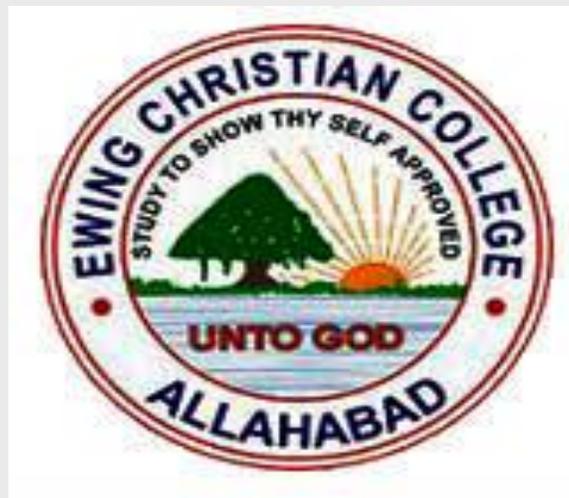


Application of MS Excel and MS Power Point in Presentation of Biological and Statistical Data

B.Sc. Semester VI

Botany: Paper 3A Analytical Techniques in Plant Sciences

Unit-3: Computer Application



Compiled by:

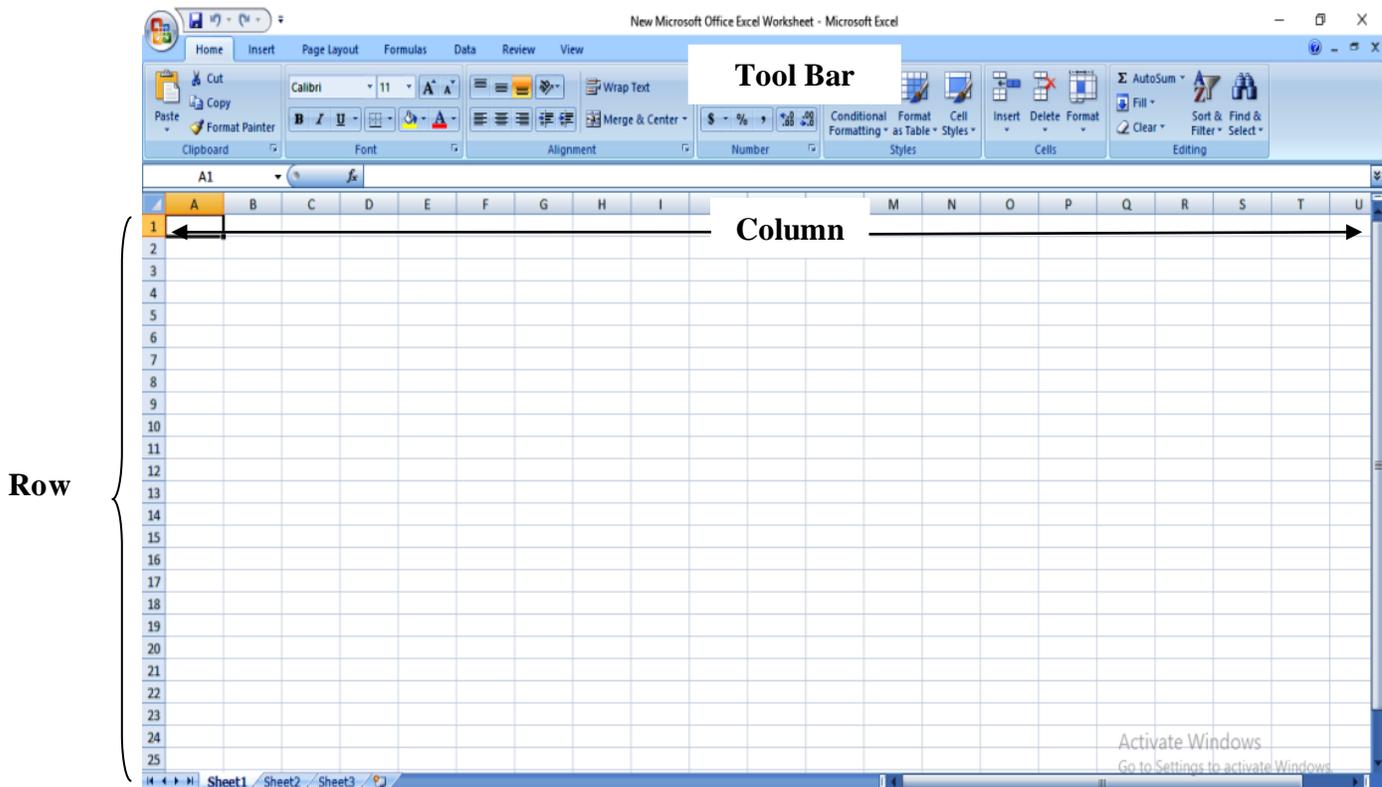
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Application of MS Excel in Presentation of Biological and Statistical Data

Microsoft Excel is a spreadsheet developed by Microsoft for Windows and other programmes. It can be used for calculation, graphing tools and for other applications. It is quite simple in entering, editing, analyzing, sequencing and storing of any numerical data. It performs arithmetical calculations with statistical data like addition, subtraction, multiplication and division can also be done with MS Excel. It enables the user, to sort numbers/characters according to some given criteria like ascending, descending orders etc. Different type of financial, mathematical and statistical calculations can easily solved by already installed formulas of MS Excel. In this way, it is very useful for the presentation of biological and statistical data of any scientific work. The spreadsheet is divided into columns & rows and each single box in it, is called a cell, which is used to insert any kind of data. The files created in MS Excel have the file extension ".xls". MS Excel is useful for presentation of biological and statistical data in following ways:



Source: MS Office Software

Collection and processing of biological statistical data:

Data is collection of facts of any scientific experiment like plant height, number of leaves, number of branches, and number of flower etc. in an orderly and organized form to get the useful information. The information in data is arranged in an order, so data processing is a series of actions and operations that convert data into useful information. The collection of data related to any scientific experiment is very important for the analysis of results in different experiments. The collected data is processed to get the outcome or result of a particular experiment.

In preparing sequential record of biological statistical data:

MS Excel helps in the preparation of sequential record of any biological scientific experiment, which is very important for the interpretation of results. MS Excel data file is a sequence of records of the different types of data. MS Excel spreadsheet is a record of sequential data collected in any scientific experiment. The information recorded as data, can easily accessible any time for any type of use and interpretation of results.

In experimental statistical data analysis and interpretation of results:

MS Excel helps in analysis of different type of data collected in any biological experiment. User can easily able to analysis and interpretate the results of its experiment using different methods like Mean, Median, Mode, ANOVA, Correlation, T Test etc. It is an accurate way to calculate the different mathematical calculations for any biological experimental data and interpretation of the outcomes.

In experimental statistical data representation:

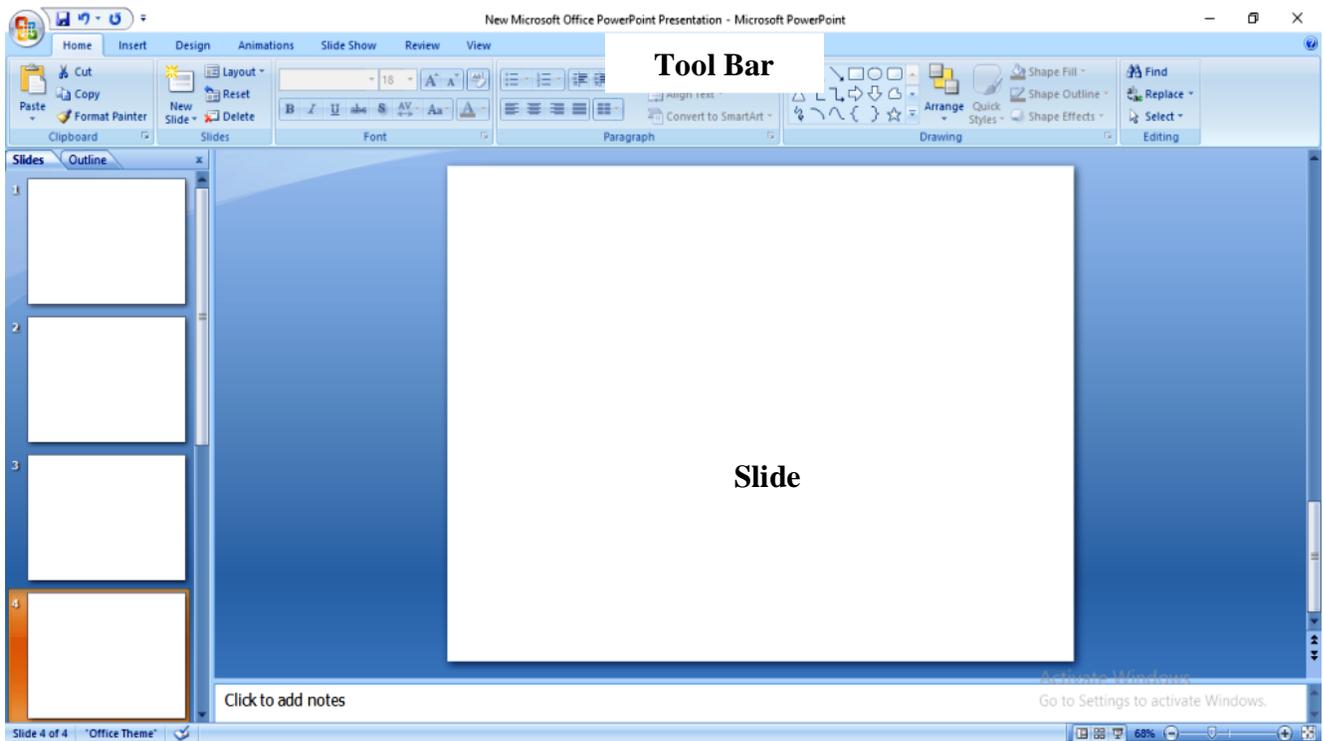
MS Excel not only helps in collection and data analysis but it also useful in representation of any scientific data in form of different type of graphs like, line, bar, histogram and charts like pie, bubble etc.

In arithmetical calculations of statistical data:

Ms Excel helps in different types of arithmetical calculation of any scientific data by creating formula in the cell of excel spreadsheet, like addition, subtraction, multiplication, division etc.

Application of MS Power Point in Presentation of Biological and Statistical Data

Microsoft Power Point is a slideshow based, presentation program, which was first developed by Forethought, Inc. for the Macintosh computer in 1987 and finally purchased by Microsoft in 1990. In the past years Microsoft released a number of updated versions of it, each new version offers more advanced features, quality and better technology than the older versions. MS Power Point enables the user to produce, virtual and realistic, presentations, which shows the facts as on-screen shows, or as over head projector slides. It is really changed the way of meeting, conferences, seminars and scientific presentations. It is an easy way to create attractive animated presentations that include animation, images, charts, tables, audio, video etc. In the past years, MS Power Point became a mean of convenient presentation of biological and statistical data using the Power Point slides. The files produced in Power Point have the file extension ".pptx". MS Power Point is helpful for presentation of biological and statistical data in following ways:



Source: MS Office Software

In creation of realistic biological presentations:

MS Power Point is an easy way to create realistic and virtual representation of any biological scientific work and data. It enables the viewers to understand the things properly in a convenient way and to create a Virtual Learning Environment. The user can insert any type of picture, video, sound, animation etc. in the slides, which makes the slide attractive and easily understandable.

In presentation of biological lectures:

It provides a platform to deliver lecture on any topic related to biology and pass the information to any gathering in an easy way. With the incorporation of different types of media resources, a presentation can appeal to a number of different learning styles and can be made more stimulating. It can enable the user to incorporate the required number of visual and audible media, into presentations. The power point presentation technology can be used to enhance the level of knowledge in the learners and easy understanding the topic. It enhances the quality of lecture and the way of presentation in a professional manner that anybody can easily understand the complicated topic. The user can simply able to include any kind of data, in the presentation which also helps in saving the time.

In presentation of research outcomes and papers in seminars and conferences:

Power point presentation is a way to present the outcomes of any biological research work in the form of experimental data to any number of gatherings. It is an adequate way to present your research in any Seminar, Conference etc.

In presentation of biological scientific projects:

The power point presentation enables the user to present any newly innovated biological scientific project to any number of gatherings. It is an easy way to show your innovative ideas to all and make possible discussions during presentation, for the incorporation of more ideas and enchantment of any scientific project.

In presentation of different biology related awareness programmes in society:

Power point presentation is a way to communicate to any number of gatherings in the society regarding the awareness related to any biological scientific facts like awareness regarding diseases, proper nutrition, hygiene etc.

In presentation of biological experimental protocols:

Power point presentations can also be set, as a demonstration in a laboratory to simply understand the protocol of any biological experiment. In this way the experiment can easily performed in a good manner at any scientific laboratory without any interruption.

In statistical data representation:

MS Power Point is an easy way to represent any biological data. It enables the user to compare the outcomes of any statistical biological data, in the form of different type of graphs like, line, bar, histogram and charts like pie, bubble etc. It enables the gathering to properly understand the scientific outcome of any research.
