**Facts**

Procurement is a critical business practice. It deals with buying raw materials or products at a cost-effective price so at resale the products make a profit. A few ways this can be accomplished is reducing the number of suppliers and negotiating agreement with them. Procurement also deal with purchase orders (PO’s), receipt tracking, and authorizing payments.

Common analytical requirements include:

1. Products most frequently used
2. How many vendors that supply products
3. Price
4. Opportunities for negotiation with vendors
5. Are employees maverick selling or are they following company policies
6. Is there a contract price difference
7. How well are vendors performing

**Concepts**

* There is a flurry of procurement transactions
  + Purchase requisitions
  + PO’s
  + Shipping notifications
  + Receipts
  + Payments
* Design fact table with grain of 1 row per procurement transaction with transaction date, product date, contract terms, procurement transaction types as dimensions
* Many procurement processes are specific to specific area of the process, but make little sense elsewhere
  + The decision must be made to make a blended transaction fact table or separate fact table for each process
  + To determine what fact table to use consider:
    - What are the analytical requirements
    - Are there multiple unique business processes
    - Are multiple source systems capturing metrics with unique granularities
    - What is the dimensionality of the facts
  + Build a bus matrix to visually represent needs
* Develop a snapshot fact table to compliment the main fact tables
  + Useful for monitoring product movement through pipeline
* Dimensions change slowly over time, and sometimes change tracking is needed
  + Termed slowly changing dimensions, or SCD’s
    - Type 0
      * Retain original dimensions
    - Type 1
      * Overwrite dimensions
    - Type 2
      * Add new row
    - Type 3
      * Add new attribute
    - Type 4
      * Add mini dimensions
  + There are 3 hybrid types as well:
    - Type 5
      * Mini dimension and type 1 outrigger
    - Type 6
      * Add type 1 attribute to type 2 dimension
    - Type 7
      * Dual type 1 and type 2 dimensions

**Summary**

The procurement process is a critical process in businesses. It determines what the prices will be once they ultimately get to the consumer. Companies can’t procure products at a high cost and expect consumers to pay for it, they would go out of business. Instead companies must obtain products at a cost-effective price so that they can give the consumer a better price down the line.