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# Kalpna Chawla: The Star

## Discuss

1. Who was the first person to travel into space?
2. Who was the first Indian to travel into space?
3. Who was the first Indian woman to go into space?



Kalpana Chawla, the first Indian woman astronaut, was bold enough to make her career in aeronautics. She was a source of inspiration to her friends and colleagues. She is a role model for many young Indian girls and women. This is an imaginary interview conducted in her own school.

Children : Good morning, madam! We are from Tagore School, Karnal. We would like to ask you a few questions before you leave for your space mission.

Kalpana : Good morning children! Sure. Go ahead.

Navya : Please tell us about your childhood.

Kalpana : Well! I was born on 1 July 1961 in Karnal, Haryana. I had always dreamt about flying when I was a child. In fact, I thought of going farther than the pilots and wanted to become an astronaut at the age of thirteen.

Shubham : Do tell us more about yourself.

Kalpana : (laughing) Well! I am a strict vegetarian. I respect my teachers. I like reading, flying, and bird-watching.

Anand : What did you study to become an astronaut?

Kalpana : After passing Higher Secondary Examination from Tagore school, Karnal in 1976 I joined the Punjab Engineering College, Chandigarh for my Bachelor's Degree in Aeronautical Engineering in 1982. I then went to the University of Texas, USA for my Master's Degree in Aerospace Engineering in 1984. I earned my Ph.D in the same subject from the University of Colorado,

USA in 1988.

**Yash** : How did you join NASA?

**Kalpana** : That's an interesting story. Initially I had joined NASA as a research scientist in 1995 and worked for them at the Ames Research Centre. But then, inspired by the Indian pilot J.R.D. Tata, I tried hard and was ultimately selected for my first flight in 1986.

**Rohan** : How was your first space mission?

**Kalpana** : I took off my first space mission in the Space shuttle Columbia on 19 November 1997. The flight was called STS-87. I worked with my six-member space crew as a mission specialist and prime robotic arm operator. I enjoyed every moment of it.

**Shubham** : Thank you, Madam.

**Kalpana** : You're welcome.

**NASA** : National Aeronautics and Space Administration. NASA is a U.S. government organization that carries out research into space and organizes space travel.

**ISRO** : Indian Space and Research Organization is our government organisation that carries out researches into space and organizes space travel and launches satellites into space.

## GLOSSARY:

took off	: got ready to fly (उड़ान भरी)
crew	: persons working on a ship or plane (जहाज, विमान आदि के सभी कर्मचारी)
unfortunately	: unluckily (दुर्भाग्यवश)
prior	: previous time (पूर्व)
spacecraft	: a rocket (अन्तरिक्ष यान)
snag	: problem (समस्या)
perished	: destroyed (नष्ट)
grieved	: felt sad (दुखी हुआ)
asteroids	: small planets that go around the Sun. (उल्का पिण्ड)
planet	: a large star that goes around the sun (ग्रह)
mars	: a planet (मंगल)
meteorological	: related to weather science (मौसम विज्ञान संबंधी)
dormitory	: a building where students can live (छात्रावास)
aeronautics	: the science or practice of building and flying aircraft, (विमानविज्ञान)
astronaut	: space traveller (अंतरिक्ष यात्री)
colleagues	: co-workers (सहकर्मी)
ultimately	: finally (आखिर में)
mission	: campaign (अभियान)
vegetarian	: one who does not eat meat (शाकाहारी)
robotic	: related to robot, mechanical (यंत्रमानव शास्त्र से संबंधित / यांत्रिक)

specialist : expert (विशेषज्ञ)  
prime : chief (मुख्य)

## Activity - I

### A. Answer the following questions in one or two sentences:

1. When and where was Kalpana Chawla born?
2. What were her hobbies?
3. Who inspired her to fly?
4. When did she first fly into space?
5. How many experiments did the crew of Flight STS-107 perform?

### B. Say whether the following statements are true or false:

1. Kalpana wanted to become a computer engineer. ( )
2. Kalpana Chawla is a role model for many young Indian girls and women. ( )
3. J.R.D. Tata was a source of inspiration for Kalpana. ( )
4. Kalpana did her Ph.D in Aerospace Engineering in 1984. ( )

## Activity - II

### A. Write the opposites of the words given in brackets:

1. Kalpana Chawla ..... on 1 February 2003. (born)
2. My grandmother is ..... (young)
3. Lalit felt ..... in his friend's company. (uncomfortable)
4. Good ..... friends. (evening)



## B. Read the sentence:

Please make yourself comfortable.

The word 'comfortable' has been formed by adding 'able' to the word 'comfort'. This word 'comfortable' describes something and it is called an adjective.

Now make more words by adding 'able' to them and write their meanings:

- |                |                 |
|----------------|-----------------|
| 1. read.....   | 2. enjoy.....   |
| 3. change..... | 4. compare..... |
| 5. sale.....   | 6. pity.....    |
| 7. drink.....  | 8. wash.....    |
| 9. eat.....    | 10. notice..... |

## C. Fill in the blanks the missing letters:

- |            |             |             |
|------------|-------------|-------------|
| 1. mad_m   | 2. childr_n | 3. d_gree   |
| 4. mil_ion | 5. fl_ght   | 6. op_rat_r |

## Activity - III

### A. Study the following sentences alongwith the underlined words in them:

1. Ankit gets up at 6.00 a.m. daily.
2. We play games at 5.00 p.m. daily.
3. She wanted to be a pilot at the age of thirteen.
4. Ravi passed my Secondary Examination in 1957.
5. Santosh goes for a walk in the morning.
6. Mahesh went on a tour in June last year.

7. Our country become free on 15th August, 1947.
8. She was born on July 1st
9. They'll be here on Monday.

In sentence 1, 2 and 3 the underlined word 'at' refers to a particular time when something happens. In sentence 4,5 and 6 the underlined word 'in' refers to a period during which something happens. In sentence 7,8 and 9 the underlined word 'on' refers to a particular date or day when something happens.

So 'at' is used to refer to a specific time, 'in' is used to refer to a period of time of the day, month, year, etc and 'on' is used to refer to the day, date, etc. when something takes place.

**Fill in the blanks with 'at' 'in' or 'on':**

1. I take my lunch.....1.30 p.m.
2. They met me..... the evening.
3. Sunil was born.....1 March, 2008.
4. The cricket match will be..... the next Sunday.
5. We usually have summer vacation.....June every year.
6. .... the day of Deepawali we decorate our houses.
7. The accident took place .....5.00 a.m. yesterday.
8. The Chetak train arrives at the station.....7.00 p.m. everyday.

**B. Read the following sentences carefully.**

Santa writes neatly.

The boys are waiting outside.

She left early.

The underlined words tell you how, where or when an action takes place. These words are called adverbs. The adverbs add something to the meaning of a verb, an adjective or another adverb.

**Now underline the adverbs in the following sentences:**

1. She behaved foolishly.
2. We looked for her everywhere.
3. The children laughed loudly.
4. The school will open tomorrow.
5. The soldiers fought bravely.
6. She wrote to me yesterday.
7. He lives here.
8. The old man walked slowly.
9. She ran fast.
10. The bus stops there.

**Activity - IV**

**A. The teacher will read out the paragraph related to Kalpana Chawla and the student will listen to him/her and then answer the following questions:**



The space shuttle Columbia Flight STS-107 took off as scheduled. The crew successfully performed eighty experiments in space. Unfortunately, 16 minutes prior to landing, their spacecraft developed a snag. Columbia perished with her crew on 1 February 2003. The whole world grieved at the loss.

Kalpana was awarded several honours after her death.

- A heavenly body (Asteroid 51826) is re-named Kalpana Chawla.
- A hill on the planet Mars is also named after her.
- On her death, her brother Sanjay Chawla, remarked, “To me, my sister is not dead. She is immortal. She is permanent star in the sky”.
- The Prime Minister of India made an announcement on Feb. 5, 2003 to name the meteorological series of Satellites as Kalpana.
- A dormitory was established in 2004 under the name **Kalpana Chawla Hall**, at the University of Texas.
- A super computer was dedicated to Kalpana by NASA.



इस गद्यांश के कठिन शब्दार्थ glossary में दिए गए हैं।

1. Name the shuttle that was destroyed.
2. What did the world grieve at?
3. Name Kalpana Chawla's brother?
4. Which two things have been named after her?
5. Who is immortal?

**B. Imagine that you are a reporter of a famous magazine for children. You have to interview one of the children (of your class) as you have come to know that he has attained first place in the District Middle Board Examination.**

Complete the interview with the help of the clues given below.

**Reporter** : Congratulations, Master Deepak. I am from 'The Daily Times.' I would like to ask you a few questions on your brilliant success.

**Deepak** : Thank you, sir. Please have a seat.

**Reporter** : Which position did you attain in the District Middle Board Examination?

**Deepak** : .....

**Reporter** : How did you get the first position in District Middle Board Examination ?

**Deepak** : .....

**Reporter** : How did you feel after getting first position ?

**Deepak** : .....

**Reporter** : What did your teachers say to you ?

**Deepak** : They.....(congratulated).....

**Reporter** : What did you say to them ?



Deepak : I.....(thanked).....

**C. Listen to your teacher and speak after her/him the following words :**

1. take, lake, make, ray, way, day, play, away, may
2. live, leave; it, eat; sit, seat; hit, heat; bit, beat; knit, neat.

**D. Also speak out some more words which describe things, people, places and animals, etc.**

e.g. good, bad, fine, easy, beautiful, tall

- |        |        |
|--------|--------|
| 1..... | 4..... |
| 2..... | 5..... |
| 3..... | 6..... |

## Activity - V

**A.** You are Rekha, residing at Pratapnagar, Chittorgarh. Write a letter to your friend, Monika, telling her that you are inspired by Kalpana Chawla and want to be an astronaut.

(You may use the following words in your answer; work hard, study Maths, Science, engineer, reputed institute, fly high, in the sky, etc.)

**B.** Discuss with your teacher about the schemes to promote girl education in Rajasthan.

**C.** Collect pictures and information about Kalpana Chawla and Rakesh Sharma (an Indian astronaut) from newspapers and magazines and paste them in your scrap book. Read the information about them in your class.