```
> library(dslabs)
> data("heights")
> heights %>%
+ mutate(height = round(height)) %>%
+ group_by(height) %>%
+ summarize(p = mean(sex == "Male")) %>%
+ qplot(height, p, data =.)
> ps <- seq(0, 1, 0.1)
> heights %>%
+ mutate(g = cut(height, quantile(height, ps), include.lowest = TRUE)) %>%
+ group by(g) %>%
+ summarize(p = mean(sex == "Male"), height = mean(height)) %%
+ qplot(height, p, data =.)
> Sigma <- 9*matrix(c(1,0.5,0.5,1), 2, 2)</pre>
> dat <- MASS::mvrnorm(n = 10000, c(69, 69), Sigma) %>%
+ data.frame() %>% setNames(c("x", "y"))
> ps <- seq(0, 1, 0.1)
> dat %>%
+ mutate(g = cut(x, quantile(x, ps), include.lowest = TRUE)) %%
+ group_by(g) %>%
+ summarize(y = mean(y), x = mean(x)) %>%
+ qplot(x, y, data =.)
```