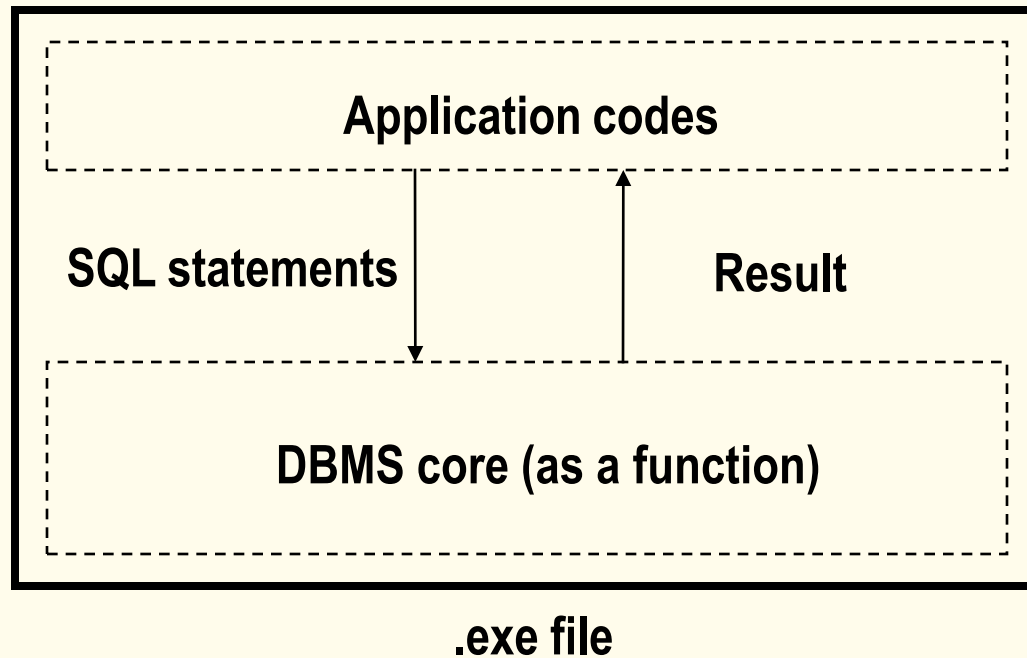




# Single process structure

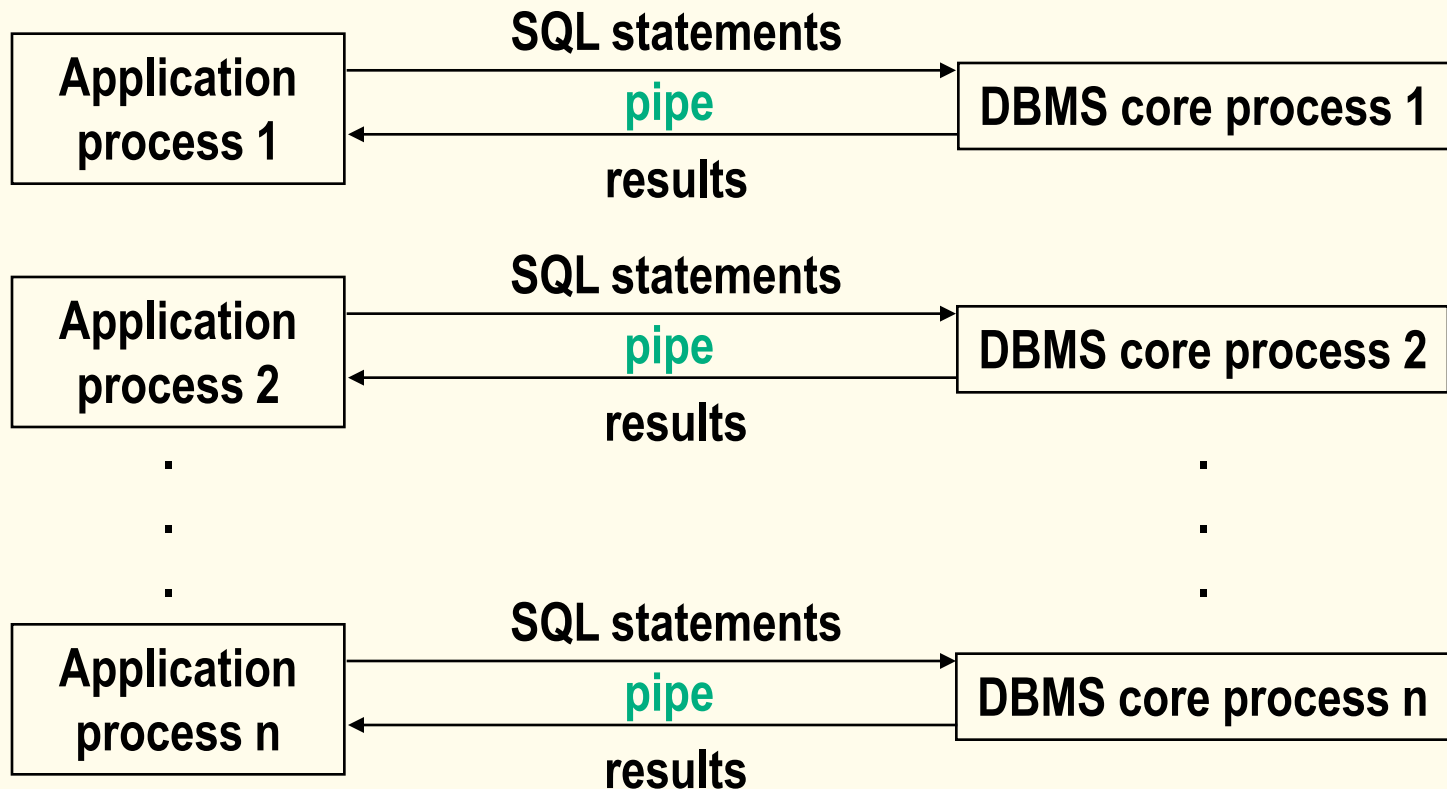
- The application program is compiled with DBMS core as a single .exe file, running as a single process.





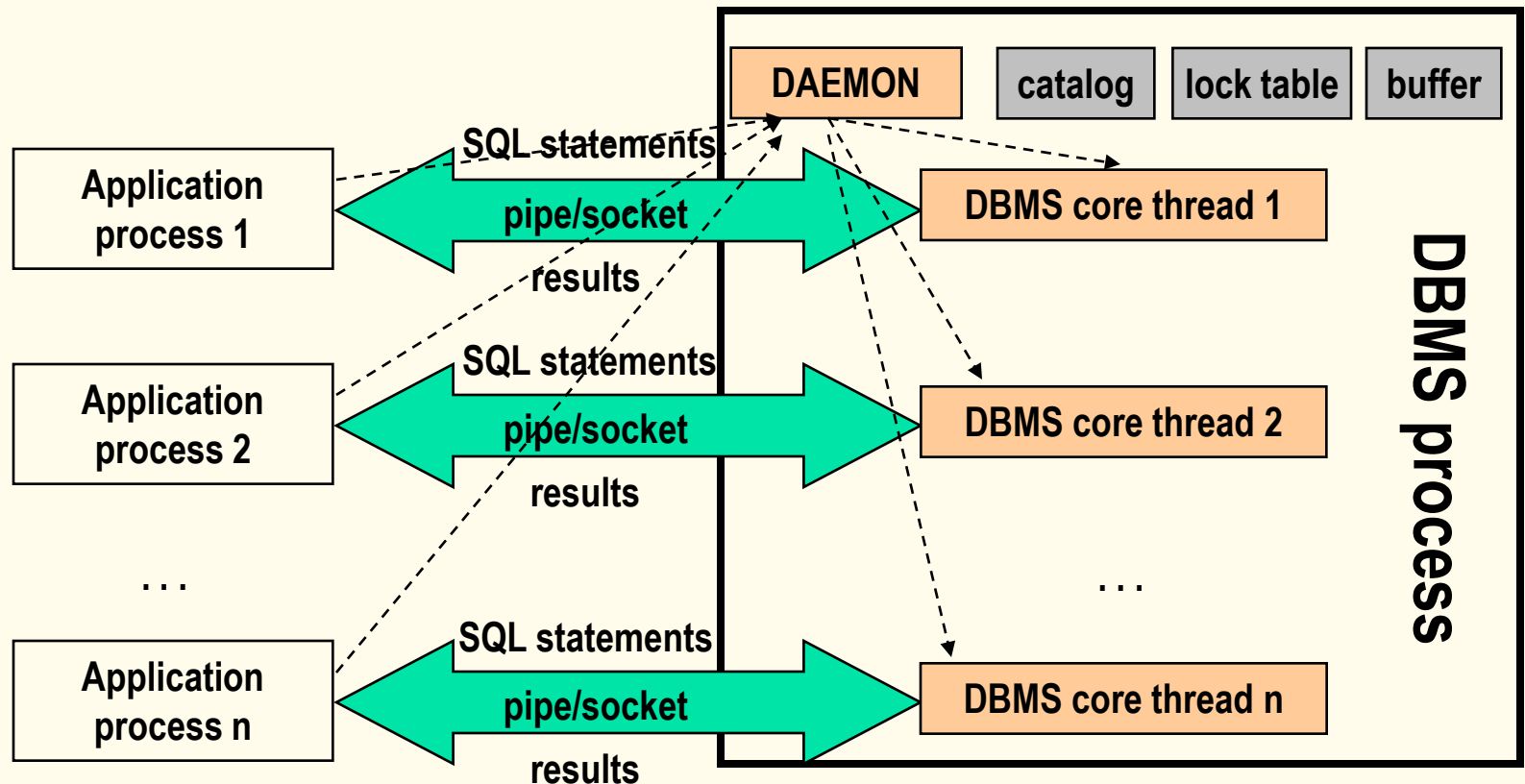
# Multi processes structure

- One application process corresponding to one DBMS core process



# Multi threads structure

- Only one DBMS process, every application process corresponding to a DBMS core thread.





## 4.3 Database Access Management

The access to database is transferred to the operations on files (of OS) eventually. The file structure and access route offered on it will affect the speed of data access directly. It is impossible that one kind of file structure will be effective for all kinds of data access.

- Access types
- File organization
- Index technique
- Access primitives



# Access Types

- Query all or most records of a file ( $>15\%$ )
- Query some special record
- Query some records ( $<15\%$ )
- Scope query
- Update