Overview of Computing and IS ?- Examples: - Inventory management: Using barcode scanners and inventory management software can streamline inventory processes. - A system is a collection of components working together towards a common goal, receiving inputs and transforming them into outputs. Role of the Information Systems Department - The Information Systems Department plays a crucial role in modern organizations by: - Developing, implementing, and maintaining information systems. - Components of computer-based information systems: - Hardware: Physical components such as computers, printers, and storage devices. - Software: Programs that instruct the hardware how to function. Characteristics of Valuable Information - Accurate: Information should be free from errors and reflect reality. - Verifiable: Information should be able to be validated against reliable sources. -Identifying opportunities to improve business processes through technology. - Customer relationship management (CRM): Implementing CRM systems can improve customer service and retention. It requires processing to become meaningful. - Data + Meaning = Information - Knowledge is data and/or information processed to convey understanding and expertise. – When organized and analyzed to determine the tallest student, it becomes information. Computer-Based Information Systems -Computer-based information systems receive input, process it, and generate output. - Processes: Steps or procedures used to transform data into information. - Understandable: Information should be presented in a clear and concise manner. - Providing technical support to users. - Example: - A list of student CGPA scores is data. This is data. ????