

BUSINESS INTELLIGENCE

ETL Challenge

The company is selling vintage car die-cast models and has a main office at Ortigas, Pasig City. To cater to the Visayas region, they opened a branch in Cebu City. The president of the company wanted to consolidate sales data across their two branches in order to get a view of the sales performance of the entire company. Their main branch is computerized and uses a MySQL database. Their Cebu branch however is still using Excel sheets to keep their data.

What is your objective?

1. To consolidate the data from Ortigas and Cebu branch by designing an ETL transformation that will integrate both data.
2. To generate a report in Excel where the president can easily see the sales and income performance per product, per product line. Sales performance should show their actual sales, the markups and discounts they provided. Income performance should show their actual income from sales, deducting their purchase price (buyPrice) and a 10% management expense from the sales amount. The final integrated report should look like the table below:

| Year | Month | Product Line | Product | Total Quantity Sold | Sales | Discounts | Markups | Expenses | Income | Losses |
|------|-------|--------------|---------|---------------------|-------|-----------|---------|----------|--------|--------|
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What they found about the data

1. In-process, On-Hold and cancelled orders cannot be considered sales
2. Sales are computed and considered if it has been shipped, not when the items are ordered.
3. Cebu is adding 50% on the price to cover for expenses as shipping and handling
4. Ortigas is adding 10% on the price to cover for expenses as shipping and handling
5. Prices used to sell products are not consistent from the MSRP. Prices that are below the MSRP means that they sold the products at discount, and prices that are above the MSRP means they sold the products at markup.
6. The quantity ordered that is entered in the records is actual quantity ordered. But it is a practice in the company that for every quantity ordered, they actually add 2% in the quantity to cover for potential losses. The amount incurred for this over-quantity is not part of sales of the company but of expenses.
7. Handling costs is computed as 5 pesos per day that the goods are stored in their warehouse before it gets shipped.