

Product Checkout System

Description

We are interested in seeing your coding, problem solving and collaboration style. We would like you to build the following system. When you come to meet us for your programming interview, bring along your laptop or files, as you will be pairing with a Till'ster who will work with you on your solution to complete a stretch goal or if its remote pairing, having the solution open during the screen share.

For the purpose of this exercise, TILL is in the process of rewriting its products checkout system for one of its client

Name	Description	Retail Price
Small Pizza	10" pizza for one person	\$269.99
Medium Pizza	12" Pizza for two persons	\$322.99
Large Pizza	15" Pizza for four persons	\$394.99

We have established a number of special pricing rules for a small number of privileged customers:

1. Infosys -Gets a 3 for 2 deal for Small Pizzas
2. Amazon -Gets a discount on Large Pizza where the price drops to \$299.99 per pizza
3. Facebook -Gets a 5 for 4 deal on Medium Pizza-Gets a discount on Large Pizza where the price drops to \$389.99 per pizza

These details are regularly renegotiated, so we need the pricing rules to be as flexible as possible as they can change in the future with little notice.

The interface to our checkout module looks like this pseudo code:

```
Checkout co = new Checkout(pricingRules)
co.add(item1)
co.add(item2)
co.total()
```

Example Scenarios

Case #1

Customer: default

Items:

1. Small Pizza x1
2. Medium Pizza x1
3. Large Pizza x1

Output: Total \$987.97

Case #2

Customer: Infosys

Items:

1. Small Pizza x3
2. Large Pizza x1

Output: Total \$934.97

Case #3

Customer: Amazon

Items:

1. Medium Pizza x3
2. Large Pizza x1

Output: Total \$1294.96

Tips

We value work-life balance and do not want you to lose a weekend trying to solve this problem. Only spend enough time required to produce an appropriate, clean, testable and maintainable solution to the stated problem.

You should focus on the core logic (checkout module) implementation only. Keep it simple.

Please bring your laptop to the interview, or let us know beforehand if you would like us to provide one. Good luck, have fun with it, and we look forward to meeting you soon!