

NORTH-EX PUBLIC SCHOOL
(Senior secondary, affiliated to CBSE)
School block, Jain Nagar, Sector-38, Rohini, Delhi-81
CLASS IX
Subject: Computer Applications

***Note-** Before reading about the topic you must check [this](#) link which will help you in understanding the topics.

You can download this or if you do not have facility to get printout then you can ask your ward to copy it in a simple notebook and must do exercise in the notebook.

UNIT 1: Basics of Information Technology

TOPIC: - Multimedia with Worksheet 4

MULTIMEDIA

Multimedia is any combination of media like text, video, audio, graphics and animation with content, delivered electronically, usually through a computer. When the timing and mode of such a delivery is controlled by the user, it is called interactive multimedia.

Uses of Multimedia

1. **Website Designing:** What we see on the web is mostly comprised of multimedia. To make a website more informative and interesting, multimedia is the main tool used. So making creative and intelligent use of multimedia gives you a well-designed, attractive and informative website.
2. **Advertisement:** Designing attractive visuals and soundtracks to lure the customers is where multimedia finds its use in advertising.
3. **Entertainment:** Video games, animation movies, special effects of video and audio in movies are all the gifts of multimedia to the world of entertainment.
4. **Education:** Interactive learning, creating real life situations in the classroom, AV (Audio/ Visual) presentations are all the multimedia tools that have made education more interesting and entertaining.
5. **Engineering:** Software's like CAD, CAM and AV aids help in understanding the mechanism and concepts of engineering in a larger perspective.
6. **Medicine:** Expert systems in remote areas and online doctor's consultation has made it possible for medical help reach people in any corner of the earth.
7. **Business:** Advertisements, video conferencing, presentations, designing etc. are all the fields of business and have been modernised by multimedia.

Components of Multimedia

Let us discuss in brief some of the components of multimedia.

1. **Audio:** To store sound, we need a microphone and to hear sound, we need speakers. The microphone converts the varying air pressure which is produced when we speak in front of it, into varying voltage signals. These voltage signals are then converted to numbers and thus, stored in files with any one of the extensions — .wav, .mp3, .mpeg, etc. The audio files are played with software's like Windows Media Player, VLC Media player. These audio files can be used to make the presentations more effective and informative.
2. **Video:** To input and store a moving picture, we require a webcam. The video is stored in a file which may have an extension .avi (AVI —Audio Visual Interleave format) or .mpg (MPEG —Moving Picture Expert Group). A video file mostly contains sound and picture. The software's like Windows Media Player, VLC Media player etc. are used to view such files.
3. **Picture/Images:** Data may also be in the form of an image or picture. A digital picture may be taken by a webcam or any other camera. Image may be of a document scanned by scanner or made by a special software. There are many file extensions for image files, but the most popular are .jpg (or .jpeg Joint Photographic Experts Group), .gif (Graphical Interchange Format), .png (Portable Network Graphics) and .tif (Tagged Image File). A scanned file will have an extension .pdf (Portable Document File) which is accessed using Adobe Acrobat Reader. Some files which store bitmap images have .bmp extension (Bitmap Image file). The files that have clipart may have an extension .thm (Thumbnail Image File).
4. **Animation:** Animation is the quick display of a series of images of 2-D or 3-D artwork in order to create an impression of movement. This effect is due to persistence of vision i.e., the images are moved so rapidly that we do not get to know that they are still images. Most of the cartoon movies we watch are the result of animation. Some of the animation software used nowadays are Animator-DV, Jumpwel, Toon Boom Animate etc.

Worksheet 4

Attempt all the questions in your notebook.

- Q1) What do you understand by multimedia.
- Q2) Write any five uses of multimedia.
- Q3) Extension .mp3 is of Audio or Video?
- Q4) Write full form of extensions: a) .gif b) .png c) .tif d) .avi
- Q5) Write short note on following components of multimedia:
- a) Audio
 - b) Images