

File Management is Orthogonal to Information Hiding

In most C++ code, since

- access rights can be managed explicitly
- all **class definitions** are **globally visible**
- (there's no reason to hide anything).

And **file management** is an orthogonal issue:

- C++ class / module **code**
- can be **organized into files** in any way
- that **suits the needs of the team**.

private Restricts Access to within a Class' Code

C++ offers **three levels of access**:
private, **protected**, and **public**.

private is the default: access is allowed

- **only within the class' functions**:
- member and class functions,
- code in the class definition, and
- friend classes/functions.

private should be **used for most fields, class variables, and implementation functions**.

protected Allows Access within Derived Class' Code

protected extends access to **code within any derived class' functions**.

protected

- can also be **used for fields, class variables, and implementation functions**,
- but **protected**, inlined get/set methods are usually a better choice for fields.

public Allows Arbitrary Access

public removes access control, **allowing any code to use the fields/functions**.

public should generally

- **only** be used **for interface functions**,
- which can include get/set functions for fields.