

Why not directly report against our production data?

The data needed to provide reports, dashboards, analytic applications and ad hoc queries all exists within the set of production applications that support your organization. Why not just use one of the Business Intelligence tools to obtain it directly? Many Business Intelligence pioneers have discovered the hard way that the “direct access” approach simply does not work very well. There is no reason to add the name of your organization to the long list of failures. Some of the many reasons why direct connection to production data almost never works include:

- New releases of application software frequently introduce changes that make it necessary to rewrite and test reports.
- These changes require significant technical resources/expenses.
- Writing reports against production data usually requires significant technical assistance.
- Production field names are often hard to decipher. Some are just meaningless strings of characters.
- Application data is often stored in odd formats.
- Application tables are usually normalized; writing reports against these tables requires many “joins” even for simple reports.
- Tables can be structured to optimize data entry and validation performance, making them hard to use for retrieval and analysis.
- There is no good way to incorporate worthwhile data from other sources into the database of a particular application.
- Developing and storing metadata or metrics is an awkward process without a data warehouse – there is no obvious place to put it.
- Many data fields that users are accustomed to seeing on display screens are not present within the production database, such as rolled-up general ledger balances.
- Priority always needs to be given to transaction processing. Reporting and analysis functions tend to perform poorly when run on the hardware that handles transactions.
- There is a risk that Business Intelligence users might misuse or corrupt the transaction data.
- There are many ways in which Business Intelligence users can inadvertently slow the performance of applications.