

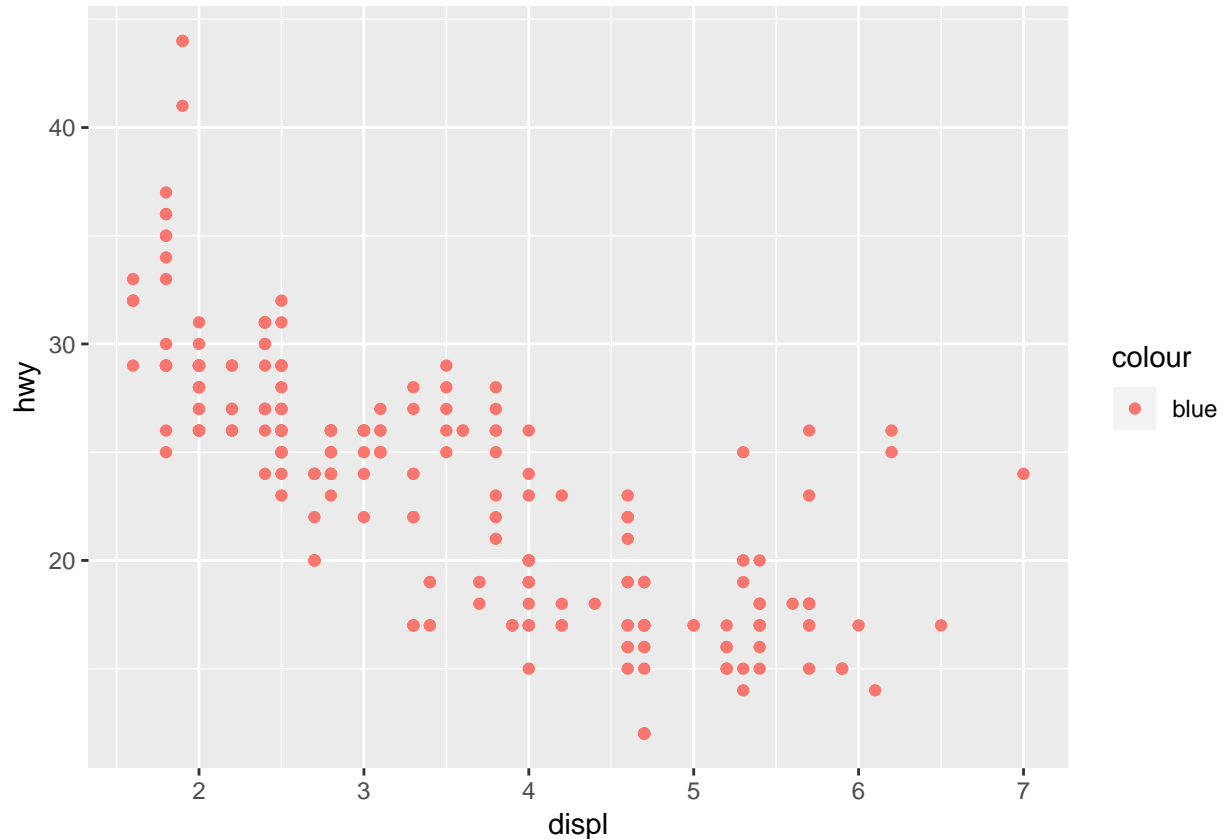
r4ds Ex 3.3.1

MW

2019/05/11

3.2.4

1



If

color="blue" is in aes, then data are regarded to have categorical "blue".

2

```
mpg %>% select_if(is.character) %>% names
```

```
## [1] "manufacturer" "model"      "trans"      "drv"
## [5] "fl"           "class"
```

```
mpg %>% select_if(is.numeric) %>% names
```

```
## [1] "displ" "year"  "cyl"   "cty"   "hwy"
```

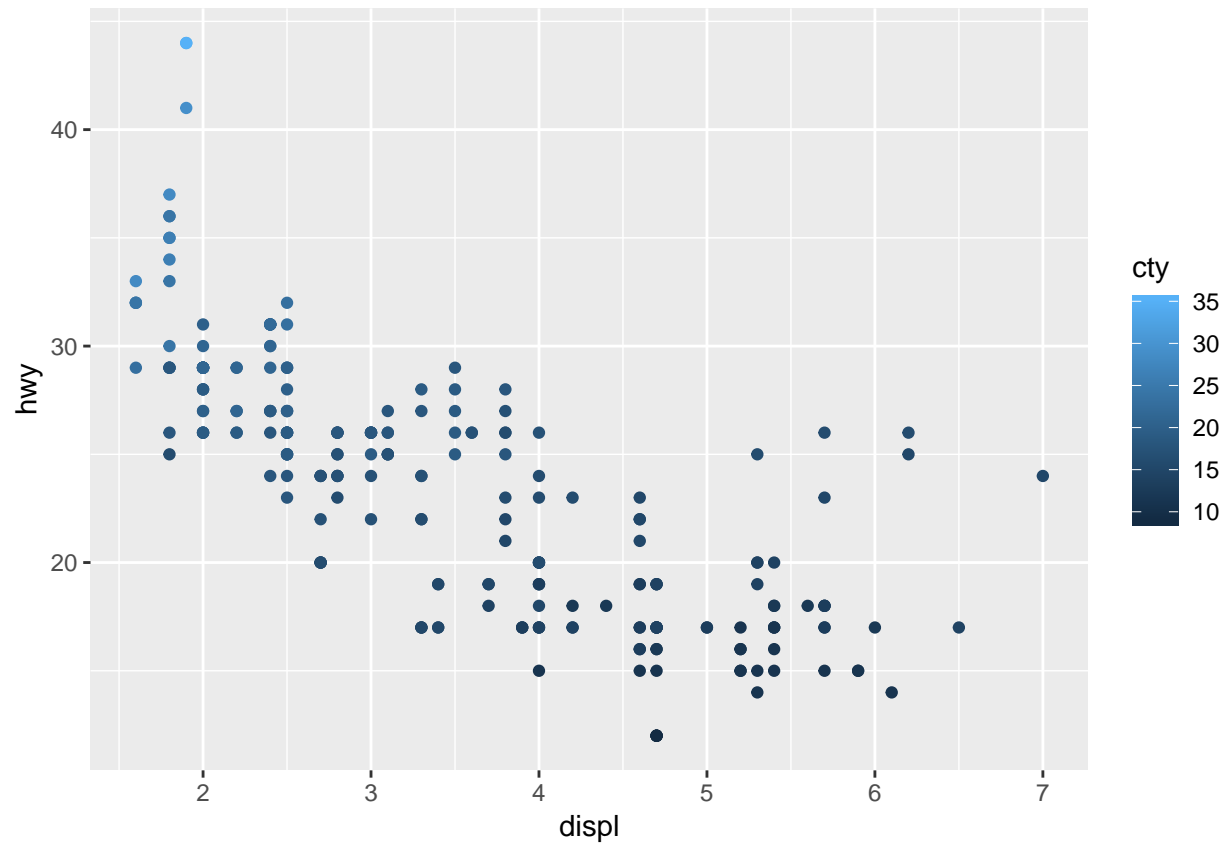
categorical is manufacturer, model, trans, drv, fl, class continuous is displ, year, cyl, cty, hwy

3

e.g., I selected displ, hwy, and cty as well sample code.

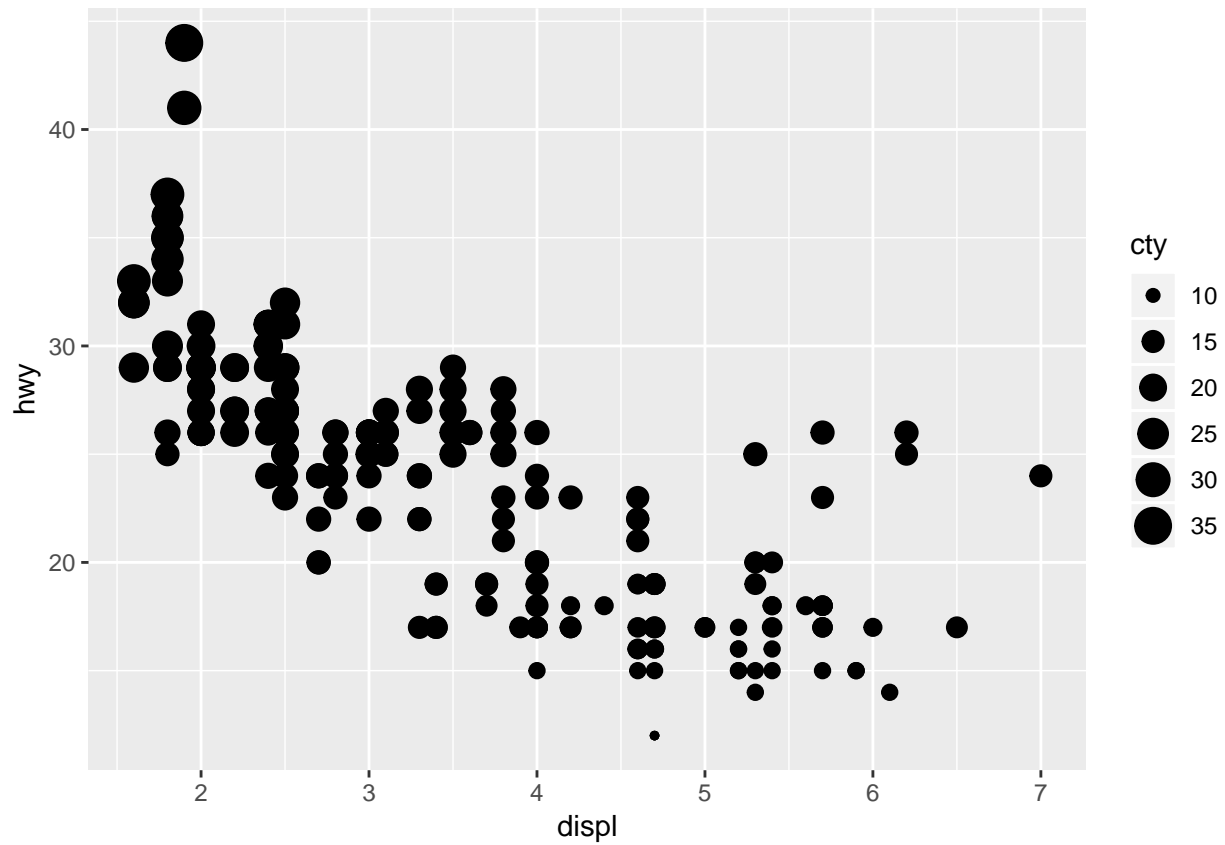
color

```
ggplot(mpg, aes(x=displ, y=hwy, color=cty)) +  
  geom_point()
```



size

```
ggplot(mpg, aes(x=displ, y=hwy, size=cty)) +  
  geom_point()
```

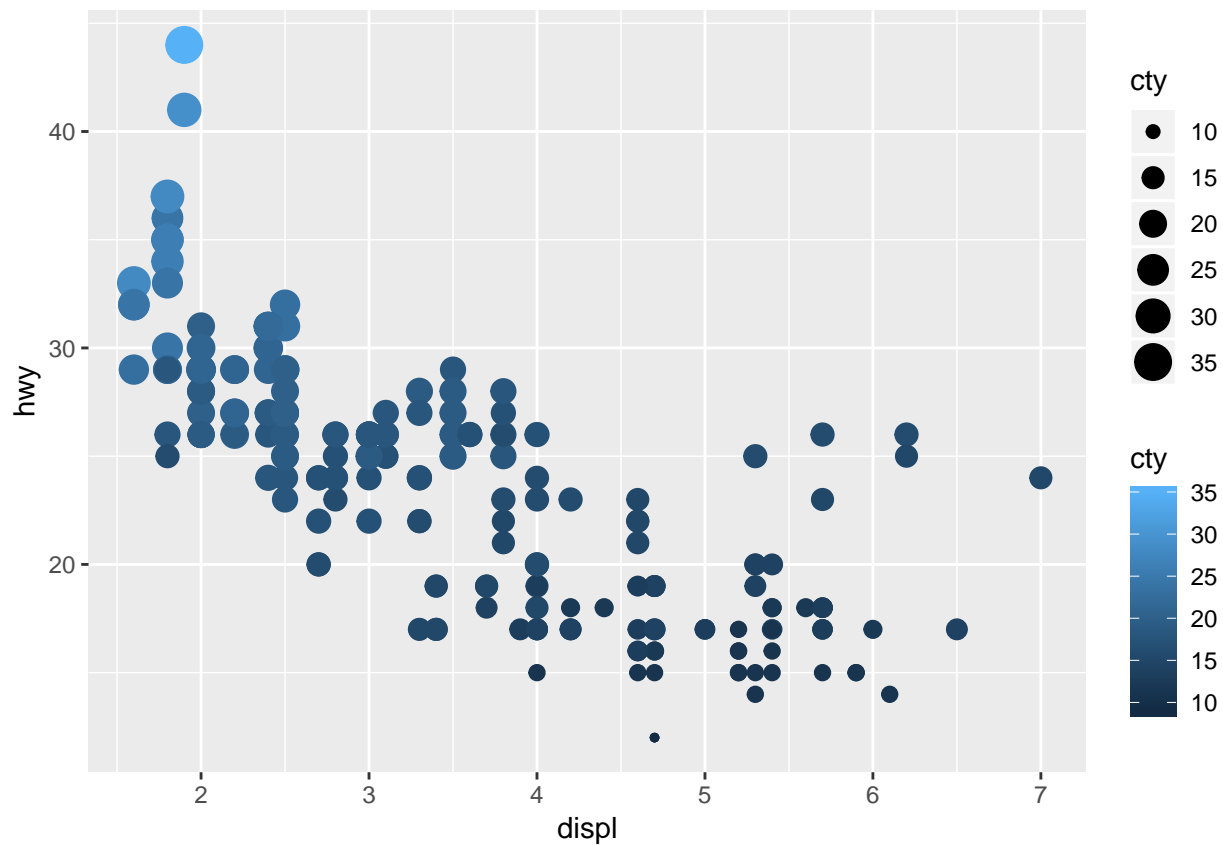


shape

```
ggplot(mpg, aes(x=displ, y=hwy, shape=cty)) +  
  geom_point()  
## error: A continuous variable can not be mapped to shape
```

4

```
ggplot(mpg, aes(x=displ, y=hwy, color=cty, size=cty)) +  
  geom_point()
```



You can run multiple `aes` but it is ineffective.

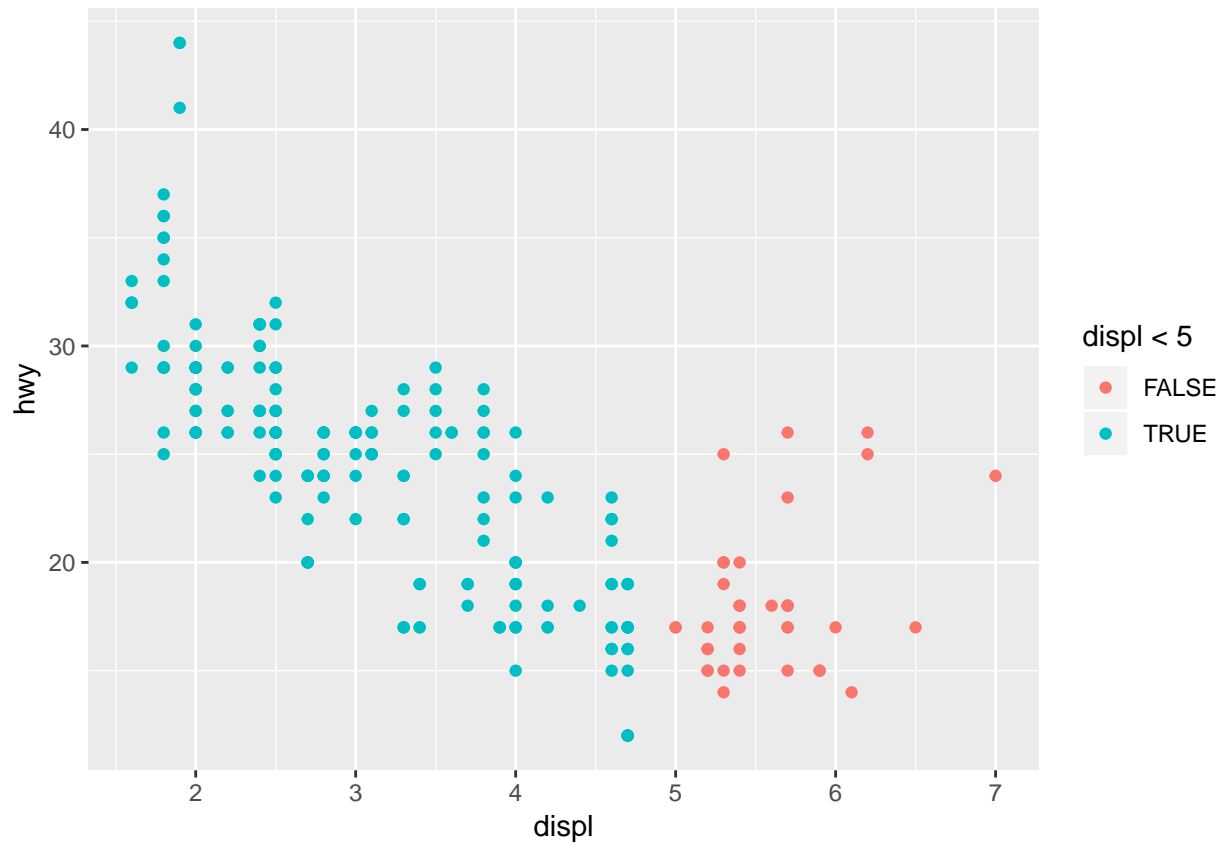
5

```
vignette("ggplot2-specs")
```

Vignette file explain followings; ...the size of the stroke is controlled by `stroke`..

6

```
ggplot(mpg, aes(x=displ, y=hwy, color=displ<5)) +  
  geom_point()
```



You can run above code, like `color=displ<5`. The variables are divided to TRUE or FALSE.