



IIT Madras

ONLINE DEGREE

English - 1 (Basic English)
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Lecture - 03
Consonant Sounds in English

Welcome to the class. Today, we will talk about consonant sounds in English. We know that speech sounds play a very important role. We know that. What I particularly mean is understanding a speech sounds, has an even greater role in learning to speak in an impressive manner. I do want you to underline this thing.

Understanding the sound system of the target language and in this case, English here, understanding the way we speak, looking at ourselves while we speak is very important for developing ourselves as an impressive speaker. And this comes from the confidence that we gain through this understanding, through learning about these nuances. And therefore, we speak in a better way.

So far as we know among the sounds, available sounds in English, as we know, there are two types of sounds. We have vowel sounds, and then we have consonant sounds. So there are 20 vowel sounds and 24 consonant sounds in English. We know, we very briefly we know vowel sounds are more fundamental. That is, we must have at least one vowel sound in every word in any language.

And that also in, that is true in English. That is for every word in English; there must be one vowel sound, which is to say, vowel sounds are more fundamental to the word in English. We have looked at 20 vowel sounds. Now today we are going to look at consonant sounds of English and the way we speak English. And we will also want to know how these consonant sounds are produced.

So keep in mind 24 consonant sounds and more importantly, not more importantly, important is also for us to keep in mind that we write these sounds with letters, with symbols, but we speak differently. So I will require you to pay attention to how we speak.

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Articulation of Consonant Sounds

	Oral Sounds		Nasal Sounds	
	-asp -voice	+asp -voice	-asp +voice	+asp +voice
Velar	k	kh	g	gh
Palatal	c	ch	j	jh
Retroflex	T	Th	D	Dh
Dental	t	th	d	dh
Labial	p	ph	b	bh



So let us go straightaway and look at the vowel sounds. Look at the consonant sounds I am sorry. We are talking about consonant sounds today. So first I want to give you a generic description of sounds for you to see underlying pattern in which these sounds are sounds can be described. So I am going to show you a template. And I need your attention on that.

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	bilabial	labio-dental	dental	alveolar	post-alveolar	palatal	velar	glottal
stop	p b			t d			k g	ʔ
nasal	m			n			ŋ	
flap				r				
fricative	f v	θ ð	s z	ʃ ʒ				h
approximant				ɹ		j		
lateral approximant				l				



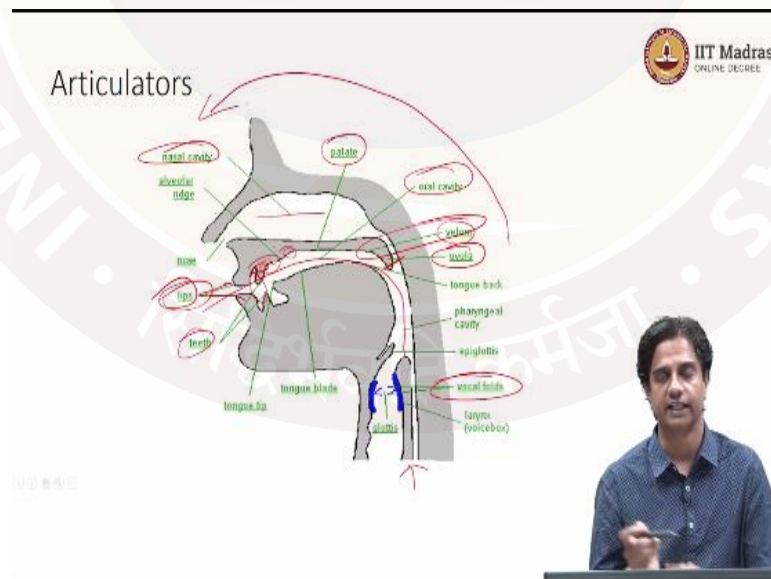
So let us first look at English vowel, English consonant sounds. So English sounds are p, b, t, d, k, g. These are in English consonant sounds. And this chart on your screen tells you about 24 consonant sounds in English. They also tell you about their places of articulations that are on this axis you can see that p and b are bilabial sounds.

Which means we can only we need two lips in contact with each other to produce these sounds. Is that not true? When we say and for understanding these things, please say it for yourself, and then you will realize it. Lot of it is possible to observe when we just speak. Say just the sound pa and observe what happens; p, b. We need the two lips coming close together.

And therefore they are called bilabial sounds, and some people call it labial sounds also. M is also a labial sound; m, we need both lips together, but this is a nasal. So on this axis, you have so this is talking about places of articulations. And this is talking about the manner in which they are spoken. So, m is a nasal sound. When you pay attention to the sound, you will see this has nasal, this is a nasal sounds m.

No p and b are not nasal sounds; they are stop sounds. So what is important also to understand the distinction between what we mean by stop and what we mean by nasal. See, not very complex for us to understand. As you know, all speech sounds are produced by modifying the exhaling flow of air in our oral cavity. One more time, modifying means they get either stopped or some kind of modification happens in our oral cavity.

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Oral cavity looks like this. Let me explain this to you and pay attention to this thing. You will get to understand every feature, everything that we are discussing every sound. So this whole thing is called the oral tract, okay. This whole thing is oral tract.

This is the oral cavity, and this part here is the nasal cavity as you see here, okay. And as you see here, this is the oral cavity.

So what happens is when the exhaling flow of air moves from here, it moves up, and then you see this part uvula it gets when it gets raised it closes this small cavity that is it closes the flow of air through this cavity, and then the flow moves through this. When the flow moves through the oral cavity, all the sounds are called oral sounds. When this uvula gets lowered, and some bit of flow moves through the nasal cavity, then we get nasal sounds.

So when we say m is a nasal sound, that means in the production of m, the uvula gets lowered and little bit flow of air moves through the oral cavity, move through the nasal cavity. And therefore we get this thing as bilabial nasal sound. So this is the distinction between oral and nasal sound as you see from the distinction in the oral cavity and nasal cavity. Keep in mind all sounds are produced through the flow by modifying the flow of exhaling air.

We inhale. Inhaling and exhaling is a continuous process for us. And after inhaling when we exhale, the exhaling flow of air and its modification at different places in our oral cavity and nasal cavity is responsible for a speech sounds. That is an important part to understand about any speech sound in any language. Going back again to English. So this is what we mean by so this chart tells you m is a bilabial. But it is a nasal sound.

P and b are bilabial sounds, but they are not nasal, they are called stop sounds. Now, what is the meaning of a stop? Let me show you that as well. So the flow of air moves through this oral cavity comes here all the way to lips. These are called lips as you see here. And so the air moves, and it is completely blocked here before the release. So the complete block is what they mean by stop.

It is also called plosive because we release that with little bit explosion. Therefore sometimes it is called plosive sounds as well. So these are different terms that are used for these sounds that are understanding the features of these sounds. But they are

not important. These terms are not important. Neither this process is important for you to know to speak English.

However, if you know this, it is certain that your knowledge about these features of sounds that we speak is definitely going to help you stand out. It will give you a distinction when you speak. It will matter. It will make you a confident speaker in an impressive way. So lips become, so say p again and see it for yourself. When you say p, the moment two lips come together, that is for total closure.

And then we release the flow of air, and thus we get. So every time there is, we get p. So every time we get total closure, such sounds are called stop sounds. And that is the reason why it is called a bilabial stop. Then when we move from bilabial, we see there are some labio-dental sounds. In English, p is a bilabial sound, but f is not a bilabial sound.

So in a word like father, f is a labio-dental sound. Upper teeth and lower lip come together f. Not both lips. The same thing happens when we say v, this sound. These are according to places of articulation these two sounds are labio-dental sounds. Upper teeth, lower lips together. But according to the manner of articulation, this is a fricative.

That is when you say f it is not complete blockers of the flow of air. It is not a complete release also. So there is some sort of friction here, which is indicated as a fricative. Then we go to dental sounds like th and d. This is th and this is d, th and d. You see, the tip of the tongue touches teeth. That is the meaning of dental sounds. So according to the place of articulation th, d they are dental, but they are still fricative.

S and z are not dental also. So look at this. These were f labio-dental. Upper teeth and lower lips. Th dental, both teeth tip of the tongue. S, tip of the tongue moves towards the upper side of the upper teeth, and that is called alveolar sound. S and the friction that is friction in the flow of air still continues. So they are all fricative sounds in English. This is sh. Sh and this is again a different kind of z.


So this is a different kind of z, and this is a different kind of z. But they are, this is sh is post-alveolar okay. It becomes very close to; this is very close to the palatal. The moment you move from the alveolar region that is the teeth reach area of the upper lip, upper teeth, it can become palatal also. But in English this is not palatal, it is just post-alveolar it is pre-palatal sound. And then you have h.

It is still a fricative sound, but that is too low in the oral cavity towards the glottis. So when you reach, look at this. This is called the labial area. This is teeth is; these are teeth. So this is dental sounds are coming from here. If you have something from here, then you have alveolar. This is the alveolar region. And somewhere here will be called between palate and alveolar region you will be the sound will be called post-alveolar and then becomes palatal.

So you see and then finally, you see k and g coming from velum, velum area. K and g they are velar sounds in English. So and there are few more which we will look at again. But this is an important chart for you to get yourself acquainted with sounds in English. I am going to show you some words where you see some of these sounds.


And then that will give you a practice of how these sounds are used in different words in English. But, so this picture of our articulators that is the different places, different organs in oral cavity like tongue, teeth, lips and different places like alveolar ridge, palate, or velum they play an important role in producing sounds because the exhaling flow of air gets modified at these different places.

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Palatal	<u>c</u>	ch	j	jh	<u>ny</u>
Retroflex	T	Th	D	Dh	<u>N</u>
Dental	<u>t</u>	th	<u>d</u>	dh	<u>n</u>
Labial	<u>p</u>	ph	b	bh	<u>m</u>



And thus we get a clear picture of how we produce vowels, how we produce consonant sounds in English. A slight contrast with some more sound, some more consonant sounds that we use in our languages. But when we speak English, that is we speak English in India, we do use these sounds, and I want you to pay attention to some of them as well.

One more time, let me take you to two specific English sounds like when you saw th and d they are dental sounds. T and d are not dental sounds. In English, they are alveolar sounds. So when we speak t in English, and if you pay attention, what simply happens is the tip of the tongue goes to the alveolar ridge. Only this much happens, the tip of the tongue t.

Tip of the tongue is raised, touches teeth and the muscular area which is also known as the alveolar ridge. The same thing happens when we say d. So this is d, which is dental and this is d, which is alveolar. That is true about English. But what will help us understand is, is this distinction. So look at that. We know sound like k is a velar sound. A sound like p is a labial sound.

A sound like t in English it is alveolar, but in our language, it is a t is a t sound, is a dental sound. D in our language is also dental. Ch is a palatal sound in our languages, and what we speak in our languages, this is a critical thing for us to understand. This entire series of sounds that we speak a lot in India, but these sounds are not there in English. That is T, Th, D, Dh, N. Some of these sounds are there in Hindi.

And a lot of these sounds and few more retroflex sounds are available in other Indian languages like Marathi, Tamil, Telugu, Kannda, Malayalam and so on. Kurukh, Tulu all these languages are full of retroflex sounds. So now a simple note here. You do not have to change the way you speak overnight. You can continue speaking the way you do.

These sounds are part of our languages that we speak, that we grew up speaking before we started learning English. In some of our languages, when we speak English, these sounds appear and therefore, we do not sound the way English speakers sound. This is not something that should damage our confidence. However, the knowledge about this can only make us learn it better.

Try to improve it better. We can try. But as you know, our efforts are always on a continuum. We start, we improve; we try, we improve. We still try we improve further. So we can continue trying, but must not stop. Must not, this the availability of these sounds in our speech must not break our confidence. It will not, if we understand how we speak and why we speak. We speak because we grew up speaking these things.

We intuitively innately learnt these things without putting any efforts when we were learning our languages. Now that when we are putting efforts into learning sounds of English, we will put efforts. But if at times in a fast speech, we end up saying these things, it is not a big problem. And I will get to show you; I will also show you that part. So see what happens.

For a sound like alveolar t in English, what happens is the tip of the tongue goes to the alveolar ridge. For a sound like Hindi or Indian t, th, d, speak it to yourself, you will see t, th, it does not have to make you shy. You need to speak it for yourself to realize and then understand this distinction very carefully. It will require some practice. Say it to yourself t. You see, the tip of the tongue folds backwards.

And then it hits the alveolar region in our oral cavity, folds backward, hits it up. T, th, d, for each one of these sounds. And we are so used to this that they will come in

other languages, when we speak other languages. One more time for clarity, it is not a problem to use them. But on the basis of this knowledge, if we keep working on it towards improvement, we will get these sounds as well.

And then we will sound better while speaking English. So that is one part we need to pay attention to. Our t is a retroflex sound because of the folding of the tongue. It is tough, but we are so used to, we do that effortlessly. Which happens tip of the tongue folds back happens at the alveolar ridge region. For English alveolar, for English speakers, this alveolar sound is very simple.

It happens without folding of the tongue. Just straight away, the tongue goes to the alveolar ridge area, and we speak these sounds. So that is one distinction we need to keep in mind. And a lot of sounds in our languages have this distinction. K, when we say k, it is a velar stop in our languages also. But when we say kh, it has little extra aspiration. And then it becomes kh.

So according to you see, these are nasal sounds that we were talking about in lowering down uvula and flow of air through the nasal cavity also. So when we say m, it is a nasal sound. When we say n it is a nasal sound. The only according to the place of articulation, the distinction is m is a bilabial nasal. N is a dental nasal. Ny is a palatal nasal and ng is a velar nasal. So that is the, and this is a retroflex nasal.

So this is the story of nasal sounds. When we look at oral sounds, what we see is a k sound is a non-aspirated sound for us. Because what when it becomes aspirated it becomes kh. We will see a roll of this thing when we talk when we start our discussion on words. But right now I only want your attention on the sound system. So this is k, this is kh.

When we say g if you put your hand in your this area, you and then say g. Say two of them. K, g. When you say g, say it a couple of times if you do not feel this. When you say g, you see more vibration on your hands and fingers. That vibration happens here in vocal cords. And this is called voicing. So g is voiced, but non-aspirated. Gh is voiced and aspirated both.

So that way in our oral cavity, we make four-way distinction. K, Kh, G, Gh. So, k is not aspirated, not voiced. Kh is aspirated but not voiced. G is not aspirated but voiced. And gh, gh is both aspirated and voiced. So we make this four-way distinction. In some of our languages, we do not have this four-way distinction, but in some languages, we have this four-way distinction.

The same thing happens for c, ch, j, jh. The same thing happens for our retroflex sounds, t, th that is th is aspirated, t is not aspirated; d is voiced, and dh is also voiced. But the distinction between d and dh is they are one is a non-aspirated, the other is aspirated. Same thing with t, th, d, dh.

Same with p, ph, b, bh. So when you see it this, in this direction, you will see why these things why velar sounds come first, why palatal comes second, why a retroflex third, why dental fourth, and while labial last? You see because exhaling flow of air is responsible for a speech sound. So the first place is velum, then we have a palate, then we have a retroflex alveolar area, then we have teeth, and then we have lips.

So it moves in this direction. Therefore, it is arranged that way. Now what I want your attention towards to is just two points that some of these sounds are in our languages. And these sounds are specifically for English. When we put these two things together, we see that we speak these sounds effortlessly and we use them in English also. But when we want to improve, we need to reach here.

We are already good with so many of them. We are good with p, b, m. We are good with f. We are good with v; we are good with th, d, s, z, h, y, r, l. These are this is y, this is r and this is l. So these are the, we are good with k, g, ng, we are good with many. We just need attention to alveolar sounds. We just need to know about fricative sounds.

And then when we do this maths, we are well informed about the distinction between our sounds and English sounds. That helps us pay attention to, helps us identify areas where we need more attention. And we become a more confident speaker of English using almost English sounds.

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Some specific features of English Sounds



- s
- sh -
- z
- j -
- f - father
- ph -



There are some specific things where we need attention. That is a lot of speakers in our country; speakers of different languages do not make a distinction between s and sh. That is also fine. But while speaking English, we need to pay attention to that because it does make a distinction in our languages also. But in some languages, this distinction does not exist. Similarly, it works when we say j and z.

Our j and English z are different. We do have z in a lot of that is a lot of Perso-Arabic sounds in some of our languages too. We do have f too in our languages. But we need to pay attention to this distinction between f as a labio-dental and ph as bilabial. Z and j, that is one palatal you see, this z is alveolar, okay, and this j is palatal. So we need to pay attention to this. And then we get all these sounds done.

So at the end of this, what I want you to do exercise with is the following. First, start with this. You write one more time 20 words in a notebook. One blank white sheet 20 words. Try to identify sounds in each one of those 20 words. They could be some of them could be smaller words; some of them could be bigger words. So when you start with a smaller or irrespective of the size of the word, you will have 2, 3, 4 consonant sounds in each one of those words.

I want you to identify the place of articulation of each one of those sounds according to this chart. This will be a very interesting exercise to do. Please note, please do it will take not more than 20 minutes. But please do it with 20 words. If you feel like breaking this exercise into two, you can start with 10 words. And when you are done

with the first set of 10 words, you can start with another set of 10 words at a later time.

But please do identify consonant sounds and any 20 words that comes to your mind. Finally, the second set of exercise is where I want you to find words in English which have s sound and words which have sh. Again we are talking about this one. So and then find words that are with f. And this is what I meant, lot of people when we say father end up saying it as bilabial, phather.

No, this does not have to break our confidence. But if we pay attention that in a word like father, it is not bilabial sound, it is labio-dental sound f, it helps us set this thing with a little bit of practice right away. And we improve our English; we improve the way we speak. So thanks for listening to this, please do this exercise, and it will help you improve the way you speak. Thank you so much.

