

Chris Beeley : Demo to show widget types, return values and data types in Shiny

- <http://chrisbeeley.net/>
 - <https://gist.github.com/ChrisBeeley/6571951>
-
- Inputs in the Side Panel
 - Inputs and Class of Inputs returned in Table on Main Panel

Widget values and data types

1. checkboxGroupInput

☐ Ice cream

☐ Trifle

☐ Pistachios

2. checkboxInput

☐

3. dateInput

2013-10-28

4. dateRangeInput

2013-10-28 to 2013-10-28

5. numericInput

1

6. radioButtons

☒ Taxi

☐ Take a walk

7. selectInput

News

8. sliderInput

1 7 10

9. textInput

Output and data type

	Value	Class
1		NULL
2	FALSE	logical
3	2013-10-28	Date
4	2013-10-28 2013-10-28	Date
5	1	numeric
6	Taxi	character
7	News	character
8	7	numeric
9		character

Widgets - ui.R (1)

```
library(shiny)

shinyUI(pageWithSidebar(

  headerPanel("Widget values and data types"),

  sidebarPanel(

    checkboxGroupInput(inputId = "checkGroup",
      label = "1. checkboxGroupInput",
      choices = list("Ice cream" = "IC", "Trifle" = "Trifle",
        "Pistachios" = "Pist")),

    checkboxInput(inputId = "boxInput",
      label = "2. checkboxInput"),

    dateInput(inputId = "theDate",
      label = "3. dateInput"),

    dateRangeInput(inputId = "dateRange",
      label = "4. dateRangeInput"),

    numericInput(inputId = "pickNumber",
      label = "5. numericInput",
      min = 1, max = 10, value = 1),

    radioButtons(inputId = "pickRadio",
      label = "6. radioButtons",
      choices = list("Taxi" = "Taxi",
        "Take a walk" = "Walk")),

    selectInput(inputId = "comboBox",
      label = "7. selectInput",
      choices = list("News" = "News",
        "Situation comedy" = "Sitcom",
        "Film" = "Film")),

    sliderInput(inputId = "slider",
      label = "8. sliderInput",
      min = 1, max = 10, value = 7, step = 1),

    textInput(inputId = "comment",
      label = "9. textInput",
      value = "")

  ),

  mainPanel(
    h3("Output and data type"),
    tableOutput("textDisplay")
  )
))
```

ui.R (2)

```
library(shiny)

shinyUI(pageWithSidebar(

  headerPanel("Widget values and data types"),

  sidebarPanel(

    checkboxGroupInput(inputId = "checkGroup",
      label = "1. checkboxGroupInput",
      choices = list("Ice cream" = "IC", "Trifle" = "Trifle",
        "Pistachios" = "Pist")),

    checkboxInput(inputId = "boxInput",
      label = "2. checkboxInput"),

    dateInput(inputId = "theDate",
      label = "3. dateInput"),

    dateRangeInput(inputId = "dateRange",
      label = "4. dateRangeInput"),

    numericInput(inputId = "pickNumber",
      label = "5. numericInput",
      min = 1, max = 10, value = 1),

    radioButtons(inputId = "pickRadio",
      label = "6. radioButtons",
      choices = list("Taxi" = "Taxi",
        "Take a walk" = "Walk")),

    selectInput(inputId = "comboBox",
      label = "7. selectInput",
      choices = list("News" = "News",
        "Situation comedy" = "Sitcom",
        "Film" = "Film")),

    sliderInput(inputId = "slider",
      label = "8. sliderInput",
      min = 1, max = 10, value = 7, step = 1),

    textInput(inputId = "comment",
      label = "9. textInput",
      value = "")

  ),

  mainPanel(
    h3("Output and data type"),
    tableOutput("textDisplay")
  )
))
```

server.R (1)

```
library(shiny)

shinyServer(function(input, output) {

  output$textDisplay <- renderTable({

    getMat = matrix(c(paste(
      #-----#
      #Input 1 and 2
      input$checkGroup, collapse=', '),
      class(input$checkGroup),
      input$boxInput, class(input$boxInput),
      #-----#
      # Input 3 and 4
      as.character(as.Date(input$theDate,
        origin = "1970-01- 01")), class(input$theDate),
      paste(as.character(as.Date(input$dateRange[1],
        origin = "1970-01-01")),
        as.character(as.Date(input$dateRange[2],
          origin = "1970- 01-01")), collapse = ', '),
      class(input$dateRange),
      #-----#
      # Inputs 5 to 9
      input$pickNumber, class(input$pickNumber),
      input$pickRadio, class(input$pickRadio),
      input$comboBox, class(input$comboBox),
      input$slider, class(input$slider),
      input$comment, class(input$comment)
    ), ncol=2, byrow = TRUE)

    colnames(getMat) = c("Value", "Class")

    getMat

  })
})
```

server.R (2)

```
library(shiny)

shinyServer(function(input, output) {

  # renderTable command used to construct output table

  output$textDisplay <- renderTable({

    # Normal R Code - just setting up a "data frame" style matrix

    getMat = matrix(c(paste(-----#
      #Input 1 and 2
      input$checkGroup, collapse=', '),
      class(input$checkGroup),
      input$boxInput, class(input$boxInput),
      -----#
      # Input 3 and 4
      as.character(as.Date(input$theDate,
        origin = "1970-01- 01")), class(input$theDate),
      paste(as.character(as.Date(input$dateRange[1],
        origin = "1970-01-01")),
        as.character(as.Date(input$dateRange[2],
          origin = "1970- 01-01")), collapse = ', '),
      class(input$dateRange),
      -----#
      # Inputs 5 to 9
      input$pickNumber, class(input$pickNumber),
      input$pickRadio, class(input$pickRadio),
      input$comboBox, class(input$comboBox),
      input$slider, class(input$slider),
      input$comment, class(input$comment)
    ), ncol=2, byrow = TRUE)

    colnames(getMat) = c("Value", "Class")

    getMat

  })
})
```

server.R (2)

```
library(shiny)

shinyServer(function(input, output) {

  output$textDisplay <- renderTable({

    getMat = matrix(c(paste(
      input$checkGroup, collapse=', '),
      class(input$checkGroup),
      input$boxInput, class(input$boxInput),

      as.character(as.Date(input$theDate,
        origin = "1970-01- 01")), class(input$theDate),
      paste(as.character(as.Date(input$dateRange[1],
        origin = "1970-01-01")),
        as.character(as.Date(input$dateRange[2],
          origin = "1970- 01-01")), collapse = ', '),
      class(input$dateRange),

      input$pickNumber, class(input$pickNumber),
      input$pickRadio, class(input$pickRadio),

      input$comboBox, class(input$comboBox),
      input$slider, class(input$slider),

      input$comment, class(input$comment)
    ), ncol=2, byrow = TRUE)

    colnames(getMat) = c("Value", "Class")

    getMat

  })
})
```