

**DELHI PUBLIC SCHOOL**

**GAYA**

**CLASS – IX ASSIGNMENT-1 FOR SUMMER VACATION 2018–19**

**SUBJECT – ENGLISH**

1. Your summer vacation is about to start and you have planned to do a short-term course on personality development. Write a letter to the Director, Personal Care, Hyderabad, enquiring about the course details. You are Rohan/Rohini of VasantVihar, New Delhi. (100-120 words)
2. Poetry is said to be an expression of feelings. Write a poem summarizing your experience of the summer vacation.
3. In the following passage, one word has been omitted in each line. Write the missing word along with the word that comes before and the word that comes after it in your copy against the correct blank.

	<b>Before</b>	<b>Missing Word</b>	<b>After</b>
I am very fond my	(a)	_____	_____
grandparents I	(b)	_____	_____
loved my childhood days.	(c)	_____	_____
They the backbone of our	(d)	_____	_____
family. I not imagine a	(e)	_____	_____
life them.	(f)	_____	_____

**SUBJECT – HINDI**

1. भारत के प्रमुख वैज्ञानिकों की सूची उनके कार्यों व योगदानों के साथ बनाइए।
2. टी0वी0 में दिखाए जाने वाले विज्ञापनों में से आपको सबसे अच्छा लगने वाले किसी एक विज्ञापन के बारे में कारण सहित लिखिए।
3. 'जीवन संघर्ष का ही नाम है' – इस विषय पर अपने माता – पिता की सहायता से 90–100 शब्दों में एक अनुच्छेद लिखिए।
4. आपकी पाठ्य पुस्तक स्पर्श के 'दुख का अधिकार' पाठ के पात्र भगवाना की माँ जैसी किसी दुखिया के जीवन के बारे में जानकारी प्राप्त कर उसकी कहानी अधिकतम 150 शब्दों में लिखिए।
5. अपने माता – पिता से उनके पर्यटन अनुभव के बारे में जानकारी प्राप्त कर 50–60 शब्दों में लिखिए।

**SUBJECT – MATHEMATICS**

1. Find five rational numbers between  $\frac{3}{5}$  and  $\frac{2}{3}$ .
2. Express  $0.5\bar{7}$  as a fraction in simplest form.
3. If  $a$  and  $b$  are rational numbers and  $\frac{4+3\sqrt{5}}{4-3\sqrt{5}} = 4 + b\sqrt{5}$  find the values of  $a$  and  $b$ .
4. Find the value of  $a$  for which is a factor of the polynomial  
 $f(x) = x^5 - a^2x^3 + 2x + a - 3$
5. Factorize :  $a(a - 1) - b(b - 1)$
6. Factorize :  $x^4 - 3x^2 + 2$
7. Factorize :  $x^6 - 7x^2 + 8$

## **SUBJECT – SCIENCE**

### **Physics**

1. A car travels at 54 km/h for first 20 s, 36 km/h for next 30 s and finally 18 km/h for next 10 s. Find its average speed.
2. Define acceleration and give its SI unit. When is acceleration of a body negative? Give two examples of situations in which acceleration of the body is negative.
3. Distinguish between uniform motion and non-uniform motion. Is uniformly accelerated motion uniform motion? Give one example each of uniform and non-uniform motion.
4. The speedometer readings of a car are shown below. Find the acceleration of the car and its displacement.

<b>Time</b>	<b>Speedometer</b>
9:25 am	72 km/h
9:45 am	36 km/h

5. Define uniform circular motion and give example of it. Why is it called accelerated motion?

### **Chemistry**

1. You are provided with a mixture of naphthalene and ammonium chloride by your teacher. Suggest an activity to separate them with well labelled diagram.
2. Doctors advise to put strips of wet cloth on the forehead of a person having high temperature. Why?
3. State the characteristics of gas used in supplying oxygen cylinders to hospitals.
4. Why does the level of water not change when sugar is dissolved in it?
5. ‘Osmosis is a special kind of diffusion.’ Comment.
6. Discuss the various factors which affect the rate of evaporation. Latent heat of evaporation of two liquids A and B is 100J/kg and 150J/kg respectively. Which one can produce more cooling effect and why?

### **Biology**

1. Define the term “Cell and Tissue”.
2. Why cell is known as “structural, functional and hereditary unit of all living organism”?
3. Name and draw the longest cell found in our body.
4. What is membrane biogenesis? Explain.
5. Explain the role of plasma membrane and Nucleus of a cell.
6. What will happen if a plant cell is put in a hypotonic and hypertonic solution?
7. What is Plasmolysis?
8. Draw a labelled diagram of Plant cell and Animal cell.
9. Explain various types of Epithelial tissues found in our body.

## **SUBJECT – SOCIAL SCIENCE**

### **History/Civics**

1. What were the main causes of the French Revolution?
2. Describe the fall of Bastille. What was its significance?
3. What was the legacy of the French Revolution?
4. Describe various political group in the Legislative Assembly.
5. Explain the various dimensions of democracy.
6. Distinguish between democratic and non-democratic regions.
7. What is direct and indirect democracy?
8. What is one person, one vote, one value?

## Geography

1. Demarcate 10 important peaks of Himalayas on an outline map of India.
2. Prepare a report on physical and economical impact and significance of Ganga.
3. Derive the commercial utility of Eastern coast of India.

## Economics

1. Elaborate the features of village Palampur.
2. What are the various methods by which productivity from a given piece of land can be enhanced?

## SUBJECT – SANSKRIT

1. भवान् स्व परिजनेन् सह ग्रीष्मावकासावसरे भ्रमणाय इतस्ततः गच्छतु ततः आगत्य भ्रमणयात्रायाः उपरि दशवाक्येषु यात्रावृत्तान्तं रचयत ।
2. ग्रीष्मावसरे वृक्षस्य का उपयोगिता कानि पर्वाणि भवन्ति, आम्र, जम्बुफलस्य रस गुण गानं एतत् सर्वं एकस्यां पत्रिकायां सचित्रं संकलनं करोतु ।
3. व्याकरणे  
पत्राणिपूरयत् –  
पत्र संख्या – 1,2,3,4,5
4. चित्राणि रचयत, वर्णनं च कुरुत  
चित्र संख्या – 1,2,3,4,5 (पृष्ठ 80)
5. शब्द रूपाणि स्मरत ।  
इकारान्त – पु० – कवि, सखि, भूपति  
उकारान्त पु० – साधु  
ऋकारान्त पु० – पितृ, दातृ  
सर्वनाम् – इदम् शब्द – पु०, स्त्री०, नपु०
6. धातु रूपाणि स्मरत –  
लङ्. लकारे – खाद्, पठ्, लिख्, भू, वद्  
विधिलिङ्. लकारे – पठ्, खाद्, लिख्, भू, वद्, स्था