



COLLEGE OF TECHNOLOGY

Bsc Project

Implementation Guidelines

- Implementation means the process of converting a new or a revised system design into an operational one.
- The other aspects are the post-implementation review and software maintenance. There are three types of implementation:
 1. Implementation of a computer system to replace a manual system.
 2. Implementation of a new computer system to replace an existing one.
 3. Implementation of a modified application to replace an existing one.

Implementation Phase Deliverables

- Installation & Conversion Plans
- Software and hardware installation,
- Data conversion plan, Site & facility remodeling plan
- Training Plan
- Software maintenance plan



Conversion (Installation)



Conversion is the process of moving from old system to new system Conversion of data must be planned

The aim of conversion is to put the tested system into operation

1. Compile a conversion plan

- *Conversion* begins with a review of project plan and system test documentation and implementation plan. The parties involved are:
 - User
 - Project team
 - Programmers
 - Data capture – form filling and checking

2. *Files conversion*: File conversion involves capturing data and creating computerised files from existing files.
 - Data entry staff
 - Staff training
 - Database is prime concern.
3. *Creating test files*: programs should be checked on test data files.

4. *Train Personnel:* Training aids

1. User manual
2. Screen menu
3. Data dictionary
4. Job aids
5. Wall charts

5. *Conversion of physical Facilities:*

- Communication network
- Hardware

6. *Conversion of Administrative procedures*

Conversion methods (approaches)



Parallel Installation

Single Location Installation

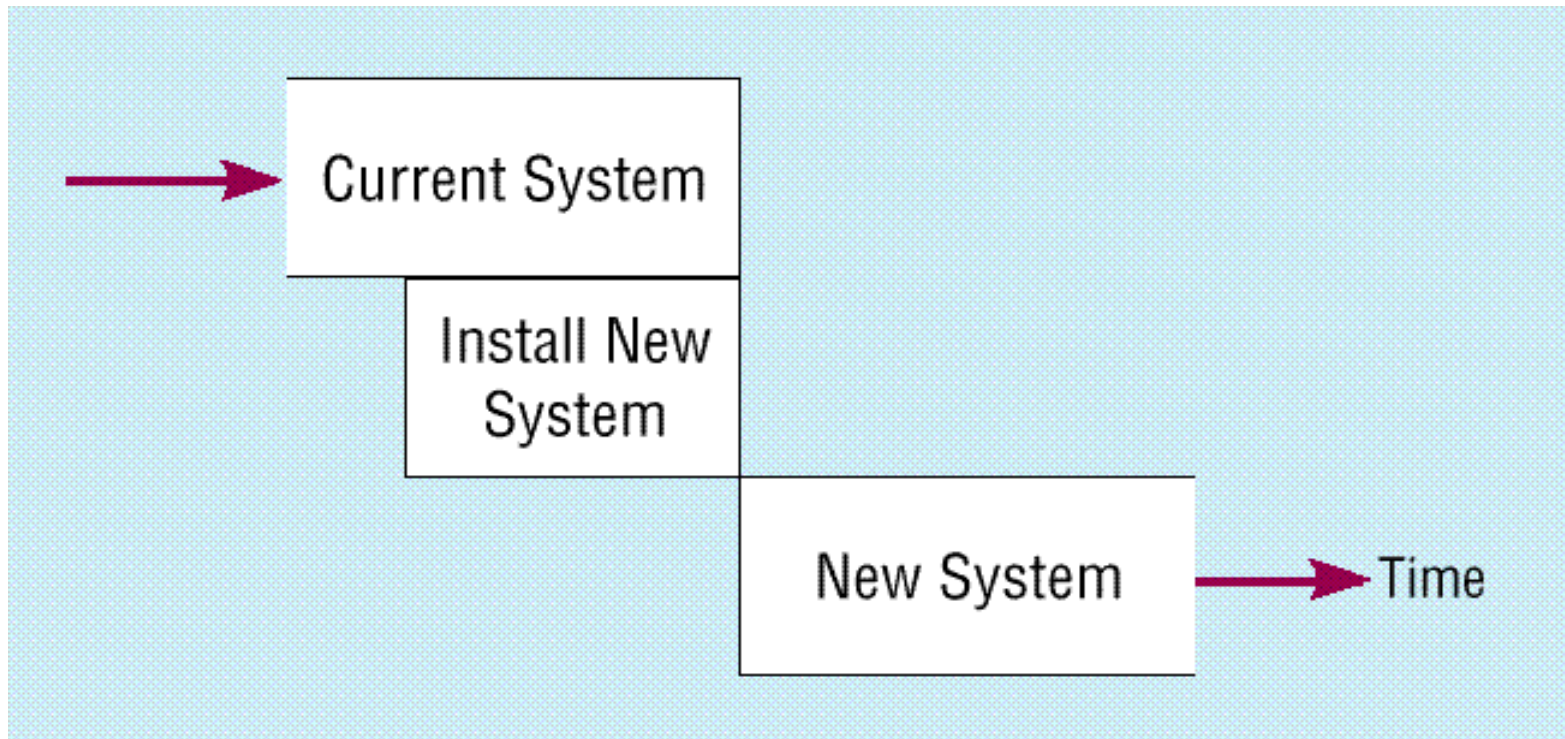
Direct Installation

Phased Installation

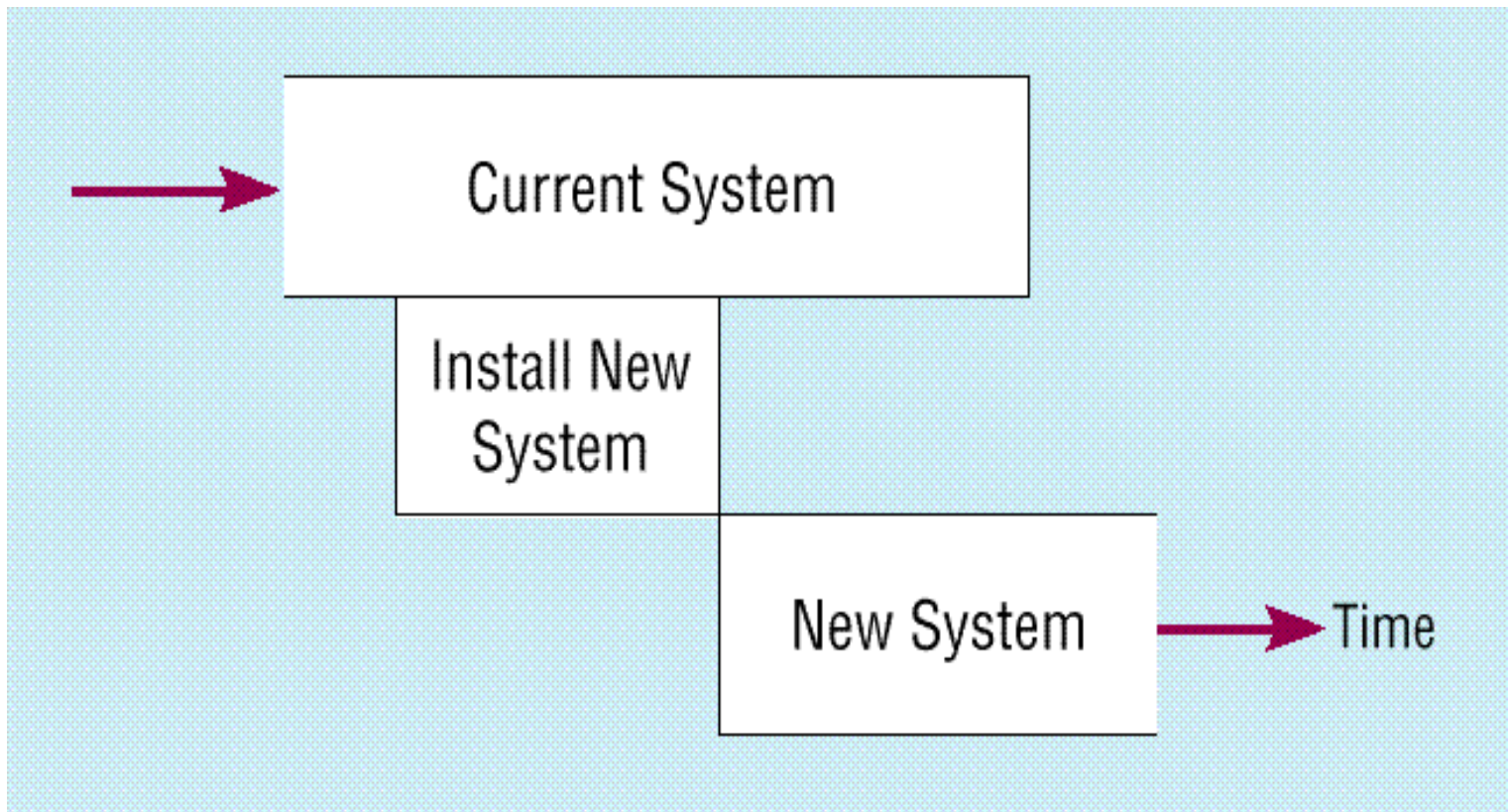
Conversion methods (approaches)

1. Direct Installation: Totally change-over.

The old system is turned off when the new one is turned on such that only new system will be operating.

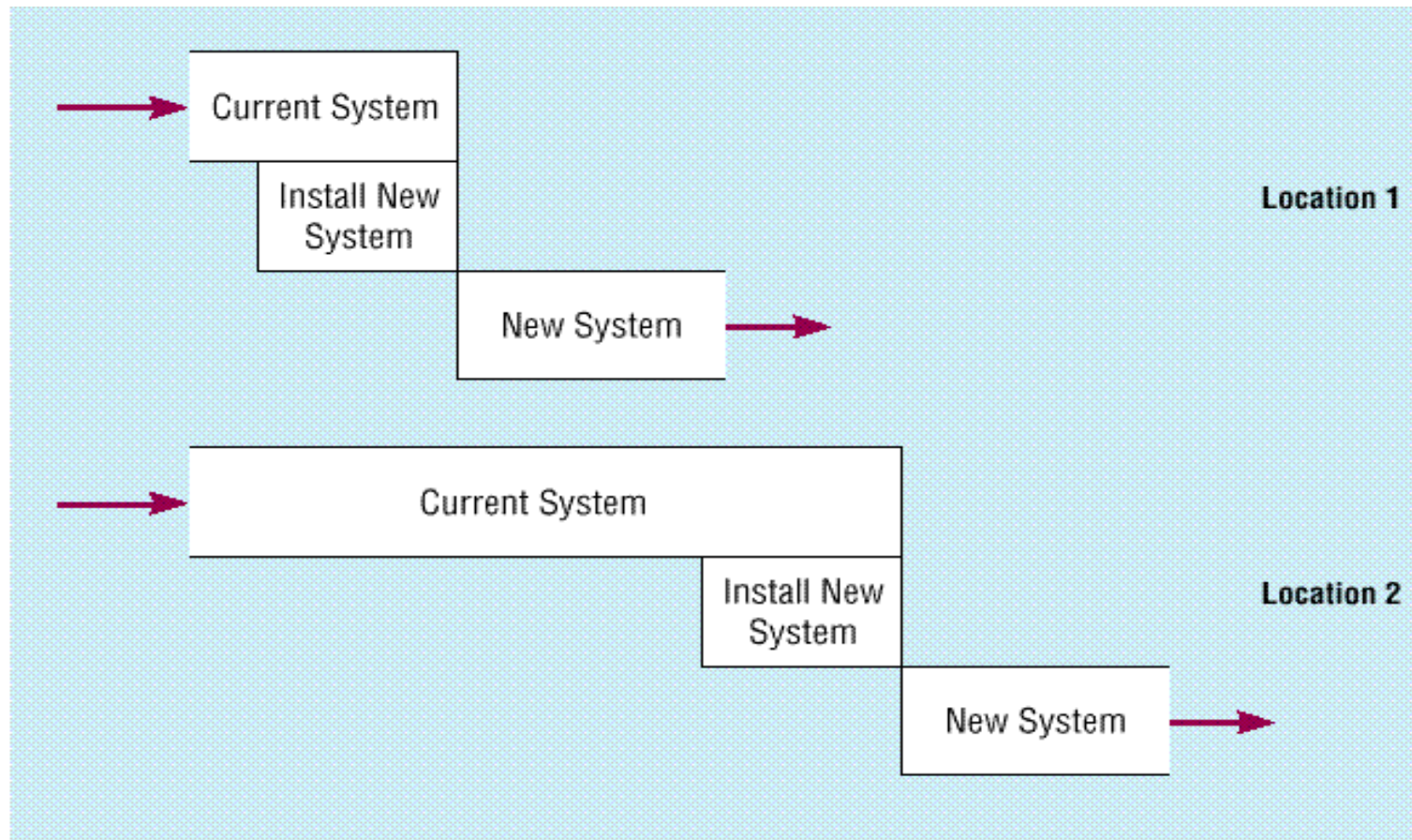


2. Parallel Installation: New and old system will be running together for a specific period of time



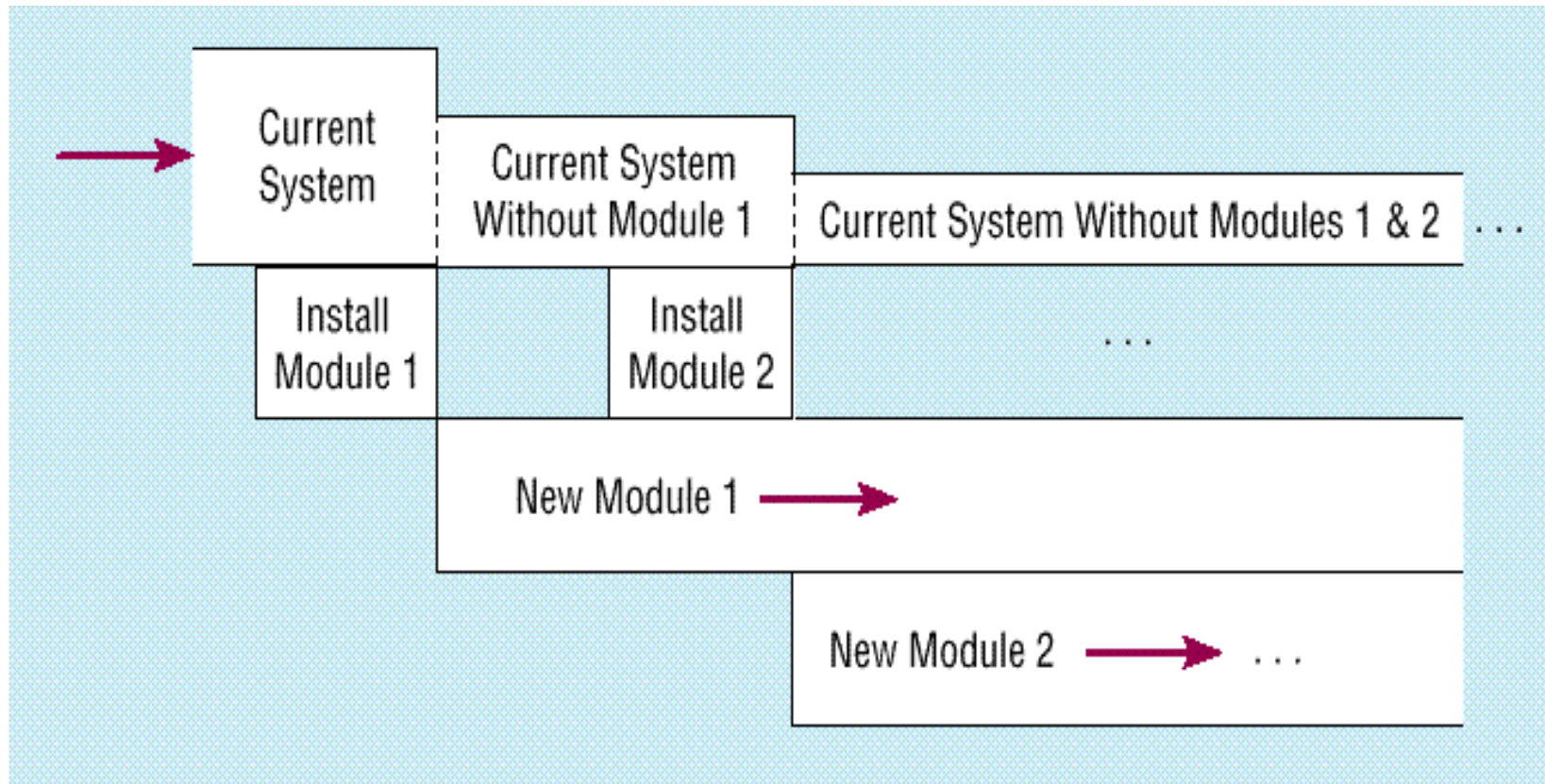
Conversion methods (approaches)

3. Single Location (Pilot) Installation: New information system is installed in one site at time & using the experienced experts to decide how and when the new system should be installed at the other locations/sites of the organization.



Conversion methods (approaches)

4. Phased Installation : One module is installed and tested at a time



- **Training Tools:** Training manual, online help
- **Training Methodologies:**
 - Instructor Led
 - One-on-One
 - User-Led
 - External sources

- ▶ **Resistance to change:** People will resist changes, how they will react:
 - ▶ Hostility: Non-co-operation, fear
 - ▶ Withdrawal from the cause of stress-supervisor going sick
 - ▶ Refusing to accept the computer
 - ▶ Adverse effect on employee's status, job satisfaction
 - ▶ May even sabotage the system
 - ▶ Unable to understand the new system- communication gap

There are several ways to reduce resistance to system change

Identify and discuss the defects in the present system.

Convince them that changeover will improve the quality of work and also it will help them all.

Establish open communication between user and project team.

Invite and use employee participation in all phases of conversion process

- **Software maintenance plan** specifies the following:
- Information Center / Help desk
- Automating support
- Resident expert
- Other things to consider:
 - Providing recovery and backup
 - Disaster recovery
 - PC maintenance

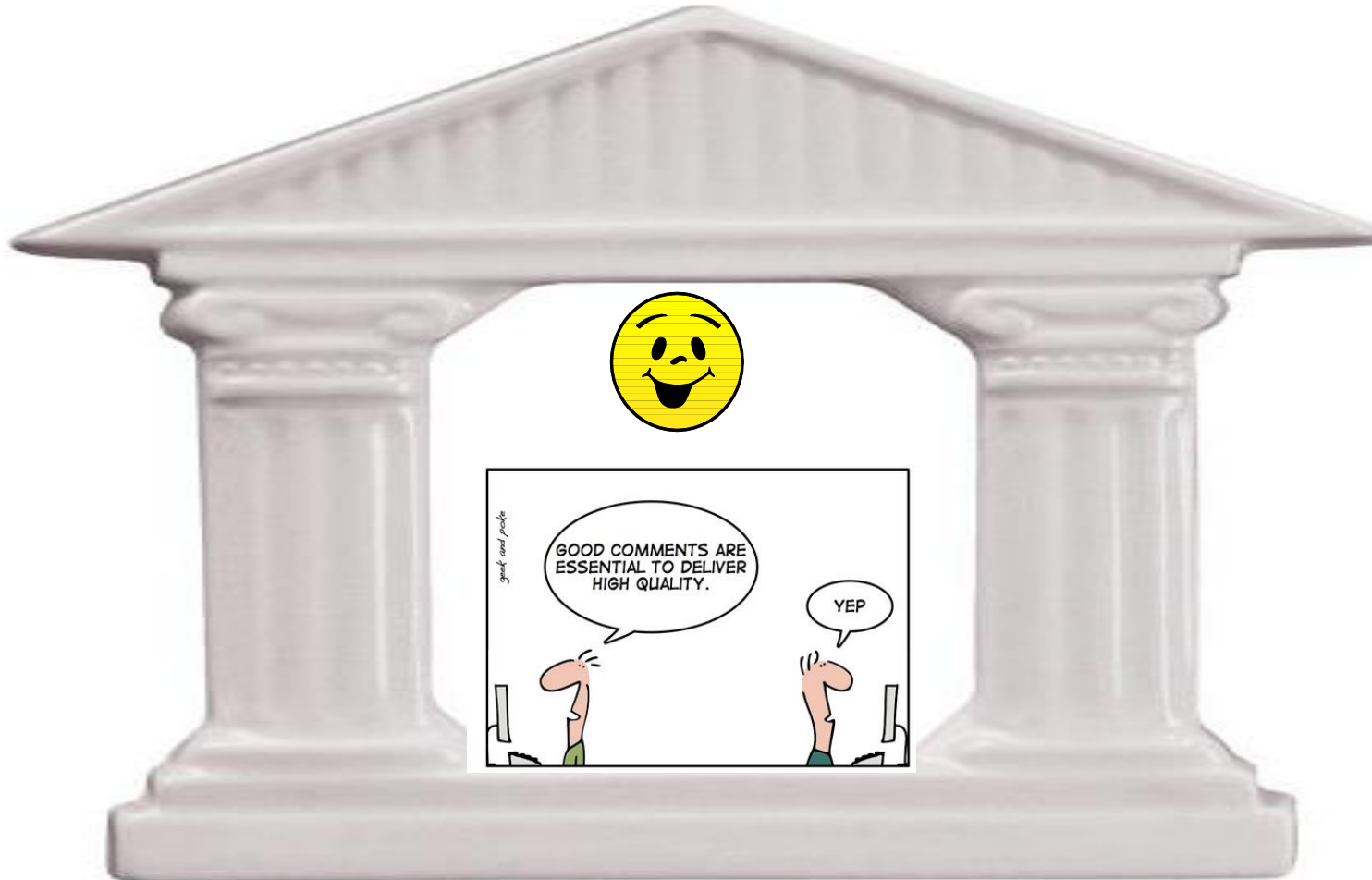
- **Maintenance/Enhancement:** Maintenance can be classified as
 1. *Corrective maintenance:* means repairing processing/ performance failures, making changes because of previously uncorrected problems or false assumptions.
 2. *Adaptive maintenance:* means changing the program functions and changes in hardware and software environment.
 3. *Perfective maintenance:* means enhancing the performance/modifying the program to respond to user's additional or changing needs.
 4. *Enhancement*

- Of these, more time and money is spent on perfective maintenance than corrective/adaptive.
- Maintenance covers a wide range of activities including:
 1. Correcting coding and design errors.
 2. Updating documentation/test data.
 3. Upgrading user support.
 4. Enhancement- adding, modifying or redeveloping the code to support changes.

5. It is necessary to keep up with changing user needs and operational environment.
6. Labor-intensive nature.
7. Reducing maintenance costs- maintenance management audit, software system audit, software modification.
8. Proper Maintenance Plan: makes the software more reliable, improved response time in correcting errors, improved user satisfaction, higher morale among maintenance staff.

- Information Center / Help desk
- Automating support
- Resident expert
- Other things to consider:
 - Providing recovery and backup
 - Disaster recovery
 - PC maintenance

Thank you



End