## benefits of data encapsulation

- protection of implementation (safety): clients cannot directly access encapsulated data
- readability (understandability): clients of interface does not need to know any knowledge as to how the functions that describe the interface use encapsulated information
- **implementation independence**: A change in implementation should not affect the interface seen by the clients of a class. An encapsulated implementation provides the implementor freedom to change it without affecting the interface. i.e. how the clients use the interface is independent of the implementation