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Founder President,  
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H.H. Sri Vishwapritya Theertha Swamiji  
President,  
Udupi Sri Achar Math Education, Council, Bangalore.

An Interim report of  
**Physical Education**  
**Online classes**  
From August 12<sup>th</sup> 2020 to  
October 14<sup>th</sup> 2020



By

**Sri. Sukumar**

Physical Education Director  
Poornaprajna College Udupi



With the motive of making students healthy and stress free during this pandemic condition. The college decided to extend physical education online classes to undergraduate students.

Mr. Sukumar, Physical Director of our college has successfully conducted classes on fitness and other health related issues like food and nutrition science behind exercise etc. to 3rd and 5th Semester students of BA, B.Sc., BBA and B.Com.

The Classes were usefull and appreciated by the student community

## PARTICULARS

1. Total hours taken: 52
2. Time table
3. Number of PPT's presented : 07
4. No. Of Student Beneficiaries .950
5. Total No. Of Weeks: 09
6. Average attendance/week: 720
7. No. Of examination conducted: 01
8. No. Of students attended: 730
9. Examinations held/ No. Of Students attended: 690
10. Total no of Students feedback submitted: 743
11. Classes taken for 3rd and 5th Semester students of BA, B, COM, BBA and B.SC

## TIME TABLE

<b>Dept. of Physical Education</b>				
	<b>9.30 – 10.15</b>	<b>10.30 – 11.15</b>	<b>11.30 – 12.15</b>	<b>1.30 – 2.15</b>
Monday				III B. A. & III BBA
Tuesday				III B Com A
Wednesday			III B. Sc.	III B Com B
Thursday			II B Com A	II B. A. & II BBA
Friday			II B. Sc.	II B Com B
Saturday				



# Walking

**Before**



**After**



**Sukumar**  
Physical Education Director  
Poornaprajna College,  
Udupi.

## EFFECTS OF WALKING

- ◆ Walking is the simplest and natural way to work out. You can do it almost anywhere.
- ◆ Walking combined with good sleep and a healthy diet can help you avoid the doctor altogether.

As little as 15-30 minutes of walking every day can drastically improve not only a person's overall appearance, but health as well.



Good old walking is a single practice which could significantly benefit the whole body and mind. It's free, easy and requires little effort.



## Walking Technique

Turning your normal walk into a fitness stride requires good posture and purposeful movements.

- ❑ Keep your head up. When you're walking, focus on standing tall with your chin parallel to the ground
- ❑ Your neck, shoulders and back are relaxed, not stiffly upright.
- ❑ You're swinging your arms freely with a slight bend in your elbows. A little pumping with your arms is OK.
- ❑ Our stomach muscles are slightly tightened, and your back is straight, not arched forward or backward.



**Here is a list of benefits you can literally walk yourself into:**

### Positive brain changes:

Walking has long been recognized as both an effective form of physical exercise, as well as a tool to help gain mental clarity.

- ⊗ Boots blood flow to the brain
- ⊗ Better memory and cognitive function
- ⊗ Improves oxygen flow to the brain.
- ⊗ Brisk walking boosts the production of stress-busting endorphins. This, in turn, reduces the stress hormones and alleviate any signs of depression. By opting for this regular exercise you can improve your mood and even increase your self-esteem.





## Improved eyesight

Even though eyes might seem like the last thing to be connected with the legs, walking actually benefits their health too. It may even help to fight glaucoma by relieving eye pressure.



Brisk walk will help to reduce the high pressure in the eyes and get the blood flowing all over.



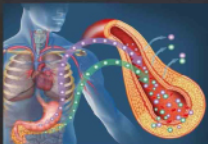
## Prevention of heart diseases and Increased lung volume

- ◆ Walking for an average of 30 minutes or more a day can lower the risk of heart disease, stroke by 35% percent
- ◆ Walking brings up the heart rate, lowers blood pressure and strengthens the heart.
- ◆ Brisk 30-minute walk increases the lung capacity. This also strengthens the lungs. With increased lung capacity, you will breathe easier, and your lungs will stay healthier longer.



## Beneficial effects on the pancreas And Improved digestion

- ◆ Helps to improve insulin sensitivity and hence important in the management of diabetes.
- ◆ walking helps speed up the time it takes food to move from the stomach into the small intestines.



## Toned muscles



Muscle tone and weight loss (in overweight cases) may also be achieved through walking. The practice of walking 10,000 steps a day may be counted as an actual workout in a gym, especially if you add some intervals or walking uphill.



Additionally, it's low impact and there's no recovery time, which means no sore muscles and regrets for missing tomorrow's workout due to being too sore the next day.

### Sturdier bones and joints

Walking can provide more joint mobility, prevent loss of bone mass, and even reduce risk of fractures.

- ◆ Easy and gentle on joints.
- ◆ Helps maintain bone mass.
- ◆ Slows the development of arthritis.
- ◆ Increases joint flexibility and range of motion.
- ◆ Aids in joint fluid circulation, which provides essential oxygen and nutrients.

## Back pain relief

- ◆ Walking may become a real life-saver for those who experience back pain during more challenging high impact exercises.
- ◆ Since it's a low-impact activity it won't cause more pain or discomfort, like running or HIT would. Walking contributes to better blood circulation within the spinal structures and improves posture and flexibility which is vital for a healthy spine.





**"Walk to be healthy, walk  
to be happy"**



**Thank you**

**INTRODUCTION OF**

**PHYSICAL EDUCATION &  
SPORTS**

**INTRODUCTION,  
MEANING & DEFINITION,  
NEED & IMPORTANCE  
IN PRESENT SCENARIO**

**DEPT. OF PHYSICAL EDUCATION,  
POORNAPRAJNA COLLEGE,  
UDUPI, KARNATAKA**

## INTRODUCTION

### PRIMITIVE SOCIETY V/S MODERN SOCIETY

#### MODERNIZATION

- Dance, singing, sports and games are the part of the human instinct.
- it tunes with the growth of man and the value system in the society
- to enjoy life and be happy

- Society is trying to make our life easier
- Physical work of a person is negligible.
- Earning Money is main instinct of human life

### MANUAL LABOR LIFE STYLE TO PUSHBUTTON TECHNOLOGY LIFESTYLE

## INTRODUCTION



MOVEMENT EXISTS

ACTIVE BODY  
FIT AND FINE  
HEALTHY LIFE

LIVING LONG LIFESPAN  
V/S  
HEALTHY LIVING



NO MOVEMENT

SEDENTARY LIFE  
LIVING WITHOUR LIFE  
UNHEALTHY LIFE

## What Nature Say's ??

## INTRODUCTION

### PHYSICAL-LIFE V/S TECHNO-LIFE

#### MODERNIZATION



- Walking
- Standing
- Participation

- Riding
- Sitting
- Watching

### ACTIVE LIFE V/S SEDENTARY LIFE

## HYPERKINETIC DISEASES

### PREVENTION IS BETTER THAN CURE

## INTRODUCTION

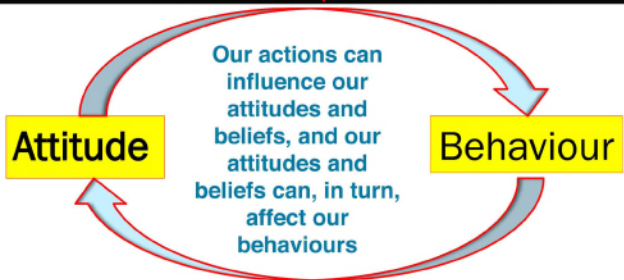
### PREVENTION IS BETTER THAN CURE

- INVENTIONS HAVE BEEN MADE BY MEDICAL SCIENCE TO CURE THE PERSON AFTER THEY BECOME ILL AND ON THE CONTRARY.
- EACH INDIVIDUAL SHOULD CONCENTRATE ON CONTRIBUTING FACTORS OF PHYSICAL-HAPPINESS AND SPARE SOME TIME FOR PHYSICAL LABORS, EXERCISE, NATUROPATHY, YOGA & ASANA, WALKING, JOGGING, SWIMMING, RECREATIONAL GAMES TO BE HEALTHY.
- ACTIVE PARTICIPATION IN THE SCIENTIFIC PHYSICAL EDUCATION AND SPORTS PROGRAM HELPS THE PEOPLE TO BECOME PHYSICALLY FIT AND ACTIVE; MENTALLY SOUND AND SHARP; EMOTIONALLY BALANCED AND CONTROLLED; SOCIALLY WELL ADJUSTED.



# URGENT NEED OF CHANGING OUR ATTITUDE

## ATTITUDE V/S BEHAVIOR



Attitudes are not always very stable and frequently change based on the way of PE & Sports program presented in the institution.

If we change the attitude towards PE & S set in the mind can change our behaviour/action.

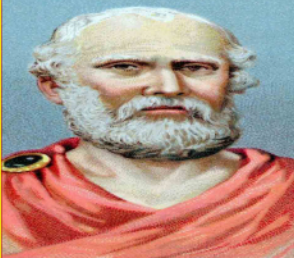
**"BETTER TO CONSTRUCT A STADIUM  
INSTEAD OF CONSTRUCTING TEN  
HOSPITALS"**

**- SWAMY VIVEKANANDA**



**"Lack of Physical Activity will  
destroy the good conditions of  
every human being, while  
movement and methodical  
physical exercise save it and  
preserve it"**

**- Plato (Greek philosopher)**





## INTRODUCTION

- College days plays a pivotal role in the students life by shaping behaviour towards the development of exercises and sports culture.
- College is the platform to impart knowledge on health & fitness, various sports & games, physical exercise and other numerous areas related to our physique.
- Active participation in the scientific physical education and sports program implemented in the college helps the people to become physically fit and active; mentally sound and sharp; emotionally balanced and controlled; socially well adjusted.
- In the view of the above concept, our college was introduced Physical education and sports is compulsory teaching subject form this year.

## Nature



## Conclusion

# Neurological Benefits of Exercise

**Sri Sukumar**

Department of Physical Education  
Poornaprajna College And Postgraduate Centre Udipi



# Introduction

- ▶ *Industrialization brought revolutionary technological innovations like trains, cars, and airplanes, which made our lives easier.*
  - ▶ *This ingrained mindset traces back to Western traditions of athleticism.*
  - ▶ *Ancient Greece glorified the body with sporting rituals and competition, so much so that the Olympic Games, held in honor of Zeus, could take place.*
- 
- ▶ *Before then, there was no such thing as marathons or sport-oriented societies. The "survival of the fittest" prevailed as a foundation of human evolution*
  - ▶ *In other words, you were either fit or, you died. Western cultures have vacillated between extremes, to have shifted from "fitness-for-survival," to "fitness-for-entertainment" to "fitness as a privilege."*

## How Does Exercise Affect the Brain?

Exercise Improves:



MENTAL HEALTH



COGNITIVE FUNCTIONING



MEMORY

and reduces:



STRESS



SOCIAL ANXIETY



DEPRESSION



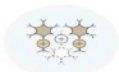
- ▶ People exercise for different reasons, but many people stay fit to prevent serious health conditions. These conditions include heart disease, obesity, diabetes, and stroke.
- ▶ Other people work out primarily to lose weight. Only a few people exercise with the intent to improve their brain functioning.
- ▶ Exercise improves cognitive functioning, mental health, and memory; it also hinders the development of certain neurological conditions.
- ▶ While exercising, oxygen saturation and angiogenesis (blood vessel growth) occur in areas of the brain associated with rational thinking and as well as social, physical and intellectual performance
- ▶ Exercise drops stress hormones and increases the number of neurotransmitters like serotonin and norepinephrine, which are known to accelerate information processing

## Neurological Benefits of Exercise

### Why Exercise Is Good For Your Brain

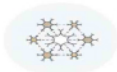
Moving your body can have a powerful effect on your mind.

Exercise positively influences your brain's:



#### NEUROGENESIS

creates new neurons



#### NEUROPLASTICITY

improves how existing neurons work



#### NEUROCHEMISTRY

releases neurotransmitters that improve brain function

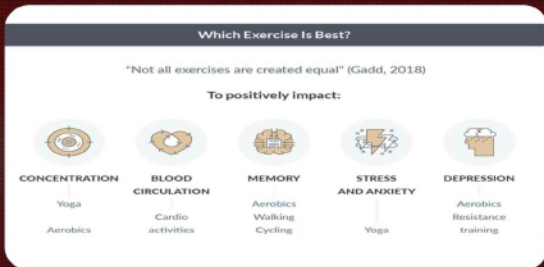
## Neurological benefits that come from physical activity

These are:

- ▶ Decreased stress
- ▶ Decreased social anxiety
- ▶ Improved processing of emotions
- ▶ Prevention of neurological conditions
- ▶ Euphoria (short-term)
- ▶ Increased energy, focus and attention
- ▶ Hinderance to the aging process
- ▶ Improved memory
- ▶ Improved blood circulation
- ▶ Decreased 'brain fog'
- ▶ Increases the size of your brain



# The Best Exercises to Build Brain Health?



- ▶ *For brain fog and concentration: Yoga and aerobic classes*
- ▶ *For memory: aerobics, walking, and cycling*
- ▶ *To improve blood circulation: cardio activities (walking, riding a bicycle, running, swimming, kickboxing, skipping rope and skiing)*
- ▶ *For stress and anxiety: yoga*
- ▶ *And for depression: aerobic and resistance training*

# THANK YOU



○ You hear the words “FIT” or “fitness” used almost every day in conversation, on television, on the radio, in newspapers or in magazines, yet probably you are not quite sure of:



- The actual meanings of the words
- How to get fit
- Whether you should bother to get fit



Does “Fit”  
or “Fitness”  
mean just  
one thing?

## What is Fitness??

- **Physical Fitness is the body’s ability to function efficiently and effectively. It consists of Health Related Fitness and Skill Related Fitness, which have different components, each of which contributes to total quality of life.**



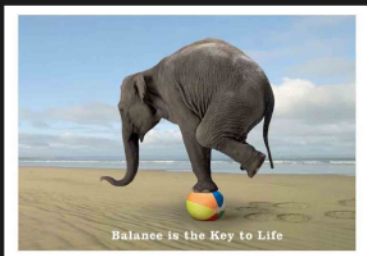
## Health Related Fitness

- Body Composition
- Aerobic Endurance/Fitness
- Flexibility
- Muscular Strength
- Muscular Endurance



## Skill Related Fitness

- Speed
- Agility
- Balance
- Coordination
- Reaction Time





# Physical Activity Pyramid

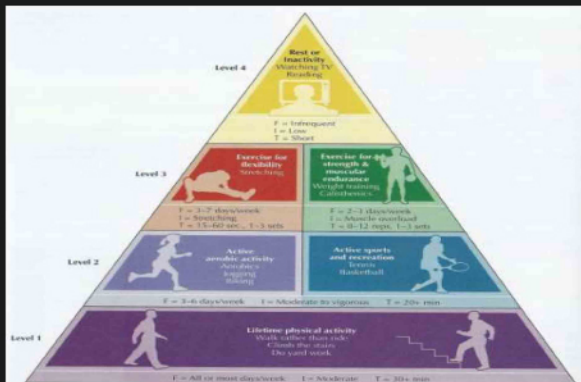
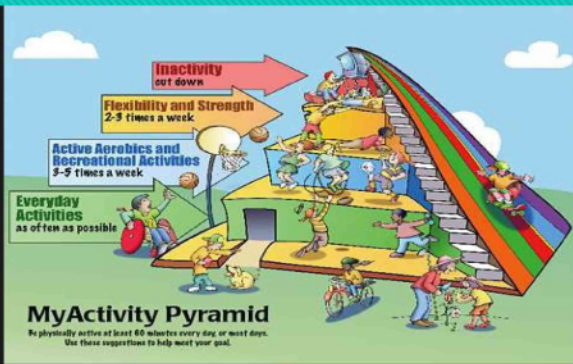


Figure 3  
The physical activity pyramid.

# Physical Activity Pyramid

# How Much Is Enough?

- **Frequency**: How often. 3 or 4 sessions per week.
- **Intensity**: How hard. It is important to get the heart rate up (within a safe range) for improvement to occur.
- **Time**: How long. To get any real benefit you must exercise for at least 20 minute and continuously.
- **Type**: For aerobic fitness choose aerobic type training eg. Running, swimming, cycling, etc.

## The Stats

- Only half (49.8%) of Australian adults aged 25 years and over (55.6% males and 44.3% females) were undertaking “sufficient” physical activity to maintain good health.
- “Sufficient” was defined as at least 150 minutes of physical activity time a week.
- Approximately 1 in 6 (15.6%)
- reported no participation at all.



## Why Bother?

If you are active and fit, you decrease your risk of:

- Dying of heart failure
- Adult onset diabetes
- Osteoporosis
- Other hypokinetic diseases
- Being overweight is largely determined by your level of physical activity (as well as your nutritional habits).



**THANK YOU**

Dept. of Physical Education  
and Sports,  
Poornaprajna College,  
Udupi



## Science Behind the Exercise and Sports

Here we learn the  
basics of :

- ❖ Physiology
- ❖ Psychology
- ❖ biomechanics
- ❖ nutrition and diet
- ❖ Anatomy of human body

❖ Exercise/Sports Physiology

## INTRODUCTION



○ In ancient world,  
every individual had  
hard work  
associated with his  
profession •



○ Which is lacking in  
modern world and  
hence inculcating a  
definite time and  
regular exercise to  
be a part of our life  
style is a **MUST**.

## EXERCISE - MEANING

Buzzle.com

### Flexibility Exercise

Stretching



### Aerobic Exercise

Cycling, Swimming



### Anaerobic Exercise

Weight training,  
Sprinting



**EXERCISE**  
is the repeated  
rhythmic  
movements given  
to body parts to  
keep it healthy  
and develop the  
body parts

## PHYSIOLOGY- MEANING



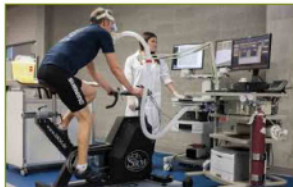
- o **the branch of biology that deals with the normal functions of living organisms and their parts.**
- o **the way in which a living organism or bodily part functions.**

## EXERCISE PHYSIOLOGY - MEANING

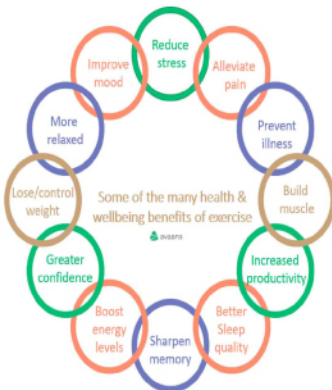


Is the study of

- **HOW** exercise and sports will affect/effect on body organ.
- **HOW** our body will react to the exercise and sport.



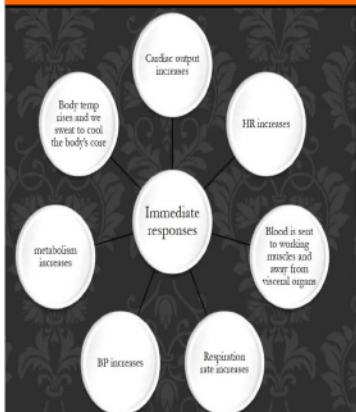
## BENEFITS OF EXERCISE – IN GENERAL



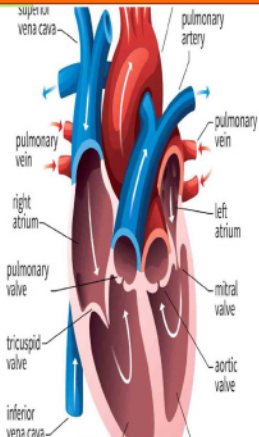


# PHYSIOLOGICAL BENEFITS OF EXERCISE

## Immediate response

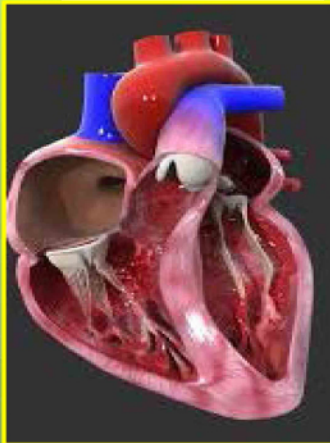


## EFFECT ON THE HEART – EXERCISE



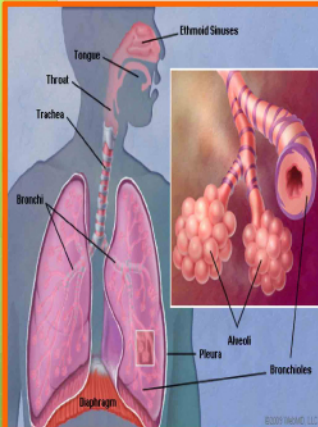
- **Oxygen rich blood is pumped out of the heart to the muscles and organs via artery's (red areas)**
- **De-oxygenated blood is returned to the heart via veins (blue areas)**
- **Artery's have plenty of pressure on them from the heart contracting to force the blood away from the heart**
- **Veins however are not under any pressure. To stop the blood going backwards veins have valves**

## EFFECT ON THE HEART – EXERCISE



- ❑ 5-6 liters of blood is pumped out of heart/min - **WALKING**
- ❑ In moderate-20liters/min - **JOGING**
- ❑ Severe exercise-35 liters/min - **RUNNING**
- ❑ Cardiac output is directly proportional to oxygen consumption
- ❑ This is due to increased heart rate and increased stroke volume
- ❑ (70ml/contraction)
- ❑  $CO = HR \times SV$

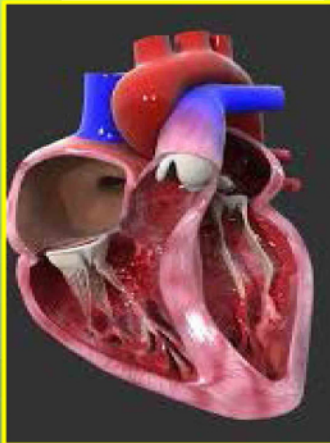
## EFFECT ON THE LUNGS – EXERCISE



- ❑ During exercise there is increase in  $CO_2$  of blood
- ❑ Chemoreceptor in medulla are stimulated
- ❑ Stimulation of dorsal respiratory group of neurons
- ❑ Increase the rate of respiration
- ❑ Removal of  $CO_2$  is increased

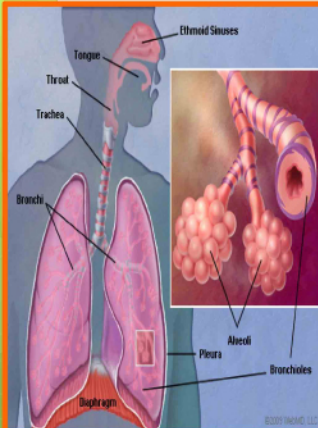


## EFFECT ON THE HEART – EXERCISE



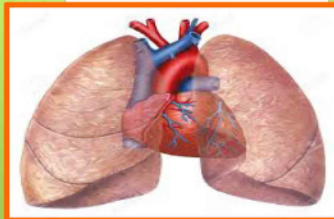
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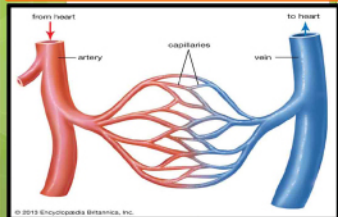


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## THE HEART AND LUNGS – TOGETHER

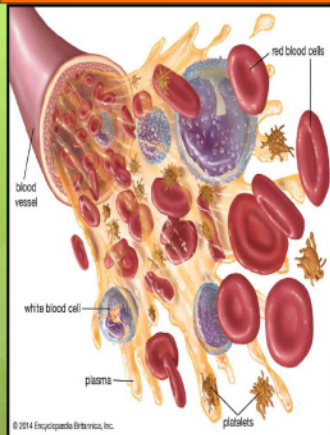


- ❑ The heart and lungs are connected to supply the body with oxygen rich blood and work together to take away and get rid of carbon dioxide



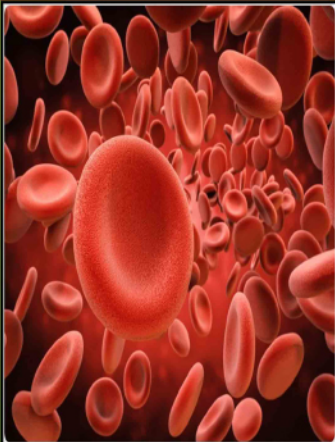
- ❑ This happens at the capillary networks that cover the alveoli and muscle cells

## CHANGES IN THE BLOOD



- Mild hypoxia: which increases  $\text{CO}_2$  concentration will lead to pH decrease
- It stimulates the juxtaglomerular cells to synthesize erythropoietin
- So that there is a production of RBCs
- There is increased heat production during exercise which increases the body temperature

## CHANGES IN THE BLOOD



- To compensate the body temperature sweating and fluid loss occurs resulting into decreased blood volume which is also due to vasodilatation in skin
- Decreased blood volume results in Hemoconcentration i.e. water is lost through plasma
- That's why severe exercise can even cause dehydration

## CHANGES IN THE BLOOD



- **Systolic** = the pressure exerted on the walls of the arteries when the heart contracts
- **Diastolic** = the pressure on the walls of the arteries as the heart relaxes (fills)
- Normal BP tends to be around: 120/80 mmHg.



**SUKUMAR**  
**PHYSICAL EDUCATION**  
**DIRECTOR**  
**POORNAPRAJNA**  
**COLLEGE, UDUPI.**

## POSTURE

Posture is the correct alignment of the body segments.



Without **posture** and the muscles that control it, we would simply fall to the ground.

### Maintenance of balance and posture:

The **cerebellum** is important for making **postural** adjustments in order to maintain balance. Cerebellum (back of **brain**) is a small part of the brain positioned at the back of the head, where it meets the spine, which acts as the **body's** movement and **balance control** centre.

It controls balance, movement, and coordination (how your muscles work together)

There are Two types of Posture :

1. **Static posture** (sitting, standing)
2. **Dynamic Posture**(walking, running)

## Active Posture

### Static Posture

- Pattern of posture is constant.
- Body and its segments are aligned and maintained in certain positions
- E.g. Standing, kneeling, sitting



### Dynamic Posture

- Pattern of posture is constantly modified
- Body and its segments are moving
- They form an efficient base for movement
- eg. Walking, running, jumping, throwing, lifting



### Values of good posture:

- Hygienic value : Since the body is erect and straight all internal organs are suspended properly they can function efficiently and perfectly
- Economic value : By the way good posture one can get job opportunity and earn his livelihood
- Social value : Good posture is always attractive and there by get respect from the society .
- Spiritual value : The spirit is uplifted with physical uplift of the trunk. The glory of the rising sun is never seen by one walking with protruding head and abdomen and flat feet.

### Causes of Bad Posture

1. Injury
2. Disease
3. Habit
4. Muscular or nervous weakness
5. Mental attitude
6. Heredity
7. Improper clothing

# BAD POSTURE

1. Round Shoulder
2. Kyphosis
3. Lordosis
4. Flat back
5. Scoliosis



**Round shoulder:** Resting **shoulder** position that has moved forward from the body's ideal alignment.

## Exercises for round shoulder



## Kyphosis and Lordosis

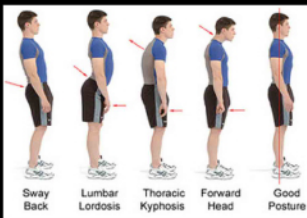
**Kyphosis** : An abnormal forward rounding of the upper back.

**Lordosis** : An excessive inward curve of the spine.

Kyphosis



Lordosis



## Exercises for Kyphosis and Lordosis



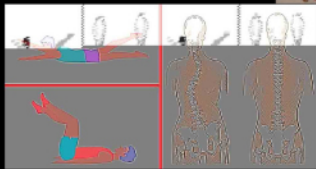
- **Flat back:** Pelvis is tucked in and lower **back** is straight instead of naturally curved, **causing** you to stoop forward.

### EXERCISES FOR FLATBACK



**Scoliosis** is a sideways curvature of the spine.

Scoliosis

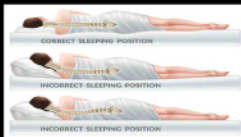


Exercise for scoliosis



## Types of A Good Posture

1. Inactive Posture (sleeping ,rest)
2. Active Posture ( muscular activity)
  - Standing position or posture
  - Sitting position or posture
  - Lying position or posture
  - Walking posture
  - Sitting position or Posture
    - ✓ Simple Sitting
    - ✓ Reading , while sitting
    - ✓ Writing ,while sitting



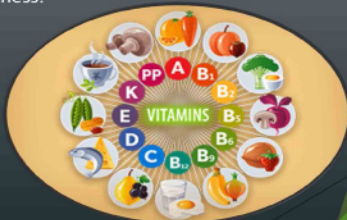
	<h3 style="color: green;">Good Posture</h3> <p><b>Results in...</b></p> <ul style="list-style-type: none"> <li>• Prevents back pain</li> <li>• Maintain proper muscle and joint usage</li> <li>• Prevent spine from forming into abnormal positions</li> <li>• Center your balance</li> <li>• Reduce stress</li> <li>• Promote efficiency since muscles, joints and bones are being use optimally</li> <li>• Encourage confidence and good morale</li> </ul>	<h3 style="color: red;">Bad Posture</h3> <p><b>Results in...</b></p> <ul style="list-style-type: none"> <li>• Lower back pain</li> <li>• Shoulder pain</li> <li>• Neck pain</li> <li>• Frequent headaches</li> <li>• TMJ dysfunction</li> <li>• Bone spurs</li> <li>• Intervertebral disc damage</li> <li>• Fibrotic scar tissue</li> <li>• High blood pressure</li> <li>• Breathing problems</li> <li>• Fatigue</li> </ul>	
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Sukumar  
Physical education director  
POORNAPRAJNA COLLEGE  
UDUPI.

# VITAMINS

- ▶ A vitamin is an organic molecule that is an essential micronutrient which an organism needs in small quantities for the proper functioning of its metabolism.
- ▶ **Vitamins** are substances that our body needs to grow and develop normally. And perform hundreds of roles in the body. They help shore up bones, heal wounds, and bolster your immune system. They also convert food into energy, and repair cellular damage.
- ▶ Our body does not produce enough vitamins and hence it must be obtained through the diet. However, both deficient and excess intake of a vitamin can potentially cause clinically significant illness.



## Types of Vitamins

Vitamins and minerals are two of the main types of nutrients that our body needs to survive and stay healthy. Vitamins help our body grow and work the way it should.

There are 13 essential vitamins are required for the body to work properly.

They are:

Vitamin A

Vitamin C

Vitamin D

Vitamin E

Vitamin K



Vitamin B1 (thiamine)

Vitamin B2 (riboflavin)

Vitamin B3 (niacin)

Pantothenic acid (B5)

Biotin (B7)

Vitamin B6

Folate (folic acid and B9)

Vitamin B12 (cyanocobalamin)

- Vitamin A
- Vitamin C
- Vitamin D
- Vitamin E
- Vitamin K
- Vitamin B1 (thiamine)
- Vitamin B2 (riboflavin)
- Vitamin B3 (niacin)
- Pantothenic acid (B5)
- Biotin (B7)
- Vitamin B6
- Vitamin B12 (cyanocobalamin)
- Folate (folic acid and B9)



## Classification of Vitamin

Vitamins are generally classified as water-soluble vitamins and fat-soluble vitamins.

1. **Fat-Soluble Vitamins:** These types of vitamins are stored in the fatty tissues of the body and liver and are stayed for the longer time. And these are absorbed through the intestinal tract with the help of lipids (fats).

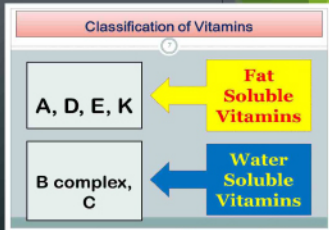
There are 4 fat-soluble vitamins :

- ▶ Vitamin A
- ▶ Vitamin D
- ▶ Vitamin E
- ▶ Vitamin K

**2. Water Soluble Vitamin:** These types of vitamins are dissolve easily in water, unable to store in the body and are excreted in the urine. These vitamins must be supplied to our bodies with regular diets. Although, the body keeps a small reserve of these vitamins, they have to be taken on a regular basis to prevent shortage in the body.

There are 9 water-soluble vitamins:

- ▶ Vitamin C
- ▶ Vitamin B-group

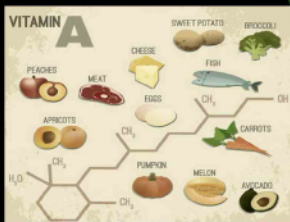


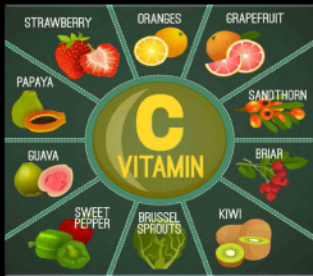
## Functions of Vitamins

Each of the vitamins listed below has an important job in the body. A vitamin deficiency occurs when you do not get enough of a certain vitamin. Vitamin deficiency can cause health problems.

**Vitamin A:** Also known as Retinol promotes cell growth, helps regulate immune system, promotes growth of healthy skin, hair and teeth and improves night vision. It helps keep eyes healthy, It strengthens the retina and maintains the good vision.

- ▶ Vitamin A is rich in oranges, yellow fruits, spinach, egg yolks, soya milk, carrots, tomatoes, green peas, watermelon, mangoes, fish liver oil, broccoli.





► **Vitamin C**, also called ascorbic acid, is an antioxidant that promotes healthy teeth and gums. It helps the body absorb iron and maintain healthy tissue. It is also essential for wound healing.

► **Vitamin D** is also known as the "sunshine vitamin," since it is made by the body after being in the sun. Ten to 15 minutes of sunshine 3 times a week is enough to produce the body's requirement of vitamin D for most people at most latitudes. People who do not live in sunny places may not make enough vitamin D. It is very hard to get enough vitamin D from food sources alone. Vitamin D helps the body absorb calcium. You need calcium for the normal development and maintenance of healthy teeth and bones. It also helps maintain proper blood levels of calcium and phosphorus.



► **Vitamin E** is an antioxidant also known as tocopherol. It helps the body form red blood cells and use vitamin K.

► Vitamin E is a **fat-soluble** nutrient found in many foods. In the body, it acts as an antioxidant, helping to protect cells from the damage caused by free radicals. Free radicals are compounds formed when our bodies convert the food we eat into energy.



- ▶ **Folate** works with vitamin B12 to help form red blood cells. It is needed for the production of DNA, which controls tissue growth and cell function. Any woman who is pregnant should be sure to get enough folate. Low levels of folate are linked to birth defects such as spina bifida. Many foods are now fortified with folic acid.
- ▶ **Pantothenic acid** is essential for the metabolism of food. It also plays a role in the production of hormones and cholesterol.
- ▶ **Riboflavin** (vitamin B2) works with the other B vitamins. It is important for body growth and the production of red blood cells.
- ▶ **Thiamine** (vitamin B1) helps the body cells change carbohydrates into energy. Getting enough carbohydrates is very important during pregnancy and breastfeeding. It is also essential for heart function and healthy nerve cells.

Vitamin	Solubility	US recommended dietary allowance	Deficiency disease	Overdose/eydrome/symptoms	Food sources
Vitamin A	Fat	900 µg/700 µg	Night blindness, hyperkeratosis, and keratomalacia <sup>11</sup>	Hypervitaminosis A	Fish in general, meat and dairy products
Vitamin B1	Water	1.2 mg/1.1 mg	Beriberi, Wernicke-Korsakoff syndrome	brownness and muscle relaxation (54)	Pork, wholemeal grains, brown rice, vegetables, potatoes, liver, eggs
Vitamin B2	Water	1.3 mg/1.1 mg	Arbitoflaviosis, glossitis, angular stomatitis		Dairy products, bananas, green beans, asparagus
Vitamin B3	Water	16 mg/14 mg	Pellagra	Liver damage (doses > 2g/day) <sup>12</sup> and other problems	Meat, fish, eggs, many vegetables, mushrooms, tree nuts
Vitamin B5	Water	5 mg/5 mg	paresthesia	Stiffness; possibly nausea and heartburn (36)	Meat, broccoli, avocados
Vitamin B6	Water	1.3–1.7 mg/1.2–1.5 mg	Anemia, <sup>13</sup> Peripheral neuropathy	Impairment of proprioception, nerve damage (doses > 100 mg/day)	Meat, vegetables, tree nuts, bananas
Vitamin B7	Water	At 30 µg/30 µg	Dermatitis, enteritis		Flax egg yolk, liver, peanuts, leafy green vegetables
Vitamin B9	Water	400 µg/400 µg	Megaloblastic anemia and deficiency during pregnancy is associated with birth defects, such as neural tube defects	May mask symptoms of vitamin B12 deficiency; other effects.	Leafy vegetables, peas, bread, cereal, liver
Vitamin B12	Water	2.4 µg/2.4 µg	Vitamin B <sub>12</sub> deficiency anemia <sup>14</sup>	None proven	Meat, poultry, fish, eggs, milk
Vitamin C	Water	90 mg/75 mg	Scurvy	Stomach pain, diarrhea and flatulence (29)	Mixy fruits and vegetables, liver
Vitamin D	Fat	15 µg/15 µg	Rickets and osteomalacia	Hypervitaminosis D	Eggs, liver, certain fish species such as sardines, certain mushroom species such as shiitake
Vitamin E	Fat	15 mg/15 mg	Deficiency is very rare; mild hemolytic anemia in newborn infants <sup>15</sup>	Possible increased incidence of congestive heart failure. <sup>16,17</sup>	Mixy fruits and vegetables, nuts and seeds, and seed oils
Vitamin K	Fat	At 110 µg/120 µg	Bleeding diathesis	Decreased anticoagulation effect of warfarin. <sup>18</sup>	Leafy green vegetables such as spinach; egg yolk; liver



THANK YOU

## Physical Education Online Class test

### Questions with Correct response and Result analysis

Q2. What are the 2 types of physical fitness?

**0 / 663**

Q9. Which of the following is the example for aerobic activities

**250 / 663**

Q 10.For endurance dominating sports the diet should be rich in---

**108 / 663**

Q.13 Aerobic efficiency can be best improved by

**221 / 663**

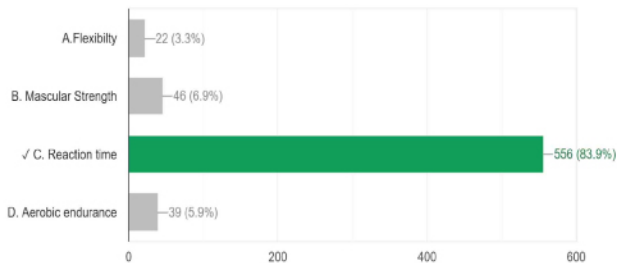
Q,14 Obesity does not cause

**267 / 663**



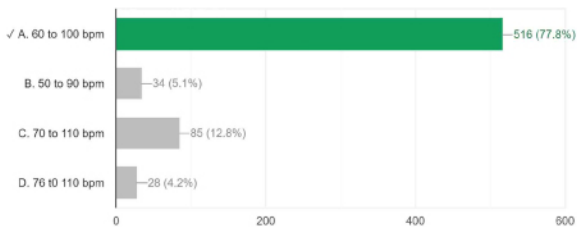
### Q3. Which of the following is not "health related fitness"

556 / 663 correct responses



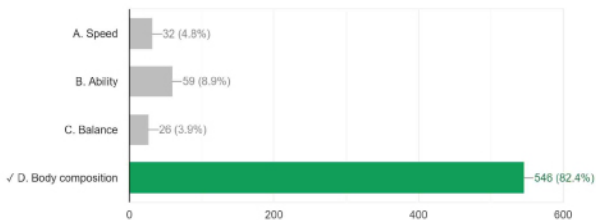
### Q4. Select the Normal resting heart rate for adults range

516 / 663 correct responses



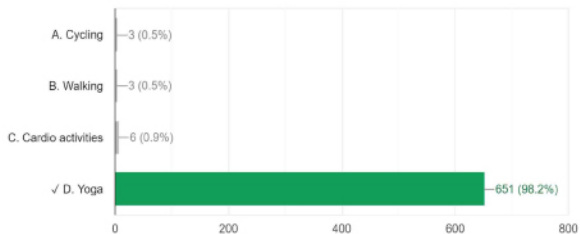
### Q5. Which of the following is not skill related fitness?

546 / 663 correct responses



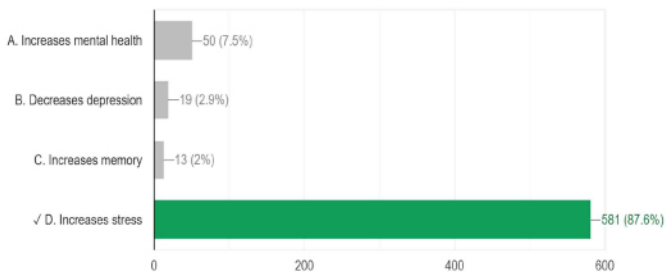
Q6. Which is the best exercise for concentration?

651 / 663 correct responses



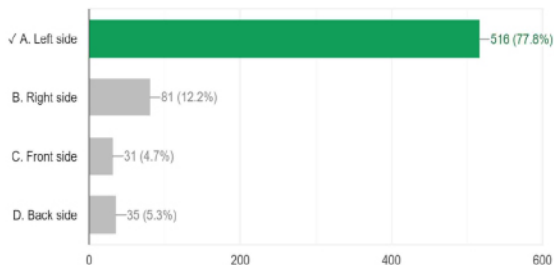
Q7. Exercise improves \_\_\_\_\_. Select the wrong answer

581 / 663 correct responses



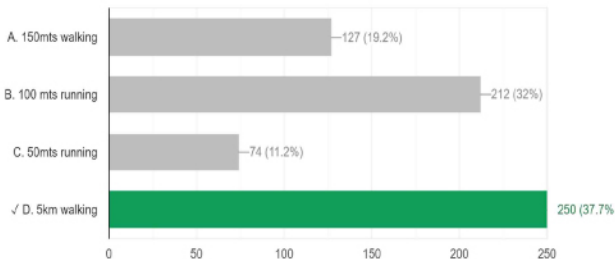
Q8. Which part of brain controls the right side's extremities

516 / 663 correct responses



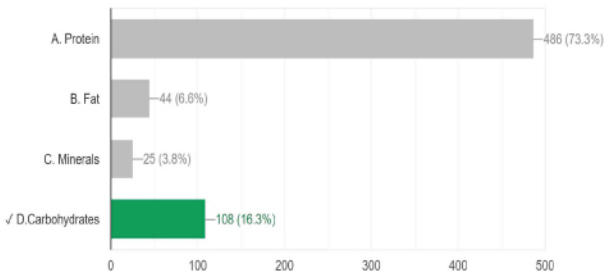
### Q9. Which of the following is the example for aerobic activities

250 / 663 correct responses



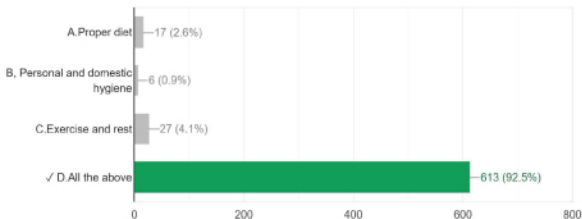
### Q 10. For endurance dominating sports the diet should be rich in---

108 / 663 correct responses



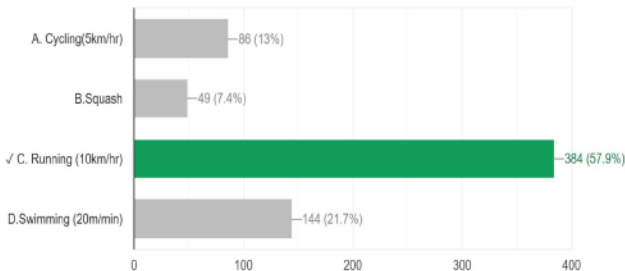
### Q 11. Necessary basic conditions for good health include

613 / 663 correct responses



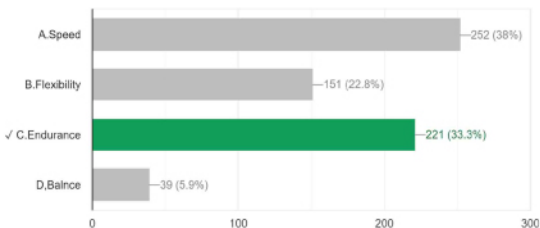
### Q.12, Which activity burns the maximum calories

384 / 663 correct responses



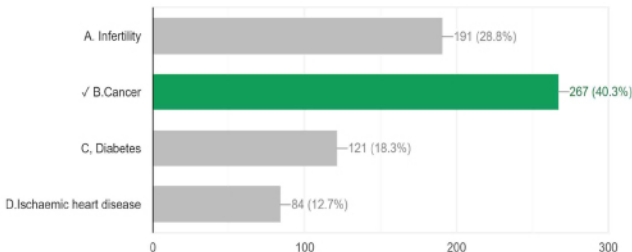
### Q.13 Aerobic efficiency can be best improved by

221 / 663 correct responses



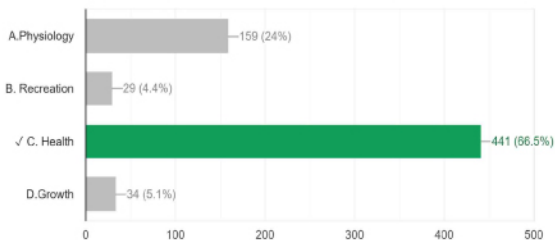
### Q.14 Obesity does not cause

267 / 663 correct responses



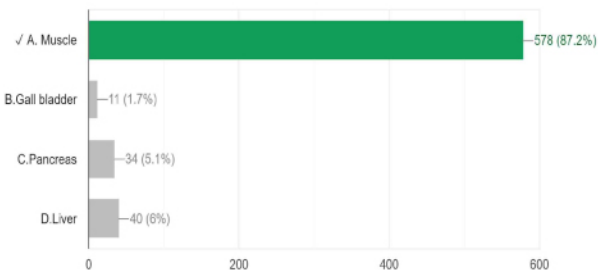
Q.15 What is a state of complete physical mental and social well being and not merely the absence of disease and deformity ?

441 / 663 correct responses



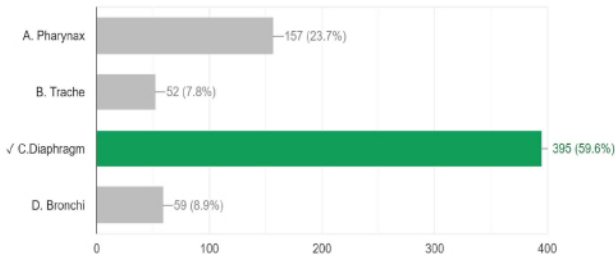
Q.16 ATP is stored in --

578 / 663 correct responses



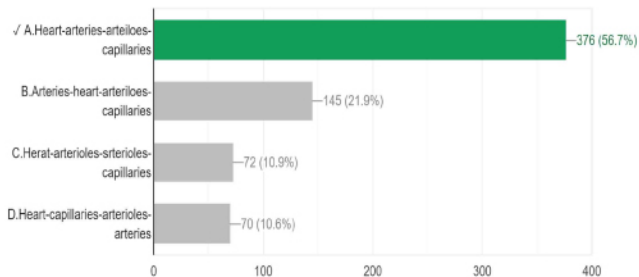
Q.17, Which of the following is not a pathway of air during respiration

395 / 663 correct responses



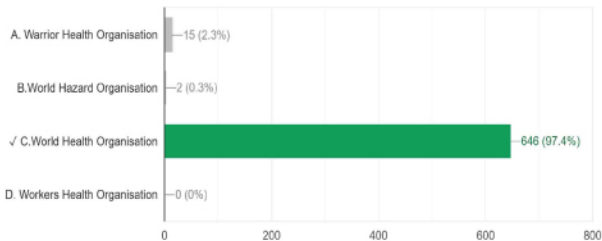
### Q.18. What is the correct sequence of blood circulation

376 / 663 correct responses



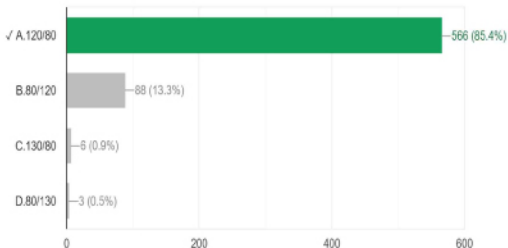
### Q.19. Expand WHO

646 / 663 correct responses



### Q.20. Normal Blood Pressure in adults is

566 / 663 correct responses





Attendance for: Class List on 2020-10-01

Names 2020-10-01 15:39 Arrival time

chinmayi h s

shahjahan iqbal

sharath k

surabhi

sinchana g

preethika

rashmitha r

suhan k amin

preetham poojary

supriya tendulkar

akash d

karthika sundar

chaya bangera

sakshi pawaskar

sharadhi prabhu

sahana sherigara

varsha sudhakar

ankitha sherugar

prajna r.k

swasthik shetty

dhanush moger

shivaraj

revathi

navya j shetty namratha j shetty

maneesha prabhu

sharan s shetty

karthik rao

raksha shetty

elvis menezes

195 72 shifali tgg 15:39 (26min) [16:05]

197 48 moolya anvita 15:39 (0min) [15:39]

197 29 sanjith upadhyaya 15:39 (1min) [15:40]

195 58 deeksha 15:39 (1min) [15:40]

195.52 aishwarya m shetty 15:39 (1min) [15:40] 15:50 (0min) [15:50]

196 04 archana bhat 15:39 (0min) [15:39]

195 08 deepthi mendon 15:39 (0min) [15:39]

196 77 k rajani bhat 15:39 (5min) [15:44]

197 49 naksha 15:39 (1min) [15:40]

196 87 lasya shetty 15:39 (0min) [15:39]

196 24 shivani shetty 15:39 (1min) [15:40] 15:42 (0min) [15:42]

195 46 sandhya kodancha 15:40 (1min) [15:40] 15:41 (1min) [15:41]

197 34 aishwarya pai 15:40 (0min) [15:40]

195 28 varshitha pavithra 15:40 (0min) [15:40]

195.12 nikitha 15:40 (1min) [16:07] 16:08 (0min) [16:08]

197 18 rashmitha 15:40 (0min) [15:40] 16:06 (0min) [16:06] 16:09 (0min) [16:09]

196 68 shreya bhat 15:40 (0min) [15:40]

196 23 sanjana 15:40 (1min) [15:40]

197 68 thwisha 15:40 (0min) [15:40]

196 84 apoorva bairy 15:40 (1min) [15:41] 15:42 (0min) [15:42] 16:05 (0min) [16:05]

195 69 ramyashree 15:40 (6min) [15:46]

19 511 kavyashree kavya. sk 15:40 (0min) [15:40] 15:47 (18min) [16:05]

197 37 anisha dmello 15:40 (2min) [16:09]

195 24 sowmya 15:40 (1min) [15:41]

195 71 sanjana 15:40 (1min) [15:41] 15:46 (0min) [15:46]

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196 91 sushila purohit 05:40 (0min) [15:40] 05:42 (0min) [15:42]  
195 75 sinchana p 05:40 (1min) [15:41]  
195 60 deeksha y 05:40 (0min) [15:40]  
197 11bhavana gaonkar 05:40 (0min) [15:40] 06:00 (2min) [16:08]  
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195 36 shrishanth 05:40 (12min) [16:18]  
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aakash anchan 05:40 (0min) [15:40] 05:57 (11min) [16:18] 06:17 (1min) [16:18]  
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195 30 akshay v kotian 05:41 (0min) [15:41]  
197 01 sanath acharya 05:41 (0min) [15:41]  
195 21 shruthi naik 05:41 (0min) [15:41]  
195 64 madhura 05:41 (0min) [15:41]  
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196 62 deeksha shetty 05:42 (3min) [15:44]  
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196 26 shreya h kotian 05:42 (0min) [15:42]  
195 50 vaishnavi 05:42 (1min) [15:42]  
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196 17 niveditha 05:42 (0min) [15:42]  
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197 05 swaroop g 05:43 (0min) [15:43]  
196 92 aman 05:43 (1min) [15:43] 05:44 (0min) [15:44]  
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196 28 shruthi 05:43 (0min) [15:43]  
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prajwal shet 05:43 (0min) [15:43] 05:55 (6min) [16:18]  
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196 64 nayana 05:43 (0min) [15:43]  
197 79 k.s.deepak 05:43 (0min) [15:43]  
196 63 kavya 05:44 (0min) [15:44]  
195.05 ashwitha 05:44 (0min) [15:44]  
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196 96 siddeshwar karande 05:44 (0min) [15:44]  
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196 69 varnitha r sanil 05:44 (0min) [15:44]  
195 20 shreya 05:44 (0min) [15:44]  
195 81 karthik prasad 05:44 (0min) [15:44]  
195 77 swathi poojary 05:44 (1min) [15:45] 05:49 (1min) [15:49]  
197 63 shreya kotian 05:44 (0min) [15:44]  
195 25 suraksha 05:44 (1min) [16:06]  
196 73 sachin shetty 05:44 (0min) [15:44]  
197 59 saphami d 05:44 (0min) [15:44]  
197 67 swathi 05:44 (0min) [15:44] 06:01 (0min) [16:01]  
195 13 pratheeksha prathi 05:44 (0min) [15:44]  
196 78 navyashree y 05:44 (13min) [16:18]  
196 07 chaithra 05:44 (0min) [15:44]  
195 57 bindiya anchan 05:44 (0min) [15:44]  
196 35 valshnavi suvarna 05:44 (0min) [15:44]  
196 15 nikitha shetty 05:44 (22min) [16:06]  
197 08 vishwas kamath 05:44 (0min) [15:44]  
196 08 harshitha shetty 05:45 (0min) [15:45]  
197 51 neha amin 05:45 (0min) [15:45]  
195 79 abhay nayak k 05:45 (1min) [15:45] 05:48 (0min) [15:48]  
197 65 sonakshi shet 05:45 (0min) [15:45] 06:01 (0min) [16:01]  
197.87 vikram borkar 05:45 (0min) [15:45]

197 47 mithula s shetty05:45 (1min) [15:45]  
196 90 shreya kalkur05:45 (2min) [15:46]  
197 84 prathik poojary05:45 (0min) [15:45]  
197 43 madeeha gulam rasool05:45 (0min) [15:45]  
195 55 anvitha05:45 (0min) [15:45]  
195 86 sharan deep05:45 (0min) [15:45]  
195 84 neville savio05:45 (0min) [15:45]  
197 45maria dsouza05:45 (0min) [15:45]  
19 733 shreeshal05:45 (22min) [16:18]  
197 64 shreya hegde05:45 (0min) [15:45]  
197 70 yashaswini j suvarna05:45 (0min) [15:45]  
195 80abhishek s k05:45 (0min) [15:45]05:55 (0min) [15:55]06:00 (1min) [16:07]  
197 20 sushmitha a poojary05:45 (0min) [15:45]  
197 19 sadhana v05:45 (0min) [15:45]05:45 (0min) [15:45]  
196 45sharan kumar05:45 (0min) [15:45]05:45 (1min) [16:07]  
196 32 sushmitha hegde05:45 (0min) [15:45]  
195 65 megha05:45 (0min) [15:45]  
196 89 sharanya devadiga05:45 (0min) [15:45]  
197 15 karunya udapa05:45 (0min) [15:45]  
197 10 bandhavya shenoy05:45 (0min) [15:45]  
19.516 sandhya05:45 (9min) [16:05]  
197 21 ankith05:46 (0min) [15:46]  
195 31dhruva s05:46 (0min) [15:46]05:46 (0min) [15:46]05:50 (0min) [15:50]06:04 (0min) [16:04]  
195 23 sneha05:46 (0min) [15:46]  
shweta pujari05:46 (0min) [15:46]05:56 (0min) [15:56]06:03 (0min) [16:03]  
197 50neha hegde05:46 (1min) [15:46]  
195 43 navya b a05:46 (0min) [15:46]05:46 (0min) [15:46]  
196 83 anusha shetty05:46 (0min) [15:46]05:46 (0min) [15:46]05:55 (0min) [15:55]  
195 06ashwitha naik05:46 (1min) [15:50]05:50 (0min) [15:50]  
196 97vaibhav05:46 (0min) [15:46]  
196 50rajath ns05:46 (31min) [16:18]  
195 74 shreya shetty05:46 (0min) [15:46]  
195 07 bhavitha b k05:46 (2min) [16:06]  
k geetha bhat05:46 (0min) [15:46]  
195 14poojashri05:46 (0min) [15:46]  
195 03 anusha05:46 (9min) [16:05]  
197 89 varun kumar05:46 (10min) [16:18]  
195 09dhruthi s05:46 (19min) [16:05]  
197 41 disha shetty05:46 (0min) [15:46]  
195 27 thanuja05:46 (0min) [15:46]05:55 (1min) [16:06]  
196 27 shreya s shetty05:46 (0min) [15:46]  
196 01aishree shetty05:46 (0min) [15:46]  
195.85 prathwick nayak05:46 (0min) [15:46]05:47 (0min) [15:47]  
196 44venkatesh kanchan05:46 (0min) [15:46]  
196 36 varsha05:46 (0min) [15:46]  
196 02 anjali hegde05:46 (0min) [15:46]06:05 (1min) [16:06]  
195.15 pratheeksha.s05:47 (0min) [15:47]  
195 73 shraddha gams05:47 (0min) [15:47]  
195 33 sangam bangeral05:47 (19min) [16:05]  
196 31 sushmitha shetty05:47 (1min) [15:47]  
196 11 kushi05:47 (0min) [15:47]  
19 686 divya shetty05:47 (10min) [16:06]  
195 24sowmya05:47 (0min) [15:47]  
195 38umarfaruq05:47 (1min) [16:06]  
197 30 sannidhi rao05:47 (21min) [16:08]  
197 55 poojari shravya05:48 (0min) [15:48]  
196 03 anusha kumar05:49 (0min) [15:49]06:16 (0min) [16:16]

197 58 sahana. s. salian 15:49 (17min) [16:06]  
197.60 savinaya kamath 15:51 (0min) [15:51]  
196 05bhoomika 15:51 (0min) [15:51]  
196 40 akhileshk devadiga 15:52 (12min) [16:18]  
197 66 sushmitha poojary 15:53 (0min) [15:53]  
197 85 Rahul Poojary 15:55 (0min) [15:55]

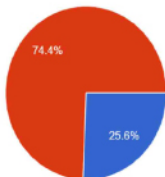
## FEEDBACK ANALYSIS

### Students Feedback on Physical Education Online Classes

Total number of Students response -743

Name : Sri Sukumar  
Physical Education Director  
Poornaprajana College Udipi

Gender  
743 responses

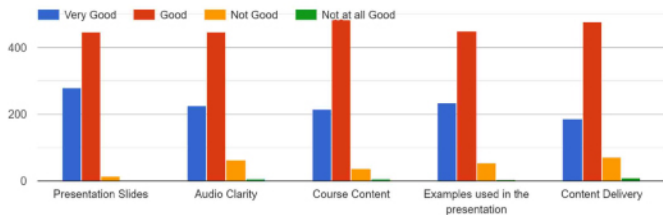


● Male  
● Female

**Male -190**  
**Female -553**



Please indicate your perception on the following aspects



**Total number of students response 743**

**Presentation slide: very good - 281**

: **Good - 446**

: **Not good - 15**

: **Not at all good - 00**

**Course Content ; Very good - 214**

: **Good - 486**

: **Not good - 37**

: **Not at all good - 06**

**Example use in the Presentation: Total numbers of response 743**

: **Very good - 236**

: **Good - 450**

: **Not good - 53**

: **Not at all good - 04**

**Content delivery: total number of response 743**

: **Very good - 185**

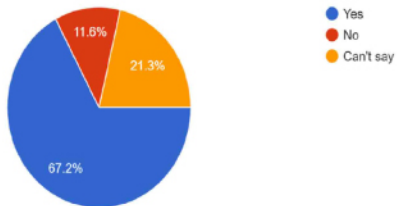
: **Good - 447**

: **Not good - 72**

: **Not good at all - 08**

**Audio clarity** : **Very good** --227  
: **Good** -- 447  
: **Not good** -63  
: **Not good at all** -6

Do you think Physical Education Online theory classes were useful to you?  
743 responses



**Yes - 499**

**Can't say- 158**

**No - 96**

