

# SPECIFICATION GRID 2081

## First Term Exam-2081

Class: 6

Subject: Science & Technology

F.M. 50

Time: 2 Hr

| S.N | Unit                         | Working hour | Group wise marks | Unit wise marks | K 20%                | U 30%                | A 30%                | H.A 20%              |
|-----|------------------------------|--------------|------------------|-----------------|----------------------|----------------------|----------------------|----------------------|
| 1   | Scientific learning          | 10           | 25               | 13 ± 2          | MCQ (2x1)            | MCQ (3x1)            | MCQ (3x1)            | MCQ (2x1)            |
| 2   | Organism and their structure | 15           |                  | 12 ± 2          |                      |                      |                      |                      |
| 3   | Matter                       | 15           | 13               | 13 ± 2          | VS (2x1)<br>SQ (1x2) | VS (2x1)<br>SQ (3x2) | VS (2x1)<br>SQ (3x2) | VS (2x1)<br>SQ (1x2) |
| 4   | Energy in Daily life         | 20           | 12               | 12 ± 2          |                      |                      |                      |                      |
|     |                              |              |                  |                 | LQ (1x4)             | LQ (1x4)             | LQ (1x4)             | LQ (1x4)             |
|     | Total                        | 60           | 50               | 50              | 10                   | 15                   | 15                   | 10                   |

K = Knowledge, U = Understanding, A = Application, H.A = Higher Ability

| S.N. | Question Type                   | Marking Schedule | Total |
|------|---------------------------------|------------------|-------|
| 1    | Multiple Choice Questions (MCQ) | 10x1             | 10    |
| 2    | Very Short Questions (VSQ)      | 8x1              | 8     |
| 3    | Short Questions (SQ)            | 8x2              | 16    |
| 4    | Long Questions (LQ)             | 4x4              | 16    |

# SPECIFICATION GRID – 2081

## Second Term Exam – 2081

Class: 6

Subject: Science & Technology F.M: 50 Time: 2 Hr

| S.N | Unit                         | Working hour | Group wise marks | Unit wise marks | K 20%  | U 30%  | A 30%  | H.A 20%  |
|-----|------------------------------|--------------|------------------|-----------------|--|--|--|--|
| 1   | Scientific learning          | 10           | 13               | 8 ± 2           | MCQ<br>(2x1)<br><br>VSQ<br>(2x1)<br><br>SQ<br>(1x2)<br><br>LQ<br>(1x4) | MCQ<br>(3x1)<br><br>VSQ<br>(2x1)<br><br>SQ<br>(3x2)<br><br>LQ<br>(1x4) | MCQ<br>(3x1)<br><br>VSQ<br>(2x1)<br><br>SQ<br>(3x2)<br><br>LQ<br>(1x4) | MCQ<br>(2x1)<br><br>VSQ<br>(2x1)<br><br>SQ<br>(1x2)<br><br>LQ<br>(1x4) |
| 2   | ICT                          | 30           |                  | 5 ± 2           |  |  |  |  |
| 3   | Organism and their structure | 15           | 9                | 9               |  |  |  |  |
| 4   | Force and Motion             | 10           | 12               | 8 ± 2           |  |  |  |  |
| 5   | Energy in daily life         | 20           |                  | 4 ± 2           |  |  |  |  |
| 6   | Matter                       | 15           | 12               | 4 ± 2           |  |  |  |  |
| 7   | Materials used in daily life | 10           |                  | 8 ± 2           |  |  |  |  |
| 8   | Earth and space              | 10           | 4                | 4               |  |  |  |  |
|     | Total                        | 120          | 50               | 50              | 10   | 15   | 15   | 10   |

K= Knowledge , U= Understanding , A= Application, H.A = Higher Ability

| S.N | Question type                  | Marking schedule | Total |
|-----|--------------------------------|------------------|-------|
| 1   | Multiple choice question (MCQ) | 10x1             | 10    |
| 2   | Very short question (VSQ)      | 8x1              | 8     |
| 3   | Short question (SQ)            | 8x2              | 16    |
| 4   | Long question (LQ)             | 4x4              | 16    |

## SPECIFICATION GRID 2081

### Third Term Exam – 2081

**Class : 6**

**Subject: Science &Technology**

**F.M : 50 Time : 2 Hr**

| S.N | Unit                         | Working Hour | Group wise marks | UNIT WISE MARKS | K 20%  | U 30%  | A 30%  | H.A 20%  |
|-----|------------------------------|--------------|------------------|-----------------|--|--|--|--|
| 1   | Scientific learning          | 10           | 9                | 4 ± 2           | MCQ (2x1)<br><br>VSQ (2x1)<br><br>SQ (1x2)<br><br>LQ (1x4) | MCQ (3x1)<br><br>VSQ (2x1)<br><br>SQ (3x2)<br><br>LQ (1x4) | MCQ (3x1)<br><br>VSQ (2x1)<br><br>SQ (3x2)<br><br>LQ (1x4) | MCQ (2x1)<br><br>VSQ (2x1)<br><br>SQ (1x2)<br><br>LQ (1x4) |
| 2   | ICT                          | 30           |                  | 5 ± 2           |  |  |  |  |
| 3   | Organism and their structure | 15           | 14               | 8 ± 2           |  |  |  |  |
| 4   | Biodiversity and Environment | 15           |                  | 6 ± 2           |  |  |  |  |
| 5   | Force and Motion             | 10           | 12               | 4 ± 2           |  |  |  |  |
| 6   | Energy in daily life         | 20           |                  | 3 ± 2           |  |  |  |  |
| 7   | Electricity and Magnetism    | 15           |                  | 5 ± 2           |  |  |  |  |
| 8   | Matter                       | 15           | 8                | 4 ± 2           |  |  |  |  |
| 9   | Materials Used In Daily life | 10           |                  | 4 ± 2           |  |  |  |  |
| 10  | Earth and space              | 10           | 7                | 7               |  |  |  |  |
|     | Total                        | 150          | 50               | 50              | 10   | 15   | 15   | 10   |

K= knowledge , U= Understanding , A = Application , H.A = Higher Ability

| S.N. | Question Type                   | Marking Schedule | Total |
|------|---------------------------------|------------------|-------|
| 1    | Multiple Choice Questions (MCQ) | 10x1             | 10    |
| 2    | Very Short Questions (VSQ)      | 8x1              | 8     |
| 3    | Short Questions (SQ)            | 8x2              | 16    |
| 4    | Long Questions (LQ)             | 4x4              | 16    |

## SPECIFICATION GRID 2080

### Final Term Exam – 2080

**Class :6**

**Subject: Science & Technology**

**F.M : 50 Time : 2 Hr**

| S.N | Unit                         | Working Hour | Group wise marks | UNIT WISE MARKS | K 20%     | U 30%     | A 30%     | H.A 20%   |
|-----|------------------------------|--------------|------------------|-----------------|-----------|-----------|-----------|-----------|
| 1   | Scientific learning          | 10           | 12               | $3 \pm 2$       | MCQ (2x1) | MCQ (3x1) | MCQ (3x1) | MCQ (2x1) |
| 2   | ICT                          | 30           |                  | $9 \pm 2$       |           |           |           |           |
| 3   | Organism and their structure | 15           | 13               | $5 \pm 2$       |           |           |           |           |
| 4   | Biodiversity and Environment | 15           |                  | $5 \pm 2$       |           |           |           |           |
| 5   | Life Process                 | 10           |                  | $3 \pm 2$       | VSQ (2x1) | VSQ (2x1) | VSQ (2x1) | VSQ (2x1) |
| 6   | Force and Motion             | 10           | 14               | $3 \pm 2$       | SQ (1x2)  | SQ (3x2)  | SQ (3x2)  | sQ (1x2)  |
| 7   | Energy in Daily life         | 20           |                  | $6 \pm 2$       |           |           |           |           |
| 8   | Electricity and Magnetism    | 15           |                  | $5 \pm 2$       | LQ (1x4)  | LQ (1x4)  | LQ (1x4)  | LQ (1x4)  |
| 9   | Matter                       | 15           | 8                | $5 \pm 2$       |           |           |           |           |
| 10  | Materials Used In Daily life | 10           |                  | $3 \pm 2$       |           |           |           |           |
| 11  | Earth and space              | 10           | 3                | 3               |           |           |           |           |
|     | Total                        | 160          | 50               | 50              | 10        | 15        | 15        | 10        |

K= knowledge , U= Understanding , A = Application , H.A = Higher Ability

| S.N. | Question Type                   | Marking Schedule | Total |
|------|---------------------------------|------------------|-------|
| 1    | Multiple Choice Questions (MCQ) | 10x1             | 10    |
| 2    | Very Short Questions (VSQ)      | 8x1              | 8     |
| 3    | Short Questions (SQ)            | 8x2              | 16    |
| 4    | Long Questions (LQ)             | 4x4              | 16    |

First Terminal Examination - 2081

Class - Six

F.M = 50

Subject - Science Time - 2 hr.

P.M = 20

Group - A

10 x 1 = 10

Choose the correct alternatives.

1. How many seconds are there in a day ?  
i) 86400s ii) 8400s iii) 80600s iv) 86000s
2. The SI unit of current is .  
i) watt ii) Newton iii) Ampere iv) Joule
3. The total space occupied by an object is called.  
i) kilogram ii) Volume iii) Area iv) Temperature
4. In which class animals is jaw modified in to beak ?  
i) Pisces ii) Reptilia iii) Amphibia iv) Aves
5. What is the process to lose extra water vapour from plants ?  
i) to store extra food ii) to store extra water iii) to walk easily iv) to respire
6. Which condition has a kinetic energy ?  
i) Compressed spring ii) Flowing water iii) Raised hammer iv) Flying bird
7. How much energy does 2 kg stone at 10 m height has ?  
i) 916 N ii) 619 iii) 196 N iv) 491 N
8. When sugar is mixed with water it forms .  
i) solution ii) solvent iii) solute iv) Heterogeneous mixture
9. Ink is a mixture of different coloring substances which is soluble in .  
i) Soft drinks ii) Water iii) Chemicals iv) alcohol
10. Which one of the following is heterogeneous mixture ?  
i) Soda water ii) sugar solution iii) Rice mixed with other grains iv) Air

Group - B 8 x 1 = 8

Very short questions

1. Define scientific learning process.
2. What is measurement ?
3. Define Adaptation.
4. Why goat is a herbivores ?
5. What do you mean by mechanical energy ?
6. What are the examples of kinetic energy ?
7. Define mixture .
8. what do you mean by condensation ?

Group - C 8 x 2 = 16

Short answer questions

1. What are the steps of scientific learning process ?
2. Define the following term Temperature and Area .
3. How do the vines of cucumbers, beans, gourd climb up the support ?

4. Fish can survive inside water but we cannot why ?
5. What is the kinetic energy of a ball of 200g mass thrown with a speed of 25 m/s ?
6. State the law of conservation of energy .
7. Define alloy. What type of mixture is alloy ?
8. Differentiate between homogenous and heterogeneous mixture.

Group - D long Questions                      4 x 4 = 16

1. a. Convert the Following .  
i) 2.5 kg in to gram   ii) 5 hour in to second  
b. Draw a neat and clean diagram of simple thermometer.
2. How are gymnosperms and angiosperms similar ? Are there any differences between them ?  
Point out the differences as well.
3. Define energy transformation. How does the transformation of energy occur from the food we eat ?
4. The wheat flour (Maida) mixed with the water and the wheat flour mixed with milk look much similar but the mixture of Maida and water is a heterogeneous mixture and the mixture of Maida and milk is a homogenous mixture. Why ?

THE END

Second Terminal Examination - 2081

Class - Six

F.M = 50

Subject - Science

Time - 2 hr.

P.M = 20

Group - A

10 x 1 = 10

Choose the correct alternatives.

1. What is the SI unit of time ?  
i) Kilogram ii) Second iii) Joule iv) Meter
2. Which of the following is a indoor equipment's?  
i) Computer ii) Tractor iii) Thresher iv) Helicopter
3. IPO stands for .  
i) Information processing processing ii) Input process output  
iii) Ink process output iv) Information processing cycle
4. What is the adaptive features of burrowing animals ?  
a. Hairy tail ii) Thick fur coat iii) Large claws iv) Large eyes
5. How does the white fur of polar help ?  
i) Camouflage ii) Crisp iii) Predation iv) Crawling
6. What is the standard unit of energy ?  
i) Newton ii) Flowing water iii) Raised Hammer iv) Flying Bird
7. The process of not changing its position of a body relative to another body is called  
i) Motion ii) Force iii) Rest iv) Transformation of force
8. When sugar is mixed with water it forms .  
i) Solvent ii) Solution iii) Heterogeneous mixture iv) Solute
9. All the metals except are solid at ordinary temperature.  
i) oxygen ii) Mercury iii) Hydrogen iv) Zinc
10. Which one of the following is the parent material of soil ?  
i) Air ii) Mineral iii) Micro - organism iv) organic matter .

Group - B

8 x 1 = 8

Very short questions

1. What is scientific learning ?
2. List two main components of computer .
3. What are carnivores ?
4. Define simple machine.
5. What is thermometer ?
6. What do you mean by heterogeneous mixture?
7. Write the chemical name of sugar .
8. Define humus in short.

Group - C

8 x 2 = 16

Short answer questions.

1. Define thermal gun. What is it used for ?
2. Write two precautions while using smart phone .
3. Write any two features of herbivores.
4. Draw a neat and clean diagram of  
i) Pulley ii) Nut cracker
5. What is the potential energy in a ball of mass 2 kg at a height of 5 m ?
6. What types of mixture is called homogeneous mixture. Write two examples.
7. Write two differences between metals and non - metals.
8. Define soil. Write different components of it.

Group - D long Questions                      4 x 4 = 16

1. What is SI unit? Write three difference between local and standard units.
2. Why are dolphin and whales classified as Mammalia although they live in water as fish ?  
Mention any four reason.
3. Differentiate between soap and detergent. Write any four chemicals used as food materials with two uses of each.
4. Which method is used to separate different components of ink ? Explain why you have chosen this method.

THE END

Third Terminal Examination - 2081

Class - Six

F.M = 50

Subject - Science

Time - 2 hr.

P.M = 20

Group - A

10 x 1 = 10



Choose the correct alternatives.

1. What is the melting point of ice ?  
i)  $100^{\circ}\text{C}$    ii)  $0^{\circ}\text{C}$    iii)  $70^{\circ}\text{C}$    iv)  $10^{\circ}\text{C}$
2. Which of the following is not a modern technology ?  
i) Refrigerator   ii) Tractor   iii) Fan   iv) Okhal
3. Which of the following animals have a constant body temperature.  
i) fish   ii) Crocodile   iii) Snake   iv) Human being
4. Which of the following is not an abiotic factor ?  
i) Soil   ii) Carbon   iii) Plant   iv) Sun
5. What is not true about simple machine ?  
i) Reduces the applied force  
ii) Does more work  
iii) Changes the direction of applied force  
iv) Speeds of the work
6. The property of light that transmits in a straight path is called.  
i) straight transmission   ii) Shining propagation   iii) Rectilinear propagation  
iv) None of the above
7. Which of the following is a magnetic substances ?  
i) Stone   ii) Rubber   iii) Mud   iv) Iron nail
8. Which of the following is the mixture separating method ?  
i) Evaporation   ii) Distillation   iii) Chromatography   iv) All of the above
9. Which of the following properties is generally not shown by a metal ?  
i) Conduction of heat   ii) dull surface   iii) conduction of electricity   iv) Sonorous nature
10. What is the distance between sun and the earth is ?  
i) 150000 KM   ii) 150 million KM   iii) 15 million Km   iv) 130000KM

Group - B

8 x 1 = 8

Very short questions

1. Define unit .
2. What are complex machine ?
3. Define camouflage.
4. What do you mean by biodiversity ?
5. What is linear motion ?
6. Define electromagnet.
7. What is distillation ?
8. List two examples of non - metals.

Group - C

8 x 2 = 16

Short answer questions

1. Why was SI unit adopted all over the world ?
2. What is the pattern of computer functioning ?
3. List out the features of aquatic animals that help them to live in water.
4. Write two differentiate between rest and motion.
5. Define a shadow . How many types of shadow are there ?

6. What are the two uses of solution in our daily life ?
7. What is stain remover ? When should we use this chemical ?
8. Draw a neat and clean labelled diagram of internal structure of earth.

Group - D long Questions

4 x 4 = 16

1. What are the steps in scientific learning ? Convert one day in to second .
2. What differences and similarities are there between aves and mammals ?
3. Define soil conservation. Mention three methods of soil conservation.
4. What is solar system ? Differentiate between inner planets and outer planets.

THE END