In DB2 database, Insert, Delete and Update are real operations you do very often. To access your data, you need to use in SQL either index or Hash function. I am going to give here the top differences between hash and index.

Index vs Hashing

Index

Advantages

1. To create Unique columns, you have to define an index.
2. When you are updating particular column more often, you had better avoid defining an index on that column.
3. You can define Index on multiple columns. The reason is to increase Uniqueness
4. When the size of the table is less than 100 pages, you had better define **one** index.

Disadvantages

1. Adding more columns to index requires more storage. So it degrades performance.
2. Always go for Index-only access. That means give Indexed columns in Where clause

Hashing

Advantages

1. Hashing is faster than an index.
2. Hashing is used to insert or retrieve data.
3. A hash value is generated during processing of Insert values. The same values will be used to retrieve the data.
4. You can define the Hash on the primary key column of the Table.
5. Hashing should be used on the Tables, where data is accessed more often using the Primary key.

Disadvanatages

1. Organizing Table data for hash access is a burden on the database.
2. When you define Hash space, the amount of storage you specfied is not enough, then the data will be relocated to another area. This causes performance degradation.