

2.5 Figure 2.8 illustrates the basic architecture for a three-tier database system. This system can be viewed as an IPO (input-processing-output) system. What is the input for this system? What environmental element generates the input? (Hint: the Web browser computer is within the system boundary.) What is the expected output from this system? What environmental element receives the output? Briefly describe the processing that takes place in this system.

- The input for this system is the URL that the user enters or the web-page requested by the web-browser.
- The output is the web page brought from the server displayed inside the web browser (if the processes were completed) and the end-user receives that output.
- A web-browser requests a web-page by sending HTTP request to a web server with the order "get" followed by the URL as an input. The web server sends a CGI request to a database server to get the application stored on it, if the request is done successfully the database server returns CGI request to a web server loaded with what is needed to fulfill the request on a form of HTML text and the web server sends it back to your computer (web-browser) and the web-browser displays it on your screen as an output.

2.8 Suppose that you have been hired to develop a website-based sales system for a large international retail sales firm. Discuss some environmental issues that are specific to the Web design of your system that you must consider if your system is to be successful at attracting and keeping purchasing customers.

- The web design should be consistent, convenient, integrated, provide feedback smooth working, and easy to navigate. It should also contain every aspect that concerns the customers such as products detail and the stores available in their range. Designing such a web site can successfully keep customers attracted to the firm, but that can face so much challenge, because doing one thing wrong may become the reason to drive customers away, the designer should be aware of the firm shape and nature of the goods and consumers, in this day and age how can you create an image and deliver it to the consumers with less effort on a wide range? When you realize that you can avoid challenge and issues that come across you.
- Some firms may want to keep it simple and understandable and that may backfire on the web design.