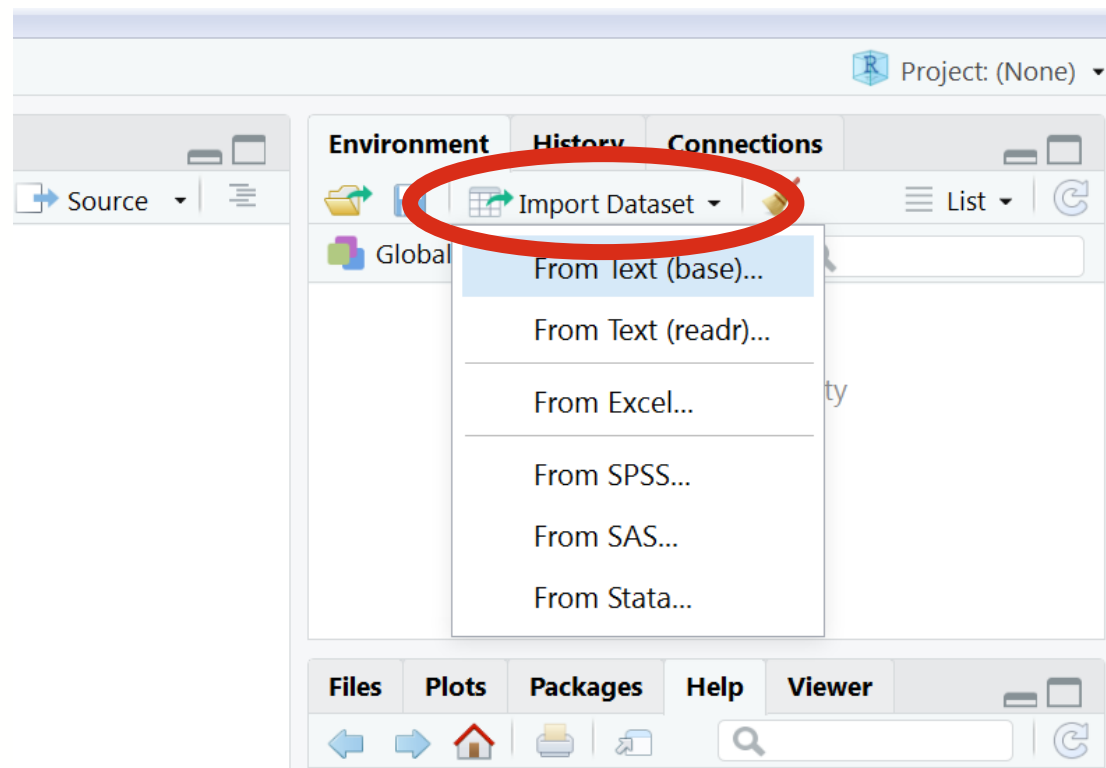
Import data to R

We will use the “Import Dataset” button:



Import data to R

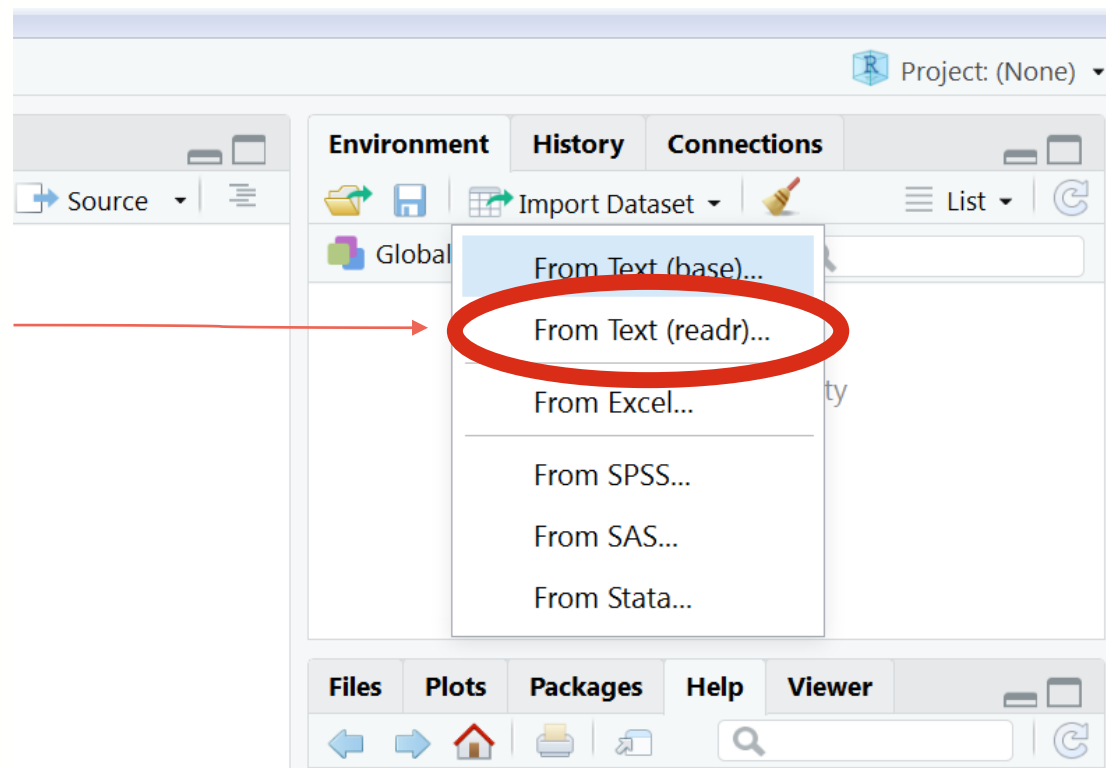
We will use the “Import Dataset” button:



Import data to R

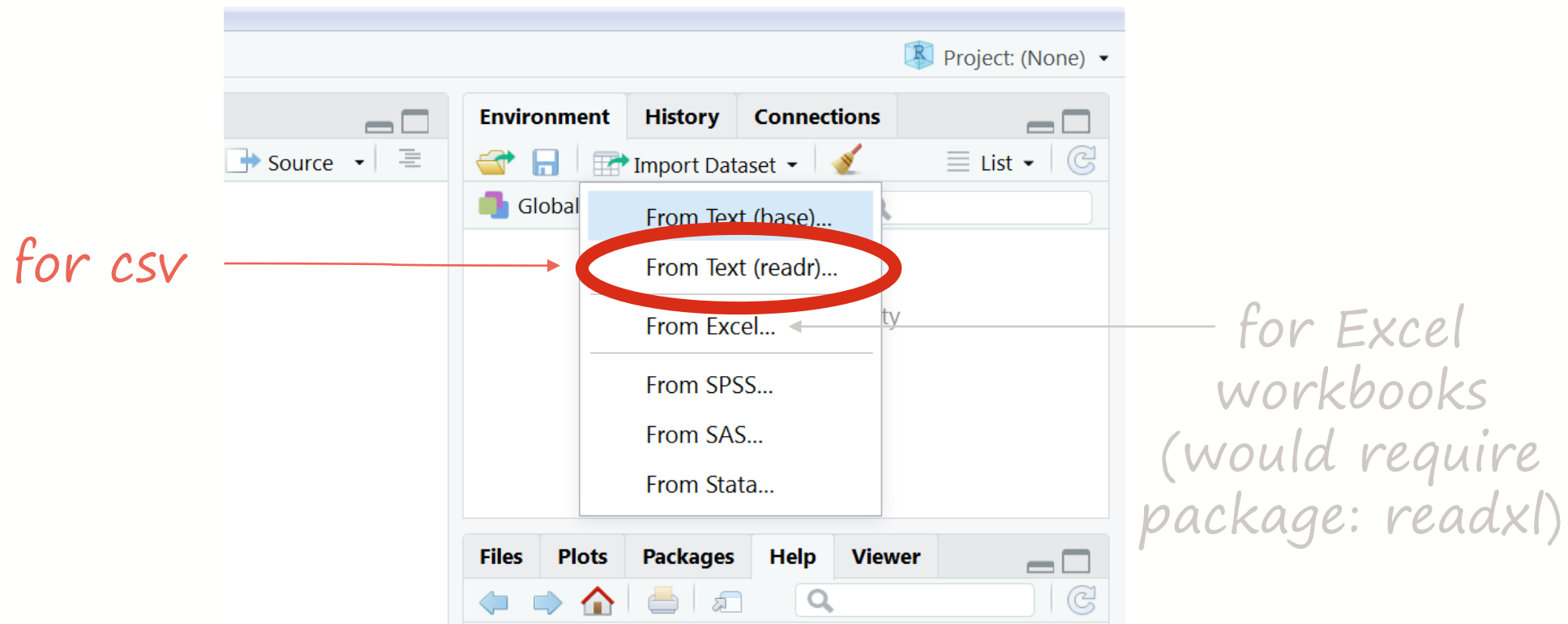
We will use the “Import Dataset” button:

for csv



Import data to R

We will use the “Import Dataset” button:



Import wizard

Import Text Data

File/Url:

C:/2018_projects/workshoppe_nhs_r/data_who_pop.csv

Browse...

Data Preview:

Previewing first 50 entries.

Import Options:

Name: data_who_pop

Skip: 0

☒ First Row as Names

☒ Trim Spaces

☐ Open Data Viewer

Delimiter: Comma

Quotes: Default

Locale: Configure...

Escape: None

Comment: Default

NA: Default

Code Preview:

? Reading rectangular data using readr

Import

Cancel

Import wizard

1. Locate the file

Import Text Data

File/Url:
C:/2018_projects/workshoppe_nhs_r/data_who_pop.csv

Data Preview:

Previewing first 50 entries.

Import Options:

Name: data_who_pop
Skip: 0

☒ First Row as Names
☒ Trim Spaces
☐ Open Data Viewer

Delimiter: Comma
Quotes: Default
Locale: Configure...

Escape: None
Comment: Default
NA: Default

Code Preview:

```
library(readr)  
data_who_pop <- read_csv("data_who_pop.csv")
```

? Reading rectangular data using readr

Import Cancel

Import wizard

1. Locate the file

The screenshot shows the 'Import Text Data' wizard. A red arrow points from the text '1. Locate the file' to the 'Browse...' button, which is circled in red. Another red arrow points from the text '2. Does the preview look reasonable? (i.e. dimensions and column names)' to the 'Data Preview' table. The table has 5 columns: 'site', 'attendance2018', 'staff_increase', 'dcubicles', and 'dwait'. The first row of data shows values: 1, 81600, TRUE, 50, and -59.9099710. Below the table, it says 'Previewing first 50 entries.' At the bottom, the 'Import Options' section shows 'Name: capacity_ae', 'Skip: 0', and several checked options like 'First Row as Names' and 'Trim Spaces'. The 'Code Preview' section shows R code for reading the CSV file. At the bottom right are 'Import' and 'Cancel' buttons.

Import Text Data

File/URL:

C:/Users/andrew.jones/OneDrive - Midlands and Lancashire CSU/2019_projects/0815_r_workshop2.0/capacity_ae.csv

Browse...

Data Preview:

site (double)	attendance2018 (double)	staff_increase (logical)	dcubicles (double)	dwait (double)
1	81600	TRUE	50	-59.9099710
2	114600	FALSE	49	-32.7917577
3	83400	FALSE	47	3.3928326
4	80600	FALSE	47	-22.1249381
5	106000	FALSE	45	-2.4182774
6	96600	FALSE	42	-40.4817548
7	112200	TRUE	27	2.5409562

Previewing first 50 entries.

Import Options:

Name: capacity_ae

Skip: 0

☒ First Row as Names

☒ Trim Spaces

☒ Open Data Viewer

Delimiter: Comma

Quotes: Default

Locale: Configure...

Escape: None

Comment: Default

NA: Default

Code Preview:

```
library(readr)
capacity_ae <- read_csv("capacity_ae.csv")
View(capacity_ae)
```

Import Cancel

? Reading rectangular data using readr

Import wizard

Import Text Data

File/URL:
C:/Users/andrew.jones/OneDrive - Midlands and Lancashire CSU/2019_projects/0815_r_workshop2.0/capacity_ae.csv Browse...

Data Preview:

site (double)	attendance2018 (double)	staff_increase (logical)	dcubicles (double)	dwait (double)
1	81600	TRUE	50	-59.9099710
2	114600	FALSE	49	-32.7917577
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5	106000	FALSE	45	-2.4182774
6	96600	FALSE	42	-40.4817548
7	112200	TRUE	27	2.5409562

Previewing first 50 entries.

Import Options:

Name: capacity_ae Skip: 0

☒ First Row as Names ☒ Trim Spaces ☒ Open Data Viewer

Delimiter: Comma Escape: None

Quotes: Default Comment: Default

Locale: Configure... NA: Default

Code Preview:

```
library(readr)
capacity_ae <- read_csv("capacity_ae.csv")
View(capacity_ae)
```

NOT what we want

Import Cancel

Import wizard

Import Text Data

File/URL:
C:/Users/andrew.jones/OneDrive - Midlands and Lancashire CSU/2019_projects/0815_r_workshop2.0/capacity_ae.csv Browse...

Data Preview:

site (double)	attendance2018 (double)	staff_increase (logical)	dcubicles (double)	dwait (double)
1	81600	TRUE	50	-59.9099710
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Previewing first 50 entries.

Import Options:

Name: capacity_ae Skip: 0

☒ First Row as Names ☒ Trim Spaces ☒ Open Data Viewer

Delimiter: Comma Quotes: Default Locale: Configure...

Escape: None Comment: Default NA: Default

Code Preview:

```
library(readr)  
capacity_ae <- read_csv("capacity_ae.csv")  
view(capacity_ae)
```

Import Cancel

Instead, we'd like to
copy this line of code
to the editor

...ready for next time
we run the analysis

Import wizard

1. Locate the file

Import Text Data

File/URL:
C:/Users/andrew.jones/OneDrive - Midlands and Lancashire CSU/2019_projects/0815_r_workshop2.0/capacity_ae.csv Browse...

Data Preview:

site (double)	attendance2018 (double)	staff_increase (logical)	dcubicles (double)	dwait (double)
1	81600	TRUE	50	59.9099710
2	114600	FALSE	49	-32.7917577
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6	96600	FALSE	42	-40.4812548
7	112200	TRUE	27	2.5409562

Previewing first 50 entries.

Import Options:

Name: Skip:

☒ First Row as Names ☒ Trim Spaces ☒ Open Data Viewer

Delimiter: Quotes: Locale:

Escape: Comment: NA:

Code Preview:

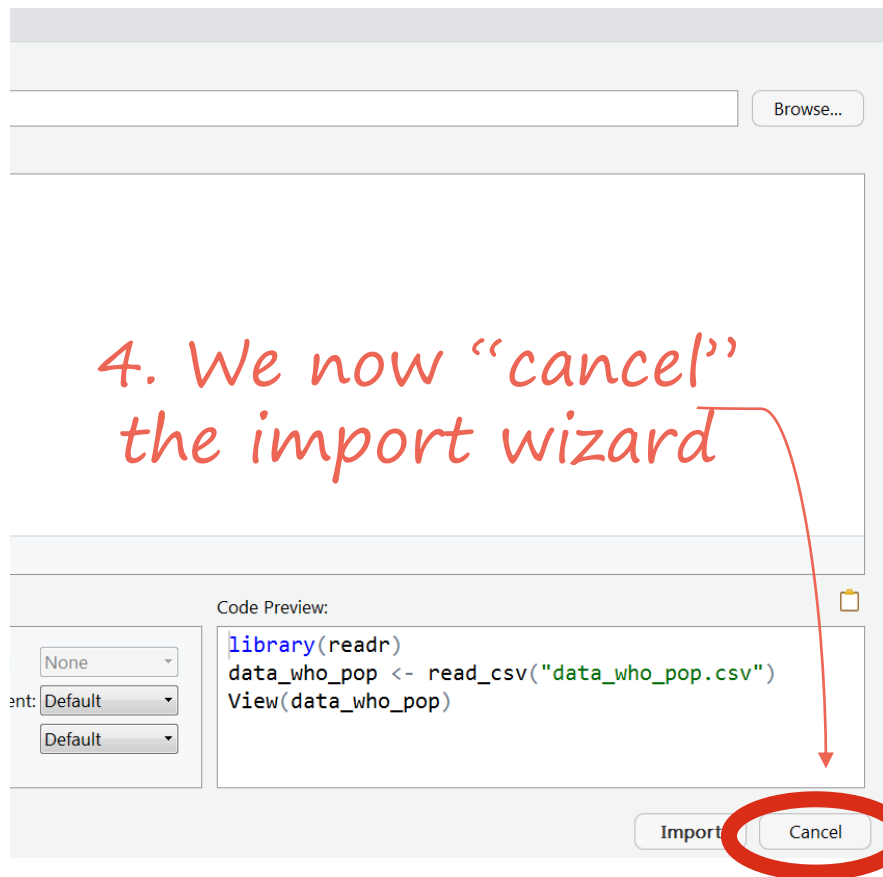
```
library(readr)
capacity_ae <- read_csv("capacity_ae.csv")
View(capacity_ae)
```

Import Cancel

2. Does the preview look reasonable?

3. Highlight this line and copy

Import wizard



6. Finally, run the code from the editor (Ctrl + Enter)

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