**IPO chart:**

|  |  |  |
| --- | --- | --- |
| Input: | Processing: | Output: |
| Text file containing item information, quantity, and price. | Initialize variables to track the total extended price (totalExtendedPrice), count of orders (orderCount), and average order (averageOrder).  Open and read the data from the input file.  Read and process each item, quantity, and price from the file:  a. Extract the item name as 'item'.  b. Extract the quantity as 'quantity' (integer).  c. Extract the price as 'price' (floating-point).  d. Calculate the extended price as 'extendedPrice' (quantity \* price).  e. Display item, quantity, price, and extended price for each order.  f. Update the total extended price and order count.  Calculate the average order by dividing the total extended price by the order count. | For each order, display the item, quantity, price, and extended price.  After processing all orders, display the total extended prices (totalExtendedPrice), count of orders (orderCount), and average order (averageOrder). |

**Code:**

totalExtendedPrice = 0

orderCount = 0

with open("order\_data.txt", "r") as file:

lines = file.readlines()

i = 0

while i < len(lines):

item = lines[i].strip()

quantity = int(lines[i + 1].strip())

price = float(lines[i + 2].strip())

extendedPrice = quantity \* price

print(f"Item: {item}")

print(f"Quantity: {quantity}")

print(f"Price: ${price:,.2f}")

print(f"Extended Price: ${extendedPrice:,.2f}")

print()

totalExtendedPrice += extendedPrice

orderCount += 1

i += 3

averageOrder = totalExtendedPrice / orderCount

print(f"Total Extended Prices: ${totalExtendedPrice:,.2f}")

print(f"Number of Orders: {orderCount}")

print(f"Average Order: ${averageOrder:,.2f}")

print(f"Total Bonuses Paid Out: ${totalBonuses:,.2f}")

**File with data:**

Widget

10

50

Hammer

2

10

Saw

4

8