14

SHE LIVED HER DREAM

A. WARMER

Women are surely progressing in India. They are not only becoming independent but also trying to bring about a positive change in society. Such women are everywhere in our country from north to south and from east to west.

- 1. Have you heard or read about any such woman?
- 2. Do you know who was the first woman president of India?

The whole world was excited as Kalpana Chawla was to return from the space. People were planning to celebrate her return on February 2003, but the return never happened, as the 'Columbia Shuttle' broke apart, just 16 minutes before it was to land in Florida. Many hoped for a miracle. Alas! Kalpana died after spending a month in the space, travelling over 6.5 million miles in space and in 252 orbits. She nonetheless lived her dream.

Kalpana Chawla was born in a small town Karnal in Haryana, in a traditional middle class family. The youngest of four children, Kalpana studied at Tagore School, but was different from other children. Her love for the skies and space began when she was a little girl in Haryana. Her school projects and papers were about stars, planets and the outer space. Teachers often found her sketching airplanes instead of playing with her friends. While her businessman father supported her when she joined the flying club, he was shocked when she chose flying as a career. He wanted her to become a doctor. Kalpana managed to win over her father and her family to become Punjab Engineering College's first woman aeronautical engineer in 1982.

Her parents wanted her to get married and settle down. So, they strongly opposed her when she wanted to go to the US for postgraduate studies. Kalpana won again. She got her Master's degree from the University of Texas, Arlington and a Doctorate from the University of





Colorado. It was there that she met her husband, French flying instructor and aviation writer, Jean-Pierre Harrison.

After doing her Ph.D. in Aerospace Engineering in 1988, she worked as a research scientist at NASA, Ames Research Centre, California. She became one of the 19 persons selected from 2062 applicants to become an astronaut. In March 1995, she reported to the Johnson Space Centre.

On 19 November 1997, she made her first flight in an American space shuttle for fifteen days. It took her only 90 minutes to circle the earth! Kalpana and her husband loved aerial aerobatics, hiking, back packing and reading.

Though she accepted American citizenship, Kalpana didn't forget her home. Every year she paid for the trip of two talented children from her town to visit NASA. She paid for the education of many girls, too. The government of Tamil Nadu instituted the Kalpana Chawla Award to be given annually on the Independence Day for her bravery and service. Now Kalpana is no more but her achievements shall continue to inspire people to work hard to realise their dream.





OVERHEE

GLOSSARY AND NOTES

space shuttle (n): a vehicle that travels between the earth and the space station.

अंतरिक्ष शटल

excited (adj): feeling or showing happiness and enthusiasm उत्साहित

miracle (n): a supernatural act or event चमत्कार

orbit (n): a curved path followed by a planet/ spacecraft ग्रहपथ

traditional (adj): conventional beliefs or customs that exist for a long time

पारम्परिक

sketching (participle):drawing simple pictures with not many details नक्शा बनाते हुए

instead of (adv): in place of बदले में

aeronautical(adj): having the science or practice of building and flying aircraft

वैमानिक

aviation(n): designing, building and flying of an aircraft विमानन, वायुयान

संबंधी

instructor(n): one who instructs or gives directions. उपदेशक

research(n): a careful and minute study of a subject अन्वेषण

astronaut(n): a person whose job involves travelling and working in a

spacecraft अंतरिक्ष यात्री

hiking(n): going for a long walk in the country for pleasure

आनन्द के लिए लम्बी पदयात्रा करना

back packing(n): act of carrying and arranging equipments and supports

especially for holiday/vacation यात्रा की तैयारी

talented (adj): bright - गणी

instituted(v): set up आरम किया, प्रचलित किया



B. LET'S COMPREHEND

B.1. THINK AND TELL

B.1.1. Answer the following questions orally:

- 1. Why did Kalpana Chawla never return from the space?
- 2. What did Kalpana like to do as a child?
- 3. Who was Jean Pierre Harrison?
- 4. When did Kalpana make her first flight in the space?
- 5. What did Kalpana and her husband like to do?
- 6. What made Kalpana an unusual child?

B.2. THINK AND WRITE

B.2.1. Answer the following questions:

- 1. "Many hoped for a miracle" (para 1). What miracle could have happened?
- 2. How was Kalpana different from the other children of her age group?
- 3. Which fact of Kalpana's career shows that she had the qualities of an astronaut? Pick out the line that conveys this.
- 4. What was Kalpana's greatest achievement before she died?
- 5. List the activities of Kalpana that show that she loved her country.
- 6. List two instances from, the lesson when Kalpana managed to win over her parents. What do they show about Kalpana's character?





MANAGE OF STREET

A. WORD STUDY

C.1. Pick out words/expressions from the text that mean the following and use them in your own sentences to make the meaning clear:

Start living in one place(para 3), fell into pieces(para1),

convinced (para 2)

journey by air(para 5),

every year (para 6)

C.2. In this word puzzle there are five hidden words all connected with space. The words are horizontal or vertical. Circle the words and write them in the space provided.

A	V	I	A	T,	I	0	N
I	P	N	E	G	R	R	M
R	L	D	R	S	P	В	N
P	A	I.	0	T	G	Ī	O
L	N	A note	N	A	A	T	D
A	E	Р	A	S	S	U	N
N	S	н	U	T	T	L	E
E	D	S	T	R	R	C	L
A	N	G	I	M	0	A	В
X	A	K	C	D	N	R	U
I	R	L	A	N	A	G	S
S	N	M	L		U	K	T
T	A	N	0	S	Т	A	R



D. GRAMMAR

Use of 'have to ' as a modal verb.

There are many verbs which are used as modal verbs—may, can, will, etc. You may have already learnt how to use some of the modal verbs. In this lesson, we will learn the use of 'have to' in English.

'have to' is used to mean that something is necessary. It can be used in all tenses. It is used in the following way in affirmative sentences:

subject + modal (have to/has to) + verb

I have to wash my clothes today.

He has to write a report.

She had to go to the bank yesterday.

In affirmative statements, 'have to' and 'must' have a similar meaning. In negative statements, 'must not' and 'not have to' are very different. 'must not' expresses prohibition or strong obligation, and 'not have to' gives the sense of 'not necessary', 'not required', or 'not expected'.

You must not cheat on a test.

I must not eat chocolate. It's bad for my teeth.

You don't have to buy a guide book.

We don't have to spend any money to enter the museum.

You don't have to come if you don't want to.

In negative statements, we follow this rule:

Subject+don't/doesn't have to + Verb

Example: We don't have to work tomorrow. He doesn't have to wear a uniform in school.





(i) .	Do you	late tonight? (work) a letter to Ananya. (write)		
(ii)	Anwesha			
(iii)	Where do you _	your work? (do)		
(iv)	(iv) Anshuhard to pass the ex			
(v)	Did you	long for Ashu?		
(vi)	ri) He this chapter before test.			
(vii)	I	_ early yesterday. (get up)		
(viii)	iii) Aslam may Delhi next week. (visit			

D.2. Tick (\checkmark) the correct alternative in each of the following:

- (i) Ayesha says she **will must/will have to** finish her homework by tomorrow.
- (ii) Anshu's phone line is engaged, he has to/must be talking to his mother.
- (iii) My mother told me I will not have to/ must not forget to buy some bread.
- (iv) Ashu is in a hurry with his work; he must/has to give the report by tomorrow morning.
- (v) You must/will have to buy something to get a free gift.
- (vi) I can't hear Abhinav any more, he has to be/must be asleep.
- (vii) Anita's watch is not working; she must/will have to buy a new one.
- (viii) The T.V. has been repaired, we **must not/don't have to** buy a new one.
- (ix) You will have to/must stop when the traffic light is red.







(x) You will have to/will must work hard if he wants to pass his exam.

Infinitives

Look at these sentences: People were planning to celebrate her return.

...It was to land in Florida.

The underlined words are called infinitives. Find out some more sentences having infinitives. Now have more examples and explanations of infinitives in the table below:

Examples	Explanation	
I want to leave.	An infinitive is used after certain verbs.	
I want him to leave.	An object can be added before an infinitive	
I'm happy to see you.	An infinitive can follow certain adjectives.	
It's important to learn English.	An infinitive follows certain expressions with it.	
I'm saving my money in order to buy a bicycle.	An infinitive is used to show purpose.	
He's old enough to vote. She's too young to get married.	An infinitive is used after expressions with too and enough.	
I want to read and write English well.	In a sentence with two infinitives connected by, the second <i>to</i> is usually omitted.	
Everyone wants to be given an opportunity to succeed.	To make an infinitive passive use to be + past participle.	





The following verbs can be followed by an infinitive:

agree	forget 198	offer
appear	hate	plan
attempt	hope	prefer
begin	intend	prepare
can/can't afford	know how	pretend
choose	learn	promise
continue	like	seem.
decide	love	start
deserve	manage	try
expect	need	want
wish	would like	refuse

D.3. Find out at least four examples of infinitives used in the lesson.

D.4. Fill in each blank with an infinitive:

do it.

Exa	mple:	I like to eat samosa.	Spin or S	The state of
	1.	I don't like	, but I have to	it anyway.
	2.	I can't afford	res semientos	- Mr. Thr
	3.	I've decided		
10	4.	I want have enough time.		but I don't
	35	I don't want	but	I have to



- riffye:

6. I sometimes forget	
7. I love	The state of the s
8. I need	and everyday.
9. I don't know how	, but I would like to learn.
10.I would like	boling various
D.5. Fill in the blanks with the pa	assive of the verb in brackets.
	Site of the
scratch.	(teach) right from the
2. He has	(take) to the doctor immediately.
3. Children need	give) love.
4. It is important	(respect) by our friends.
5. Anuj doesn't want	(see) in that dress.
6. She is too young	(permit) to drive.
	PRODUCTION OF THE PROPERTY OF

E. LET'S TALK

E.1. Talking about the daily routine

Give each student a card with time written on it for the whole day. The teacher asks questions like 'What did you do yesterday at 6:00am?' The student should write the answer in the past tense form; e.g., 'Woke up' against the time-mentioned. The teacher continues to ask questions and the students complete writing their daily routine on the card.





Now all of them can talk about their daily routine, with the help of the activity they have done.

F. LET'S WRITE

Read the following table. It gives you some information about the famous astronaut Kalpana Chawla. With the help of the information, write a brief account of Kalpana Chawla.

year	details	
	born in Karnal, Haryana, India	
1976 Graduated, Tagore School, Karnal		
1988	Ph. D. in Aerospace Engineering, University of Colorado started work at Nasa	
1995	Became an astronaut in Johnson space centre	
1997	Made her first flight in space for 15 days	
Jan, 2003	Flight in Columbia shuttle	
Feb, 2003 Columbia shuttle broke apart, died		

G TRANSLATION

Translate the following into English:

कल्पना चावला हमारे देश की बालक बालिकाओं के लिए प्रेरणा का स्रोत है। आज बहुत से बच्चे बड़े होकर उसके जैसे अंतिरक्ष की यात्रा करना चाहते हैं। हमें उनका उत्साह बढ़ाना चाहिए। ऐसे बच्चे हमारे देश की शान हैं। विद्यालय के बच्चों में अंतिरक्ष के प्रति रुचि पैदा करना हमारा कर्त्तव्य है।



H. ACTIVITIES . sarifac, ...

- 1. Collect the pictures of all sorts of space shuttles and paste them in your note book.
- 2. Try to find out how a space shuttle works; e.g., what load it carries, which fuel is used to make it run and on what principle it runs.

You may take the help of your teacher or gather information from the Internet.



'पर्यावरण एवं वन विभाग, बिहार सरकार' बिहार पृथ्वी दिवस (१ अगस्त) के अवसर पर 11 सूत्री संकल्प।

मैं संकल्प लेता / लेती हूँ कि

- 1. पृथ्वी के संरक्षण तथा पर्यावरण संतुलन को बनाये रखने के लिए सदैव कार्य करूँगा।
- वर्ष में कम से कम एक पौधा अवश्य लगाऊँगा, इसे बचाऊँमा तथा पेड़-पौधों के संरक्षण में सहयोग करूँगा।
- 3. तालाब, नदी एवं पोखर आदि को प्रदूषित नहीं करूँगा।
- जल का दुरुपयोग नहीं होने दूंगा एवं इस्तेमाल के तुरंत बाद सावधानीपूर्वक नल को बंद करूँगा ।
- बिजली का अनावश्यक उपयोग नहीं करूँगा तथा आवश्यकता नहीं रहने पर बिजली के बल्ब, पंखा एवं अन्य उपकरणों को बंद रखुँगा ।
- 6. कूंड़ा-कचरा को निर्धारित स्थानों पर रखे डस्टबिन में डालूँगा तथा अन्य लोगों से भी इसके लिए अनुरोध करूँगा।
- 7. अपने घर तथा स्कूल को साफ रखूँगा।
- 8. प्लास्टिक / पॉलीथीन का उपयोग बंद कर इसके स्थान पर कपड़े या कागज के बने झोलों / थैलों का उपयोग करूँगा।
- 9. पशु-पक्षिओं के प्रति दया का भाव रखुँगा।
- 10. नजदीक के कार्यों के लिए साइकिल का उपयोग करूँगा अथवा पैदल जाऊँगा ।
- 11. आवश्यकतानुसार कागज का उपयोग करूँगा तथा इसका दुरुपयोग नहीं होने दूँगा।