

Homework 6.4

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Exercise 7.21 (a)

```
sigma=.7  
n=16  
mu=476.4  
z1=qnorm(.95,0,1)  
z2=qnorm(.05,0,1)  
mu+z1*sigma/sqrt(16)
```

```
## [1] 476.6878
```

```
mu+z2*sigma/sqrt(16)
```

```
## [1] 476.1122
```

(b)

```
mu+z1*(sigma*sqrt(1+1/n))
```

```
## [1] 477.5868
```

```
mu-z1*(sigma*sqrt(1+1/n))
```

```
## [1] 475.2132
```

(c)

```
z1=qnorm(.975,0,1)  
mu-z1*sigma/sqrt(16)
```

```
## [1] 476.057
```

```
mu+z1*sigma/sqrt(16)
```

```
## [1] 476.743
```