```
#manage.py
#!/usr/bin/env python
"""Django's command-line utility for administrative tasks."""
import os
import sys
def main():
  """Run administrative tasks."""
  os.environ.setdefault('DJANGO_SETTINGS_MODULE', 'ECom.settings')
  try:
     from django.core.management import execute_from_command_line
  except ImportError as exc:
    raise ImportError(
       "Couldn't import Django. Are you sure it's installed and "
       "available on your PYTHONPATH environment variable? Did you "
       "forget to activate a virtual environment?"
     ) from exc
  execute from command line(sys.argv)
if _name_ == '_main_':
  main()
#admin.py
# Register your models here.
from django.contrib import admin
from .models import *
admin.site.register(Customer)
admin.site.register(Product)
admin.site.register(Order)
admin.site.register(OrderItem)
admin.site.register(ShippingAddress)
#apps.py
from django.apps import AppConfig
class StoreConfig(AppConfig):
  default auto field = 'django.db.models.BigAutoField'
  name = 'store'
from django.db import models
from django.contrib.auth.models import User
```

```
# models.py
# Create your models here.
class Customer(models.Model):
                         models.OneToOneField(User,
                                                                             blank=True,
       user
                 =
                                                             null=True,
on delete=models.CASCADE)
      name = models.CharField(max_length=200, null=True)
      email = models.CharField(max_length=200)
      def _str_(self):
              return self name
class Product(models.Model):
      name = models.CharField(max_length=200)
       price = models.FloatField()
      digital = models.BooleanField(default=False,null=True, blank=True)
      image = models.ImageField(null=True, blank=True)
      def _str_(self):
              return self.name
@property
def imageURL(self):
              try:
                     url = self.image.url
              except:
                     url = "
              return url
class Order(models.Model):
       customer = models.ForeignKey(Customer, on delete=models.SET NULL, null=True,
blank=True)
      date_ordered = models.DateTimeField(auto_now_add=True)
      complete = models.BooleanField(default=False)
      transaction id = models.CharField(max_length=100, null=True)
      def _str_(self):
              return str(self.id)
@property
def get_cart_total(self):
      orderitems=self.orderitem set.all()
      total=sum([item.get total for item in orderitems])
      return total
```

@property

```
def get cart items(self):
       orderitems=self.orderitem_set.all()
       total=sum([item.quantity for item in orderitems])
       return total
class OrderItem(models.Model):
       product = models.ForeignKey(Product, on delete=models.SET NULL, null=True)
       order = models.ForeignKey(Order, on delete=models.SET NULL, null=True)
       quantity = models.IntegerField(default=0, null=True, blank=True)
       date added = models.DateTimeField(auto now add=True)
@property
def get total(self):
       total=self.product.price * self.quantity
       return total
class ShippingAddress(models.Model):
       customer = models.ForeignKey(Customer, on delete=models.SET NULL, null=True)
       order = models.ForeignKey(Order, on delete=models.SET NULL, null=True)
       address = models.CharField(max_length=200, null=False)
       city = models.CharField(max_length=200, null=False)
       state = models.CharField(max_length=200, null=False)
       zipcode = models.CharField(max length=200, null=False)
       date added = models.DateTimeField(auto now add=True)
       def str (self):
              return self.address
#tests.py
from django.test import TestCase
# Create your tests here.
#urls.py
from django.urls import path
from .import views
urlpatterns = [
  path('home/',views.home,name="home"),
  path('store/',views.store,name="store"),
  path('cart/',views.cart,name='cart'),
  path('checkout/',views.checkout,name='checkout'),
  path('signup/', views.signup, name='signup'),
  path('login/', views.login view, name='login')
```

```
path('update item',views.updateItem,name='update item')
]
[9:27 am, 23/11/2023] +91 99237 71062: from django.db import models
from django.contrib.auth.models import User
# Create your models here.
class Customer(models.Model):
                          models.OneToOneField(User,
                                                             null=True.
                                                                             blank=True,
       user
on delete=models.CASCADE)
       name = models.CharField(max_length=200, null=True)
       email = models.CharField(max_length=200)
       def _str_(self):
              return self.name
class Product(models.Model):
       name = models.CharField(max_length=200)
       price = models.FloatField()
       digital = models.BooleanField(default=False,null=True, blank=True)
       image = models.ImageField(null=True, blank=True)
       def _str_(self):
              return self.name
@property
def imageURL(self):
              try:
                     url = self.image.url
              except:
                     url = "
              return url
class Order(models.Model):
       customer = models.ForeignKey(Customer, on_delete=models.SET_NULL, null=True,
blank=True)
       date ordered = models.DateTimeField(auto now add=True)
       complete = models.BooleanField(default=False)
       transaction id = models.CharField(max_length=100, null=True)
       def _str_(self):
              return str(self.id)
```

```
@property
def get cart total(self):
      orderitems=self.orderitem set.all()
      total=sum([item.get_total for item in orderitems])
      return total
@property
def get_cart_items(self):
      orderitems=self.orderitem set.all()
       total=sum([item.quantity for item in orderitems])
       return total
class OrderItem(models.Model):
       product = models.ForeignKey(Product, on delete=models.SET NULL, null=True)
      order = models.ForeignKey(Order, on delete=models.SET NULL, null=True)
      quantity = models.IntegerField(default=0, null=True, blank=True)
      date_added = models.DateTimeField(auto_now_add=True)
@property
def get total(self):
      total=self.product.price * self.quantity
      return total
class ShippingAddress(models.Model):
       customer = models.ForeignKey(Customer, on delete=models.SET NULL, null=True)
      order = models.ForeignKey(Order, on delete=models.SET NULL, null=True)
      address = models.CharField(max length=200, null=False)
       city = models.CharField(max_length=200, null=False)
       state = models.CharField(max_length=200, null=False)
      zipcode = models.CharField(max_length=200, null=False)
      date_added = models.DateTimeField(auto_now_add=True)
       def str (self):
              return self.address
  models.py
[9:27 am, 23/11/2023] +91 99237 71062: from django.test import TestCase
# Create your tests here.
tests.py
[9:27 am, 23/11/2023] +91 99237 71062: urls.py from django.urls import path
from .import views
```

```
urlpatterns = [
  path('home/',views.home,name="home"),
  path('store/',views.store,name="store"),
  path('cart/',views.cart,name='cart'),
  path('checkout/',views.checkout,name='checkout'),
  path('signup/', views.signup, name='signup'),
  path('login/', views.login_view, name='login'),
  path('update item',views.updateItem,name='update item')
]
#views py
from django shortcuts import render, redirect
from django.contrib.auth.forms import UserCreationForm
from django.contrib.auth import login
from django.http import JsonResponse
import json
from django.contrib.auth.forms import AuthenticationForm
from .models import *
# Create your views here.
def home(request):
  return render(request, 'home.html')
def store(request):
  context={}
  customer=request.user.is authenticated
  products=Product.objects.all()
  context={'products':products}
  return render(request, 'store.html',context)
def cart(request):
  if request.user.is authenticated:
     customer=request.user.customer
     order,created=Order.objects.get or create(customer=customer,complete=False)
     items=order.orderitem set.all()
  else:
```

```
items=[]
     order={'get_cart_total':0,'get_cart_items':0}
  context={'items':items,'order':order}
  return render(request,'cart.html',context)
def checkout(request):
  if request user is authenticated:
     customer=request.user.customer
     order,created=Order.objects.get or create(customer=customer,complete=False)
     items=order.orderitem_set.all()
  else:
     items=[]
     order={'get cart total':0,'get cart items':0}
  context={'items':items,'order':order}
  return render(request,'checkout.html',context)
def signup(request):
  if request.method == 'POST':
     form = UserCreationForm(request.POST)
     if form.is valid():
        user = form.save()
       login(request, user)
       return redirect('store') # Redirect to the store page after signup
  else:
     form = UserCreationForm()
  return render(request, 'signup.html', {'form': form})
def login view(request):
  if request.method == 'POST':
     form = AuthenticationForm(data=request.POST)
     if form.is_valid():
       user = form.get_user()
       login(request, user)
       return redirect('store') # Redirect to the dashboard page after login
  else:
     form = AuthenticationForm()
  return render(request, 'login.html', {'form': form})
def updateItem(request):
  data=json.loads(request.data)
```

```
productId=data['productId']
  action=data['action']
  print('action:',action)
  print('productID:',productId)
  customer=request.user.customer
  product=Product.objects.get(id=productId)
  order,created=Order.objects.get or create(customer=customer,complete=False)
  orderItem,created=OrderItem.objects.get_or_create(order=order,product=product)
  if action=='add':
    orderItem.quantity=(orderItem.quantity +1)
  elif action=='remove':
     orderItem.quantity=(orderItem.quantity -1)
  orderItem.save()
  if orderItem.quantity<=0:
     orderItem.delete()
cart.js var updateBtns = document.getElementsByClassName('update-cart')
for (i = 0; i < updateBtns.length; i++) {
       updateBtns[i].addEventListener('click', function(){
              var productId = this.dataset.product
              var action = this.dataset.action
               console.log('productId:', productId, 'action:', action)
    console.log('USER:',user)
    if (user == 'AnonymousUser'){
                      console.log('not logged in')
              }else{
                      updateUserOrder(productId,action)
              }
  })
function updateUserOrder(productId, action){
       console.log('User is authenticated, sending data...')
  var url = '/update_item/'
```

}

```
fetch(url, {
    method:'POST',
    headers:{
        'Content-Type':'application/json',
        'X-CSRFToken':csrftoken,
    },
    body:JSON.stringify({'productId':productId, 'action':action})
})

.then((response) => {
    return response.json();
})
    .then((data) => {
        location.reload()
});
}
```