

Reg. No. :

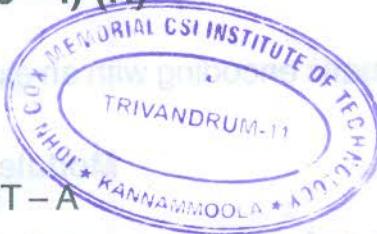
Name :

**Seventh Semester B.Tech. Degree Examination, November 2013
(2008 Scheme)**

**08.704 (2) – MULTIMEDIA SYSTEMS AND DATA COMPRESSION
(Elective – I) (R)**

Time: 3 Hours

Max. Marks : 100



PART – A

Answer all questions : (10×4=40 Marks)

1. Explain how to generate a conceptual video data.
2. Discuss the different image data types.
3. Compare asynchronous and synchronous transmission of data stream.
4. What are the data stream characteristics of continuous media ?
5. Distinguish between lossless compression and lossy compression.
6. Explain the basic step for MPEG audio encoding.
7. Describe the steps involved in LZW coding.
8. What is the reference model for multimedia synchronization ?
9. What are the different types of data in a video file ?
10. Explain motion tracking.

PART – B

Answer any one question from each Module.

(3×20=60 Marks)

Module – I

- | | |
|---|----|
| 11. Explain the general architecture of MMDBMSs.
OR | 20 |
| 12. a) Explain the logical architecture for multimedia information systems.
b) Mention the applications of multimedia systems. | 10 |



Module – II

13. a) Explain about MPEG audio coders. 10
b) Explain any one lossy compression technique. 10
OR
14. a) Compare source, entropy and Hybrid coding technique used in multimedia systems. 10
b) Explain arithmetic encoding with an example. 10

Module – III

15. a) Differentiate interframe synchronization and intra frame synchronization. 10
b) Discuss the necessity of synchronization of distributed objects and their management. 10
OR
16. a) How is motion estimation and motion compensation done on video frames ? 10
b) Compare MPEG-1 and MPEG-2 standard. 10