



“HANDS-ON” ACTIVITIES

Covers  
CBSE &  
State Board  
Syllabus

# Std 10 preparatory program



SEVEN ACTIVITY KITS

Total Activities

118+

Total Manual Pages

124

All take away kits..!

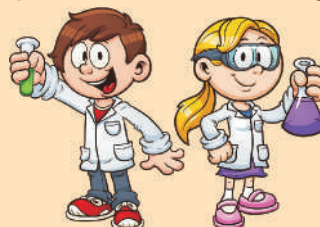
This course is Hands-On Activity version of class 10 theory syllabus. In this course, every student does every activity specified here.

Course methodology is aimed at helping the students understand the concepts thoroughly.

The objective of this course is to make the students understand basic concepts in the science through experiments. The focus will be on encouraging students to apply the concepts learned to real-life situations.

This preparatory program will not only help students understand better what is taught in regular school classes, and hence do well in board exams but will also help them develop the acumen which will give them a distinctive edge over the rest of their peers.

This program forms a solid foundation of conceptual understanding for various competitive exams.



CREATIVITY AND INSPIRATION



IDEA AND IMAGINATION



INNOVATION AND DISCOVERY

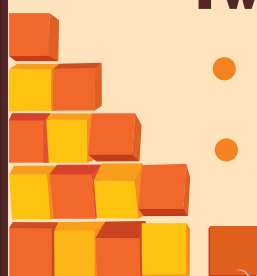


THINK OUTSIDE THE BOX

## Two Formats

- Purchase Kits for Individual Use
- Attend Crash Course  
of Class Ten Science

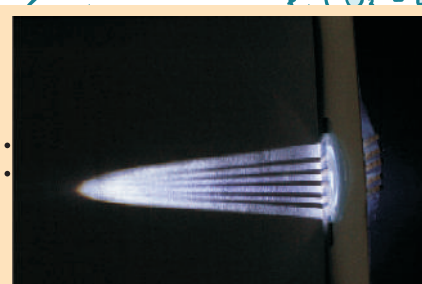
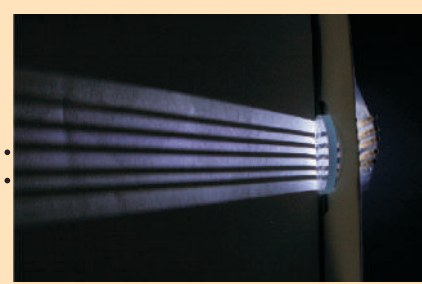
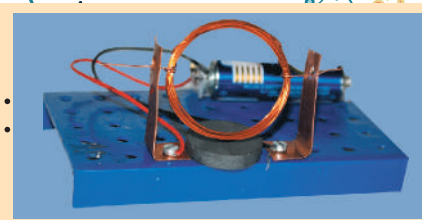
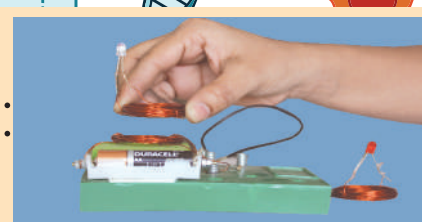
**DIY**  
DO IT YOURSELF



## Physics Activity Kit 1

### Magnetism & Electromagnetism

- Tracing magnetic lines of forces using iron filings
- Making of electromagnet to demonstrate magnetic effect of electric current
- Magnetic lines of in a circular wire loop
- Attraction & repulsion in electromagnet
- Make a working model of simple DC motor
- Making a hand-held Electricity Generator
- Wireless transfer of power. Concept of Transformer.



## Physics Activity Kit 2

### Optics (Reflection & Refraction)

- Preparation of optical bench and light source
- Image formation in plane mirror. Laws of reflection
- Image formation in Concave and convex mirror using simple optical bench made by students.
- Convergence, Divergence of light and focal length of Concave and convex lens (Ray box activity)
- Images formed by convex lens with object at different distance (optical bench activity)
- Refraction through glass slab activity
- Dispersion of light - rainbow formation



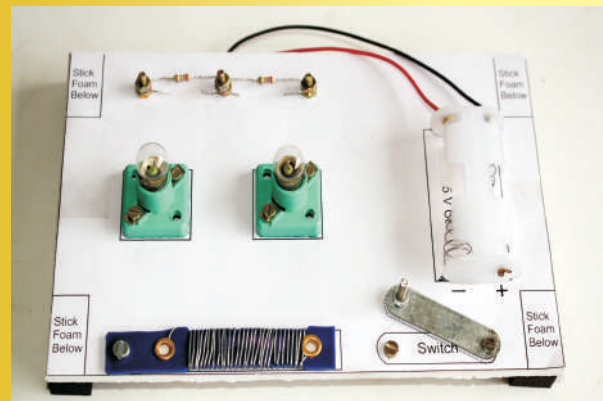
### Why Hands-on Preparation?

Science is always backed by experimentation. We often ignore this. When you learn science concepts by experiments, you will know them thoroughly. You will score better in exams is a sure achievement, but more important is that you will understand science!!

## Physics Activity Kit 3

### Electricity

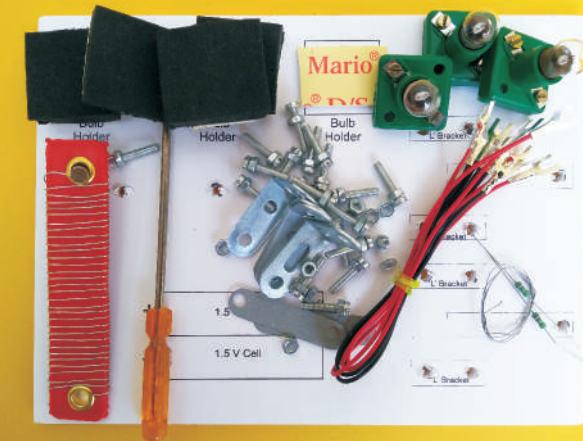
- Electricity Board making activity
- Making of simple circuit and use of switch
- Understanding short circuit
- Identification of conductors and insulators
- Verification of Ohm's law
- Changing resistance in the circuit - use of rheostat
- Types of circuits - series and parallel
- Resistivity of metals
- Use of Carbon Film Resistors along with bulbs
- Making of electrical heater
- Heating effect of electrical current



## Biology Activity Kit 1

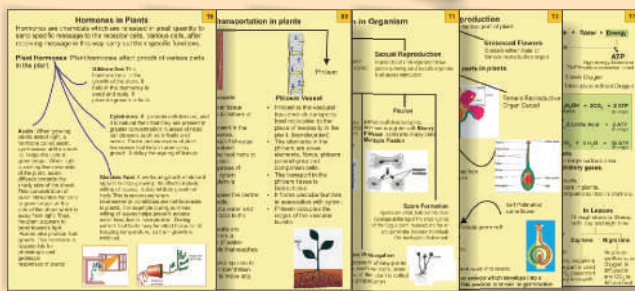
### Biology

- Human Anatomy - study of Brain, Nervous system, Heart, Circulatory, Respiratory System and more...using colourful card and charts
- Working of Eye - making a model using lens, bowls and screen
- Working of lungs - making a study model
- Flash Card based learning for important Biology topics from syllabus
- Activity on Photosynthesis to be done at home using given kit.



Working of Eye

Set of 6 Anatomical Cards with 12 surfaces of Information



Set of 9 cards having 18 surfaces of knowledge presented in mind-map / flow-chart format.



Working of Lungs



Activities on Photosynthesis

## Chemistry Activity Kit 1

### Types of Reactions, Metals & Non-metals

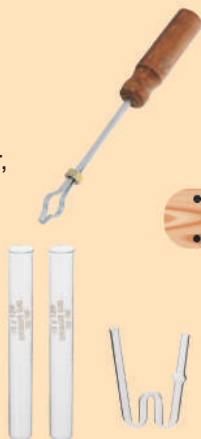
- Modern Periodic Table, classification of elements
- Heats of reaction
- Combination reaction
- Electrolysis of water
- Single displacement reaction
- Double displacement reaction
- Oxidation reduction reaction



## Chemistry Activity Kit 2

### Acids, Bases and Salts

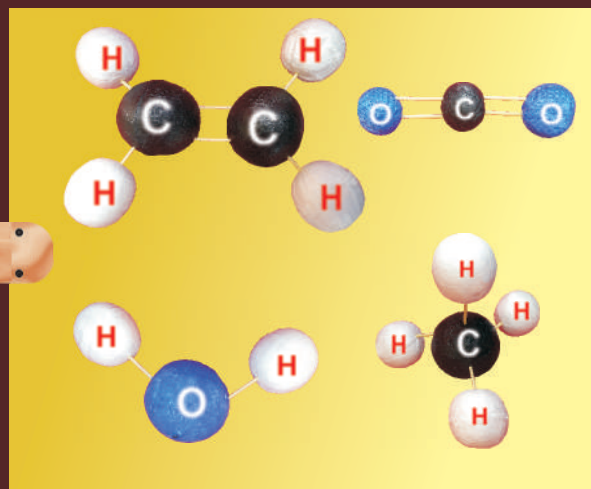
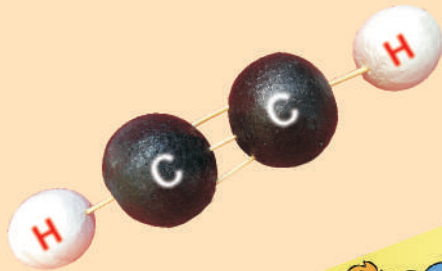
- Testing acids and bases using Litmus paper, pH paper, Methyl Orange indicator
- Reaction of acid and base with a metal
- Reaction of metal carbonate with acids
- Neutralization reaction
- Reaction of metal oxides with acids
- Types of salts and their properties



## Chemistry Activity Kit 3

### Carbon Compounds

- Explore structure of simple organic, inorganic molecules and solids by using molecular model kit
- Make single, double and triple bond models
- Perform chemical reaction to oxidize alcohol



### Contact us for :

- Purchase of Kit for Individual Use
- Registration for Crash Course
- Organizing a Crash Course
- Become a Partner with Us

