

Full Self Service Business Intelligence

The next generation of Business Intelligence (BI) applications





One of the top barriers for a customer acquiring a BI solution is the implementation time. The very first BI/Data Warehouse implementations took a considerable amount of time, some lasting for many weeks and up to many months. With this alarming timeframe, many vendors started to promise implementations in just a couple of weeks. Still for many companies, this timeframe is too long and they require applications which can be up and running in a matter of minutes or days.

Now, many vendors are offering BI via a Software as a Service (SaaS) platform, but they are not offering a full self service BI model. Instead they are offering a traditional implementation process with a new license model. This model allows the company to save money because they are only paying for their licenses they are using but because the implementation time is the same, it does not save them money during implementation.

Today, organizations need an application where users can subscribe to a BI solution and within minutes, one can start to monitor and analyze data without having to go through a full blown implementation process. This type of model would be a full self-service BI model where everything is already developed and all required customization would be performed online.

Many vendors are claiming self-service models, but most of them only offer a piece of self service such as end user customization or developing applications remotely, but that is far away from a truly self service BI application.

To understand a full self service BI model, first we need to understand the implementation process and also the user skills required for each process.

BI Implementation process:

- Software Installation
- Metadata
- Repository
- Dashboards/Reports
- ETL
- Training

User Skill level:

- IT user
- End User

Software Installation - a BI project normally requires various software applications and multiple pieces of hardware. An organization may need a dedicated server for the data warehouse and sometimes a dedicated server for the database and a dedicated application server, so we need to install: Operating system, Web server, Database, BI software and configuration for eMail system, security and network.

The metadata is the model definition that contains metrics, dimensions, alarms, business rules, and time periods. All of this information is usually stored in a database.

The repository is where the data is stored. This can be in a star schema or snowflake schema with tables for pre-summarized data, plus fine tuning the database for best performance.

The extract, transformation and loading (ETL) process is the interface to move the data from the transactional systems into the repository. This process can sometimes be very complicated with the majority of time being spent on data transformation and integration..

Finally, dashboards and reports are the way the end users monitor and analyze data. This can be a never ending process as user needs can differ from day to day.

Additional time in a BI project is devoted to training. As there are various roles in a BI project, training can be for developers, project leaders, project managers, sponsors, functional leaders, end users and Executives.

Levels of Self Service BI:

The most basic level of BI is the ability to perform ad-hoc queries or analytics. This option is offered by most of vendors, where the end user may dice and slice on the data and creates additional analysis on the fly.

A second level of self service is the ability for end users to customize dashboards and reports to meet their specific needs. Many vendors claim to support self service BI because end users can customize reports, but this is still a very basic level of self services because a lot of pieces are missing.

Thirdly, remote developing is another level of self service. This is where a company may subscribe to a BI solution but they have to develop everything from scratch and will require traditional training. With this approach, the implementation time is the same compared to a traditional model.

A full self-service BI tool will allow you to subscribe to a BI solution and receive vertical or horizontal models that you can use immediately. Additionally, you should have access to ETL drivers for the ERP system that you are using. This is the only way to get instant BI without relying on IT assistance. As far as training, it should be minimal with easy to access online training videos.



Cross Tab based on Implementation process

	Software Installation	Metadata	Repository	ETL	Dashboards Reports	Data Quality	Training	New Requirements
Ad Hoc Queries	T	T	T	T	T	T	T	SS
End User customization	T	T	T	T	SS	T	T	SS
Remote Development via SaaS	SS	T	T	T	SS	T	T	SS
Full Self Service BI	SS	SS	SS	SS	SS	SS	SS	SS