Code No: K0525 **R07** Set No. 1

IV B.Tech. II Semester Regular Examinations, April, 2011
**HUMAN COMPUTER INTERACTION**
**(Computer Science & Engineering)**

Time: 3 Hours                                                    Max Marks: 80
**Answer any FIVE Questions**
**All Questions carry equal marks**
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1. a) Define the user interface in detail. State the importance of good design.
   b) What are the benefits of good design? Explain in detail.                [8+8]

2. a) Give characteristics of intranet Vs internet in detail.
   b) Discuss in detail about the advantages and disadvantages of graphical systems.  [8+8]

3. Explain in detail about the following techniques determining requirements.
   Categorize them as direct or indirect method.                [4x4=16]
   
   a) Traditional focus group
   b) Paper survey or Questionnaire
   c) Competition analysis
   d) System testing.

4. a) How to organize screen elements? Explain in detail.
   b) Discuss how the screen navigation and flow are required for effective user
   interface.                                                    [8+8]

5. a) Discuss in detail about text entry and read only controls in detail.
   b) Describe in detail about organizing windows.              [8+8]

6. a) What is a color? Write about the problems with colors.
   b) Discuss about Writing Sentences and Messages and discuss different kinds
   of messages.                                                 [8+8]

7. Give a brief note about the following and illustrate the following specification methods with suitable examples. [4x4=16]
   a) TCL scripting language
   b) Galaxy
   c) Java script
   d) Transition diagrams

8. a) Explain briefly about the features of different key board layouts.
   b) Explain in detail the construction and functioning of different types of pointing devices. [8+8]

Code No: K0525　　　**R07**　　　Set No. 2

**IV B.Tech. II Semester Regular Examinations, April, 2011**
**HUMAN COMPUTER INTERACTION**
**(Computer Science & Engineering)**

**Time: 3 Hours**　　　　　　　　　　　　　　　　　　**Max Marks: 80**

**Answer any FIVE Questions**
**All Questions carry equal marks**
*******

1. a) Explain the need to balance automation and human factors. Explain about the computer's ability to interface with humans.
   b) Explain the significant events that led to blossoming of World Wide Web.　　[8+8]

2. a) Explain the design goals in creating a user interface. Explain the role of usability testing in user interface design.
   b) Explain in detail about the following principles of using interface design.　　[8+8]
       i)   clarity
       ii)  compatibility

3. a) Discuss about the importance of user's tasks and needs in the design.
   b) Discuss about the indirect method of requirement determination in detail.　　[8+8]

4. a) Explain about the properties that provide a visually or aesthetically pleasing composition possessing.
   b) Discuss how a poor screen design can distract the user and what a user expects in good screen design.　　[8+8]

5. Identify the characteristics and capabilities of the following screen-based controls.　　[4x4=16]
   a)　Text entry / read-only controls.
   b)　Combination entry / selection control.
   c)　Custom controls.
   d)　Combo boxes .

6. a) Briefly explain Microsoft recommendations for message box.
   b) In presentation styles what is the role of error messages? [8+8]

7. a) Explain the role of user interface architects in building software tools?
   b) Also discuss about the specification methods of software tools. [8+8]

8. a) Explain important types of display devices and also the features of VDU.
   b) Describe briefly about speech recognition and digitization and generation. [8+8]

Code No: K0525 **R07** Set No. 3

**IV B.Tech. II Semester Regular Examinations, April, 2011**
**HUMAN COMPUTER INTERACTION**
**(Computer Science & Engineering)**

**Time: 3 Hours**                                          **Max Marks: 80**
**Answer any FIVE Questions**
**All Questions carry equal marks**
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1. a) Explain about the impact of inefficient Screen Design on Processing Time.
   b) Is good design of user interface important? What comprises a good design?
      Explain benefits of good design.                          [8+8]

2. a) Compare the print page design and web page design
   b) How surveys help in better designing? Discuss in detail about the characteristics
      and principles of user interface.                          [8+8]

3. a) Explain in detail about direct method for understanding the business junctions.
   b) Describe about Possible Problems in Requirements Collection.     [8+8]

4. a) State and explain various qualities which provides visually pleasing
      composition and give suitable examples for each quality.
   b) Explain briefly about guidelines in design of webpage controls.   [8+8]

5. a) Explain about the way in which links aggravate the user. Discuss in detail
      Web Site Navigation Problems.
   b) Describe in detail about the selection of device based and screen based
      controls in detail.                                        [8+8]

6. a) What is message? Classify the message. Give a detailed note about the
      messages.
   b) Discuss and elaborate the issues to be considered in choosing colors for
      web pages.                                                 [8+8]

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7. a) Describe the factors in choosing any user interface building tools.
   b) Explain about evaluation and critiquing tools in detail. [8+8]

8. a) Explain speech recognition, Digitization and generation in detail.
   b) Write brief notes on the following: [8+8]
      i) Functional Keys
      ii) Cursor movement keys.

**Code No: K0525**

# R07

**Set No. 4**

### IV B.Tech. II Semester Regular Examinations, April, 2011
### HUMAN COMPUTER INTERACTION
### (Computer Science & Engineering)

**Time: 3 Hours**                                                                   **Max Marks: 80**

**Answer any FIVE Questions**
**All Questions carry equal marks**
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1. a) Discuss the importance of good design, and also benefits of good design.
   b) Write the chronological history of graphical user interfaces.                [8+8]

2. a) Compare and contrast the graphical user interface and the web user interface.
   b) Discuss in detail about the characteristics and principles of user interface.   [8+8]

3. a) Discuss in detail about design commandments remain foremost in the
      development process.
    b) Explain about methods for gaining understanding of users.                  [8+8]

4. a) Can all screen or Web page elements be identified by cues other than by reading
      the words that make them up? Explain.
   b) Explain about Organization and Structure Guidelines in designing screens.   [8+8]

5. a) Discuss in detail about advantages and disadvantages of multiple document
      interface.
   b) Describe in detail about selecting proper device based control.             [8+8]

6. a) What points are to be noted in creating images as icons?
   b) What is image map? What is its use? What are its advantages and disadvantages?
      What is meant by combining mediums? What are its characteristics?            [8+8]

7. Describe the following specification methods and illustrate the following specification methods with suitable examples. [4x4=16]
   a) Grammars
   b) Transition diagrams
   c) State charts
   d) TCL scripting language

8. a) What is Fitt's Law and also explain its significance.
   b) Explain important types of display devices and also the features of VDU. [8+8]