

INTEGRATED PROJECT **SESSION-2020-21** **Project Lay-out**

SUBJECT-INFORMATION PRACTICES

CLASS-XII

Project Lay out-Subject wise-Instructions for the Project

- Make a project file (one of your notebook) and write commands to perform following operations on two 4x4 ndarrays namely P and Q.
 - a) Adding 10 to P
 - b) Multiplication of two arrays P and Q.
 - c) Divide all elements of Q by 7.
 - d) Calculate log of all elements of P
 - e) Round all the elements of Q to nearest integer.
 - f) Calculate remainder of all elements of P when divided by 7
 - g) Calculate square root of all elements of Q

SUBJECT-MATHEMATICS

CLASS-12

Project Lay out-Subject wise-Instructions for the Project

- 1. ARYABHAT – THE MATHEMATICIAN AND ASTRONOMER
- 2. GOLDEN RECTANGLE AND GOLDEN RATIO
Golden ratio and a continued fraction
Golden Ratio, Continued Fraction and a Sequence
Golden Ratio and Trigonometric Ratios
- 3. π - WORLD'S MOST MYSTERIOUS NUMBER

SUBJECT- CHEMISTRY

CLASS-XII

Project Lay out-Subject wise-Instructions for the Project

- ✚ Prepare a file on "Chemistry Project on Green Chemistry: Bio-Diesel and Bio-Petrol".

SUBJECT- BIOLOGY

CLASS- XII

Project Lay out-Subject wise-Instructions for the Project

PPT + PROJECT FILE

TOPIC

1. Ecological role of some animals observed in a local area

Or

Study of the effect of chemicals and pollutants on the Mitotic Index of the mitotically dividing onion root tip cells.

What should be the essential elements of your project?

Ideally, your project should have the following elements:

- Synopsis** - This is a summary of your idea and should include the purpose of the experiment, procedure used, data, and conclusion
- Research paper** - A research paper should be prepared and must be available along with the project data book with relevant written material. A research paper helps organize data as well as thoughts. A good paper

includes the following sections:

□ **Title page:** Centre the project title, and put your name, address and school

□ **Aim / Objective:** The introduction sets the stage for your report. The aim includes your hypothesis, an explanation of what prompted your research and what you hoped to achieve.

□ **Scientific Principle Involved:** In this section describe the principal involved.

□ **Material Used:** List all the items used here this will help you in working out the final cost.

□ **Method:** This section describes how you did the study. Describe in detail the methodology used to collect your data or make your observations. Your report should be detailed enough for someone to be able to repeat the experiment. Include photographs or drawings of self-designed equipment. The research work conducted by you may have taken more than a year. In such case, include this year's work only.

□ **Discussion:** This is the essence of your paper. The results and conclusions should flow smoothly and logically from your data. Be thorough. This should let the reader know exactly what you did, compare your results with theoretical values, published data and expected results. Include a section of possible errors. How did the data vary between repeated observations of a similar event? How were your results affected by uncontrolled events? What would you do differently if you were to repeat this project? What other experiments should be conducted?

□ **Conclusion:** This section describes the findings and conclusion of the project. Briefly summarize your results. Be specific, do not generalize. Never introduce anything in the conclusion that has not been discussed.

□ **Further scope of project:** This is a step further; here you describe the future scope of your experiment.

□ **Acknowledgement:** You should always give credit to those who assisted you; they may be individuals, educational or research institutions.

☐ **Reference list:** Your reference list should include any documentation that is not your own (i.e. books, journal articles, include specific internet url's)

SUBJECT- PHYSICS

CLASS- XII

Project Lay out-Subject wise-Instructions for the Project

- ✚ Explain the principle construction and working of an electroscope using this electroscope explain how will you differentiate that a given body is electrically charged or uncharged.

Instruction:-

- 1 . Project in soft copy or hard copy.
2. A PPT of this project is also required .

SUBJECT-Business Studies

CLASS-XIIth

Project Lay out-Subject wise-Instructions for the Project

Prepare a PPT on Micro and Small Scale Industries

NOTE: Each student has to prepare the PPT with atleast 8- 10 slides and it will be explained by the student when school re- opens.

- 1) Introduction
- 2) Emergence of MSME
- 3) Types of enterprise
- 4) Types of MSME (Micro, Small& Medium)
- 5) Characteristics
- 6) Role of MSME
- 7) Problem
- 8) Suggestions
- 9) Contribution
- 10)MSME in overall India

SUBJECT-Macro Economics

CLASS-XIIth

Project Lay out-Subject wise-Instructions for the Project

Prepare a PPT on the topic Goods and Services Tax Act and its impact onGDP

Note: Each students should prepare the PPT with atleast 10- 15 slides

Every student has to explain the PPT once the school re-opens

Necessary items

- 1) Introduction of GST
- 2) Why do we want GST
- 3)GST Overview
- 4)GST Transition
- 5) Objectives of GST
- 6)Tax being sbsumed into GST
- 7)GST structure in India
- 8)Sectoral impact on GST(Take any 5 different sectors)
- 9) Meaning of GDP
- 10) Impact of GSTin GDP growth

SUBJECT- ENGLISH

CLASS- XII

Project Lay out-Subject wise-Instructions for the Project

Relationship between people becomes stronger at every aspect of life and they can't bear separation due to ageing. In the poem 'My Mother at Sixty Six' the poet Kamala Das relates a personal experience. She brings out a common paradox of human relationships and portrays a sensational separation of a mother and a daughter.

Students are required to Write a poem/story (using their personal experience of separation from any dear ones in their lives) with the similar theme as that of 'My Mother at Sixty Six'

N.B. You are supposed to prepare this project using calligraphy, in biology sheets.

Best Wishes
Ibrahim Nami

SUBJECT- HUMANITIES/ POLITICAL SCIENCE/GEOGRAPHY

CLASS- XII

Project Lay out-Subject wise-Instructions for the Project

PPT +PROJECT FILE

HISTORY

Topic

A Deeper Look into The Harappan Civilization:

✚ Essential elements of the project:

- ★ Introduction about the civilization
- ★ Other names of the civilization
 - ★ Extension of the civilisation
 - ★ Town Planning
 - ★ Society
- ★ Important trade centers

- ★ Important cities
- ★ The Great Bath
- ★ The Great Granary
 - ★ Writings
 - ★ Seals
 - ★ Artefacts
 - ★ Religion

POLITICAL SCIENCE

Topic

Prepare a Project File on the topic "Superpower- The American view of the world."

GEOGRAPHY

Topic

Prepare a project file on the topic "Human Settlements."

