

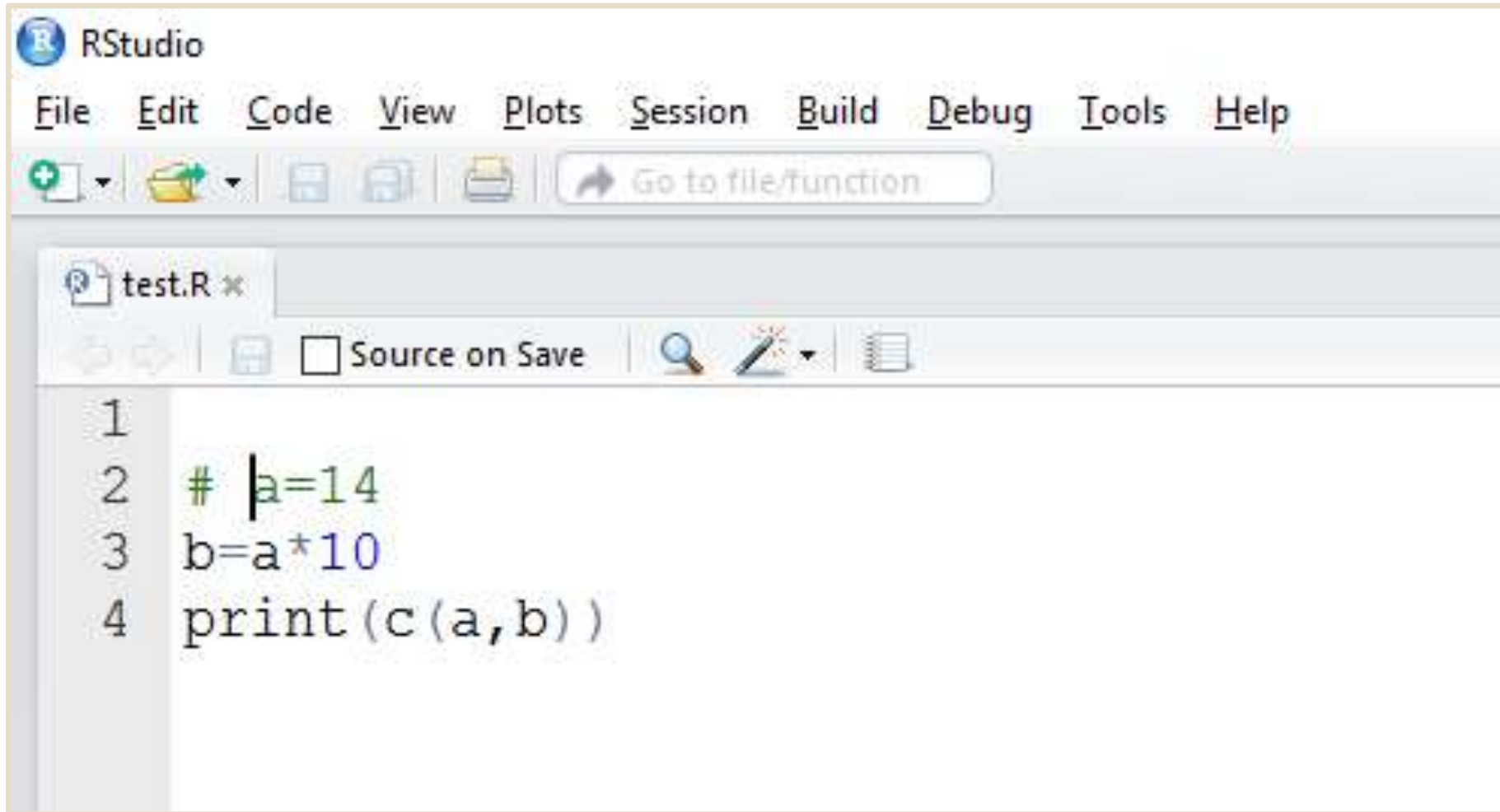
Introduction to R

In this lecture

- How to
 - add comments
 - clear the environment
 - saving the workspace

Add comments –single line

For single line comment, insert '#' at the start of the line



The screenshot shows the RStudio application window. The menu bar includes File, Edit, Code, View, Plots, Session, Build, Debug, Tools, and Help. Below the menu bar is a toolbar with icons for file operations and a search bar labeled 'Go to file/function'. The editor pane shows a script named 'test.R' with four lines of code. Line 2 is being edited, with a green '#' character being inserted at the start of the line, followed by a space and the text 'a=14'. The other lines are 'b=a*10' and 'print(c(a,b))'. A line number margin on the left shows lines 1 through 4.

```
1  
2 # a=14  
3 b=a*10  
4 print(c(a,b))
```

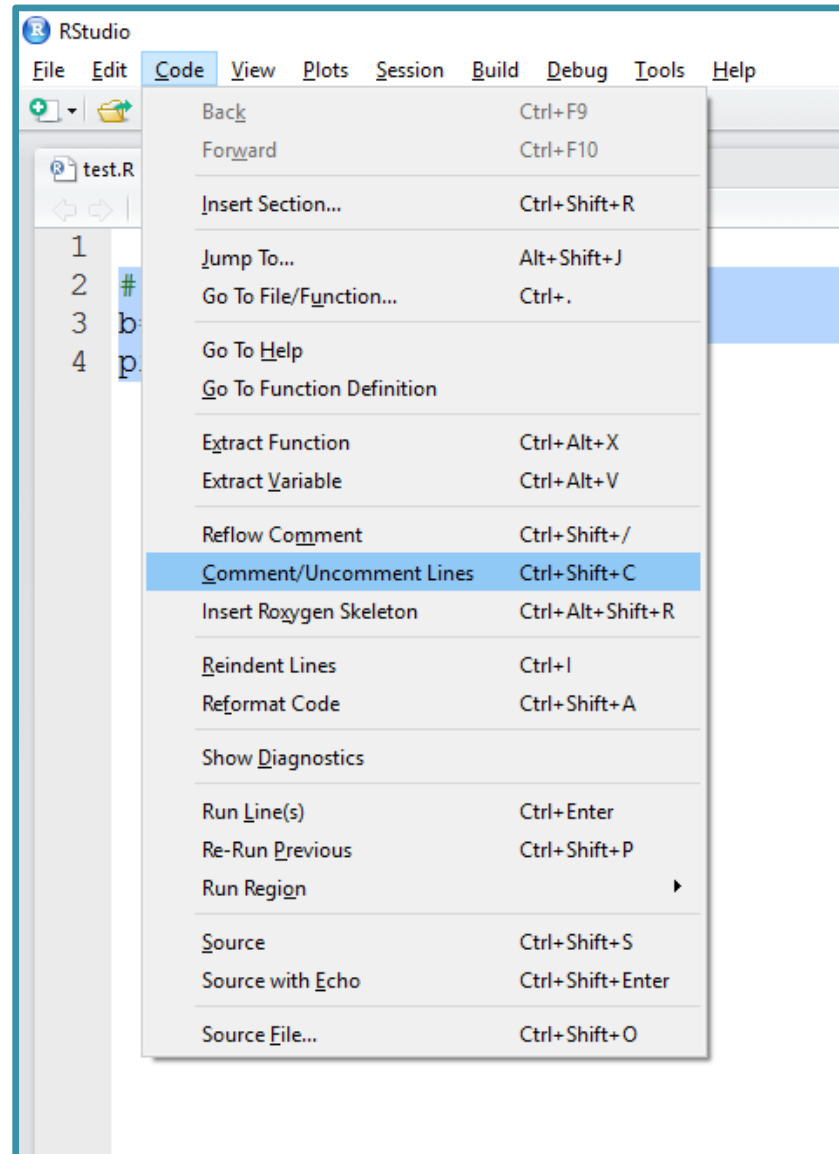
Add comments –Multiple lines

Two ways:

1) Select multiple lines using cursor, then press “Ctrl + Shift + C”

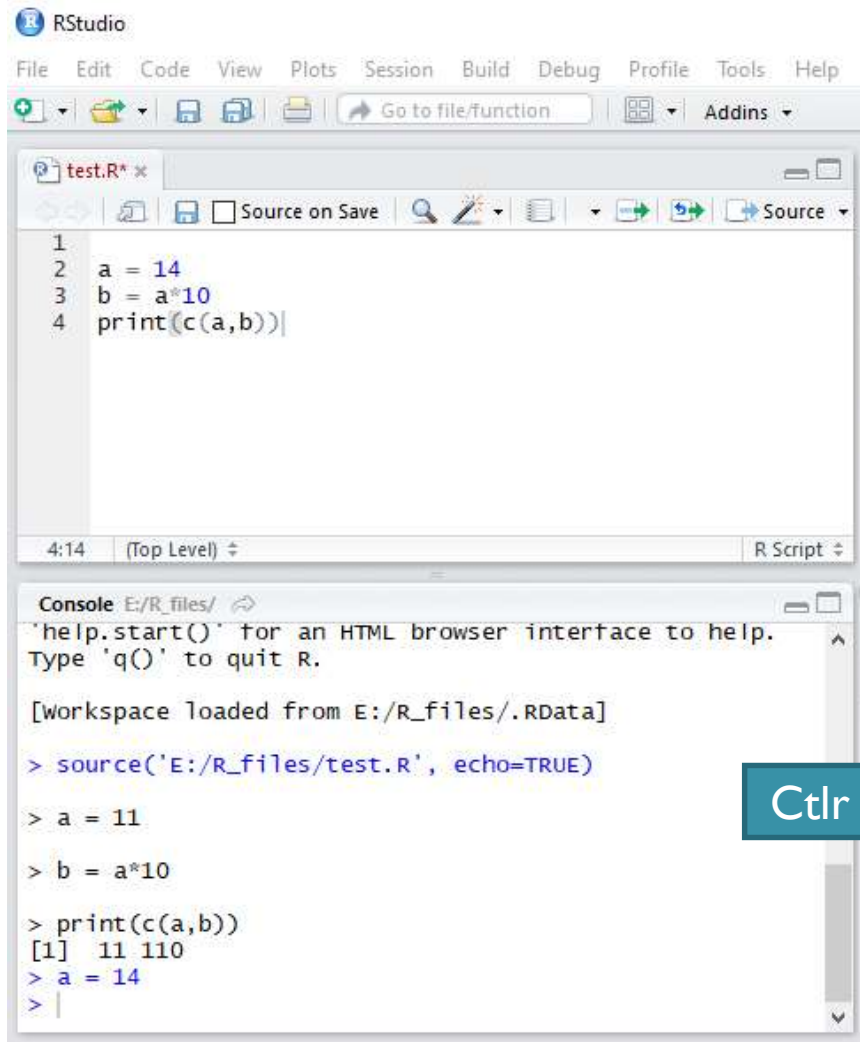
(OR)

2) Select multiple lines using cursor, click on “Code” in menu and select “Comment/Uncomment Lines”



Clear the console

“control +L”



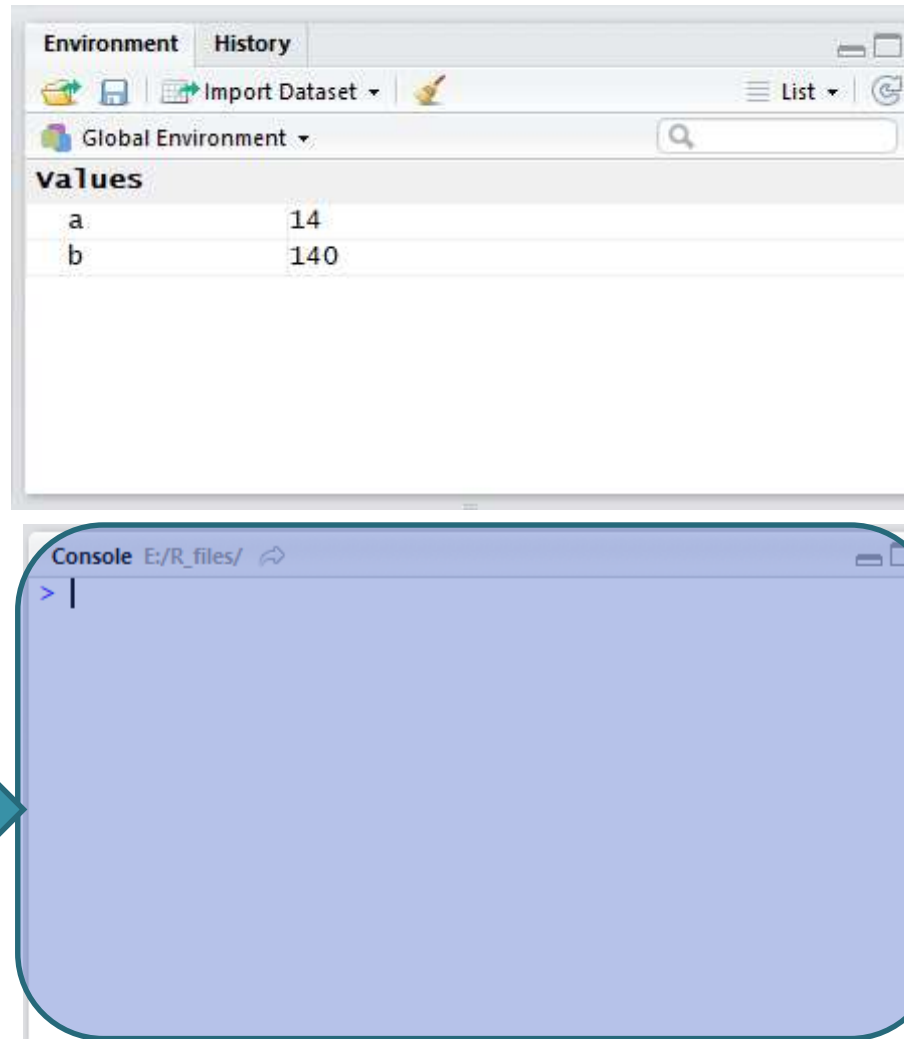
The RStudio interface is shown with a script editor and a console. The script editor contains the following code:

```
1  
2 a = 14  
3 b = a*10  
4 print(c(a,b))
```

The console shows the output of the script execution:

```
'help.start()' for an HTML browser interface to help.  
Type 'q()' to quit R.  
  
[workspace loaded from E:/R_files/.RData]  
> source('E:/R_files/test.R', echo=TRUE)  
> a = 11  
> b = a*10  
> print(c(a,b))  
[1] 11 110  
> a = 14  
>
```

Ctrl + L

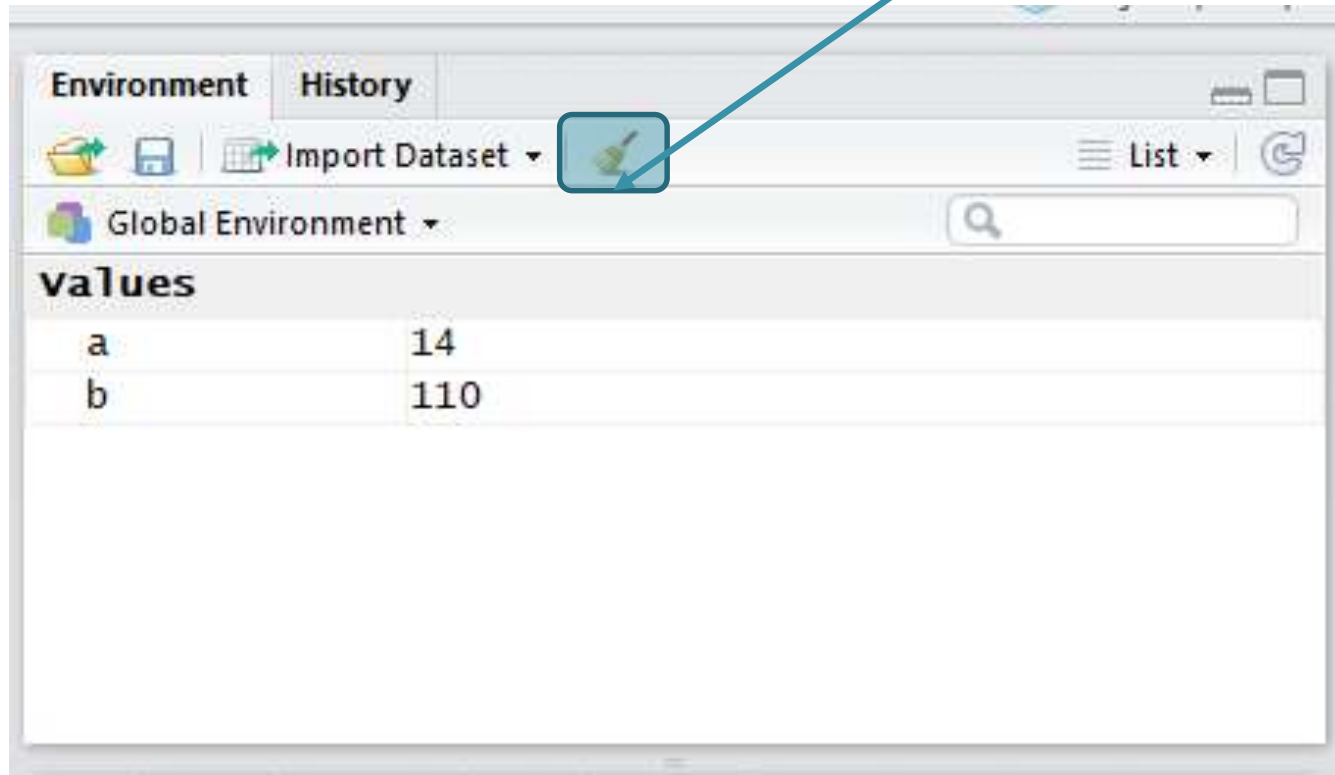


Clear the environment –rm()

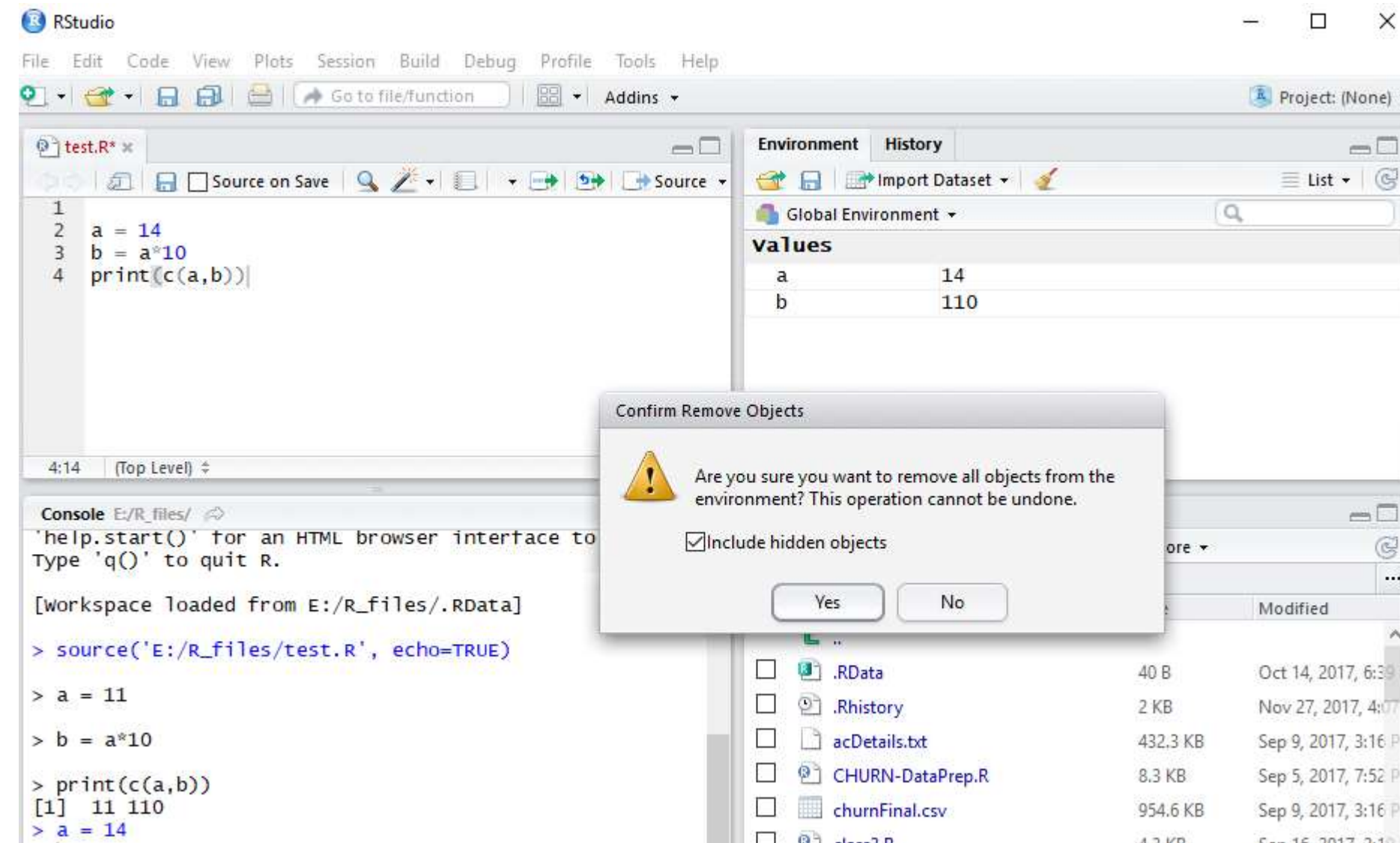
Single variable: Enter in console/R script : `rm(variable)`

All variables: Enter in console/R script : `rm(list=ls())`

OR



Confirmation dialog



Empty environment

The screenshot displays the RStudio interface. The top menu bar includes File, Edit, Code, View, Plots, Session, Build, Debug, Profile, Tools, and Help. Below the menu is a toolbar with icons for file operations and a search bar labeled 'Go to file/function'. The main editor window shows a script named 'test.R' with the following code:

```
1
2 a = 14
3 b = a*10
4 print(c(a,b))
```

The Environment pane on the right shows 'Global Environment' and a message: 'Environment is empty'. The Console pane at the bottom shows the output of the code execution:

```

[workspace loaded from E:/R_files/.RData]
> source('E:/R_files/test.R', echo=TRUE)
> a = 11
> b = a*10
> print(c(a,b))
[1] 11 110
> a = 14
>

```

The Files pane at the bottom right shows the directory 'E:/R_files' with a list of files and folders:

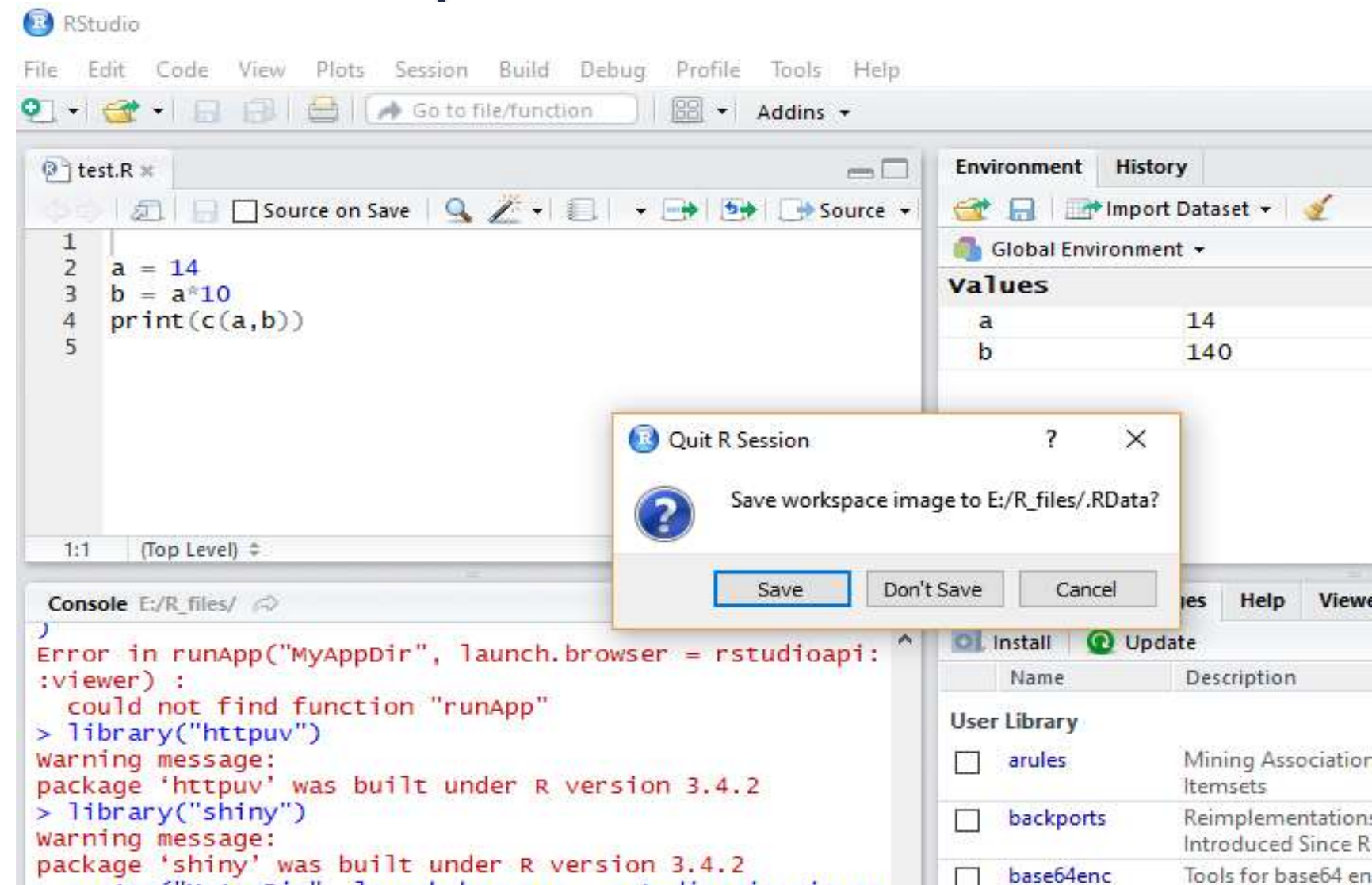
Name	Size	Modified
..		
.RData	40 B	Oct 14, 2017, 6:39 P
.Rhistory	2 KB	Nov 27, 2017, 4:07
acDetails.txt	432.3 KB	Sep 9, 2017, 3:16 P
CHURN-DataPrep.R	8.3 KB	Sep 5, 2017, 7:52 P
churnFinal.csv	954.6 KB	Sep 9, 2017, 3:16 P
class3.R	4.3 KB	Sep 16, 2017, 2:19 P

Saving data from workspace

Workspace data

- Workspace information is temporary
- Is not retained after the session
 - If you close the R-session
 - If you restart the computer

Automatic option



Manual saving

- Can be permanently saved in a file – save command
- Can be reloaded for future sessions – load command

Example code

```
save(a, file="sess1.Rdata") # to save a single variable 'a'
```

```
# to save a full workspace with specified file name
```

```
save(list=ls(all.names=TRUE), file="sess1.Rdata")
```

```
save.image() # short cut function to save whole workspace
```

```
load(file="sess1.Rdata") # to load saved workspace
```