

What is OLAP?

OLAP (Online Analytical Processing) is a technology used for data analysis and reporting. It enables users to interact with multidimensional data, making it easier to extract valuable insights from large datasets. There are several key OLAP operations:

Operations:-

Slice: This operation involves selecting a single dimension from a multidimensional dataset to view a specific "slice" of data. For example, you can view sales data for a particular region and a specific time period.

Dice: Dicing is similar to slicing, but it allows you to select specific values or ranges within multiple dimensions. For instance, you can view sales data for certain products in specific regions during particular time frames.

Pivot (Rotate): Pivoting involves changing the orientation of the data cube by swapping dimensions. It helps in viewing data from different perspectives. For example, you can pivot to view sales data by product category rather than by time.

Drill Down: This operation allows you to explore data at a more granular level by moving from higher-level summaries to lower-level details. For instance, you can drill down from annual sales to quarterly, monthly, and daily sales figures.

Roll Up: Roll-up is the opposite of drill down. It involves aggregating data from a lower level to a higher level. For example, you can roll up daily sales data into monthly or yearly totals.