

```
void PromotedCarModelStack::push(string model, int price) {
```

```
//Checks to see if carNameAndPrice vector is empty & creates car, maxModel, & minModel objects to be inserted into their respective vectors
```

```
if (carNameAndPrice.empty()){  
    car = PromotedModel(model, price);  
    maxModel = PromotedModel(model, price);  
    minModel = PromotedModel(model, price);  
  
    carNameAndPrice.push_back(car);  
    highestAndLowestPrice.push_back(maxModel);  
    highestAndLowestPrice.push_back(minModel);  
}
```

$$1+1+1+1+1+1=6$$

```
/*  
 * If passed in price is greater than maxModel's price, create a new PromotedModel car &  
 * replace maxModel with new price  
 *  
 * Input car into carNameAndPrice along with the new price for highestAndLowestPrice  
 */
```

```
if (price > maxModel.getPromotedPrice()){  
    car = PromotedModel(model, price);  
    carNameAndPrice.push_back(car);  
    maxModel = PromotedModel(model, price);  
    highestAndLowestPrice.push_back(maxModel);  
    highestAndLowestPrice.push_back(minModel);  
}
```

$$1+1+1+1+1=5$$

```
/*  
 * If passed in price is less than minModel's price, create a new PromotedModel car &  
 * replace minModel with new price  
 *  
 * Input car into carNameAndPrice along with the new price for highestAndLowestPrice  
 */
```

```
if (price < minModel.getPromotedPrice()){  
    car = PromotedModel(model, price);  
    carNameAndPrice.push_back(car);  
    minModel = PromotedModel(model, price);  
    highestAndLowestPrice.push_back(maxModel);  
    highestAndLowestPrice.push_back(minModel);  
}
```

$$1+1+1+1+1=5$$

```
/*  
 * If the price is not greater or less than the min/maxModel then create PromotedModel car,  
 * input that into carNameAndPrice along with the same min/maxModels into highestAndLowestPrice  
 */
```

```
if (!(price >= maxModel.getPromotedPrice()) && !(price <= minModel.getPromotedPrice())){  
    car = PromotedModel(model, price);  
    carNameAndPrice.push_back(car);  
    highestAndLowestPrice.push_back(maxModel);  
    highestAndLowestPrice.push_back(minModel);  
}
```

$$1+1+1+1=4$$