

Better Spoken English
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Lecture No. # 31
Some Different Sounds

Good morning

Good morning sir

Are you alright?

Yes sir

We have almost come to the final module of the course and in this part this module, we will talk about individual sounds of the English language. So, far we have seen, how English organizes its sounds and how some sounds are more prominent than the others in any English words, but we should also look at and we should also see, how different English sounds are pronounced and how different they are from sounds in other languages that we speak.

So, that if we pronounce some sounds in non standard manner and we can relearn that pronunciation of that sound and can speak in the standard manner, is that alright? Ordinarily, this module of the lecturer to take about 10 hours, but I am going to tell you within one hour about, how we human beings produce different speech sounds in our languages. My intention is to draw your attention to the various ways in which different sounds are produced.

After all human beings are most versatile, when it comes to speaking; human beings can speak at night, they can speak during day, they can speak under water, they can speak in air, they can speak while eating. Do you speak while eating? How many hours, really all hours, they can speak while sleeping. Do you speak in sleep, how many people do? Do you Irfan?

I do, do you do that, lot of people is speak, when sleep I have you know some times my wife tells me, I have full lecture in my sleep and when I went to study in Hyderabad then, my neighbors in the hostel thought, I had some psychiatric problem and I should see, consult a doctor; I told them do not worry, doctors may have a problem, but I do not thank you very much you know. So, human beings can I speak in a variety of ways; even if you gag there mouth you know gag your mouth you still try and speak something. Do that? Gag your mouth and speak.

(())

If somebody gag your mouth fully you can speak through your nose (()) do it.

(())

They can speak gesture and posture in a crowded meeting we can ask, friends know what is being said, children know what is what a friends are asking. We can speak in a variety of ways no other animal, there are many animals that speak, many animals. People say, dolphins have as complex a language as the languages of human beings, I do not know, it is not established with credible evidence, though it is fact that many animals have language and many animals talk to they are own kind about many different things; but within the knowledge available so far, no animal has as complexes language has human beings, no animals can tell lies to other animals.

And we can routinely tell lies to others, are you absent from the class I ask you, why did know why you did not come to the class yesterday, I am not asking you and lot of people tell me, sir I was in the hospital; I know they has gone to Ooty or Kodaikanal over the weekend, Monday they were tired, no other animal can do that. A tiger ask, sit son where were you, either the son tiger is quit or tells the father tiger that he had gone to hunt for other animal, he cannot tel him he had gone to Ooty; no other animal can tell lies.

And telling lies, it is not always a bad thing, after all all literature is lies you know we talk about things that have not happened, Kalidasa tells the cloud you know that, the story Kalidasa tells the cloud; go to Chennai my beloved is there and tell her, I am missing her now clouds do not speak and the hero did not tell the cloud, but human beings have that capacity. Similarly, human beings can produce a variety of sounds, other animals cannot, human beings can do rrrr do it?

rrrrr

Like you know four footed animal or they can they can roar like animals, lions (()), do it?

(())

Real like a dog, it is not like a lion, give me a louded roar.

(())

Come on

(())

Close puff your swell your lungs first, then swell your cheeks and then say, (()) do it.

(())

That is it. You see how the human beings can go to the other extreme, they can whisper so soft that, only the person sitting next to them can understand, wish per into each other here, if you wash your mouth, if you do not have a dirty breath you can whisper to any imaginary friends, do it now do it.

Such that, the person on the next bench should not hear you, do it, this is the range, do you see the range, we have a we have a wide range we can whisper, we can shout we can say 1 minute thing in 3 minutes, lot of people have the faculty to describe stories you know, then Amitabh Bachchan comes grips the handle of the motorbike kicks it (()), they can tell 3 hour story in 6 hours. And there are other people, who can tell 6 hours story in a 6 minutes; this was nothing you know the same Amitabh Bachchan movie; motor cycle and heroine and music and nothing 1 minute I will finished this story.

We can produce variety of sounds, we can whistle like birds (()), how many people can whistle?

(())

Come on, who can whistle longest, no cheating who can whistle loudest?

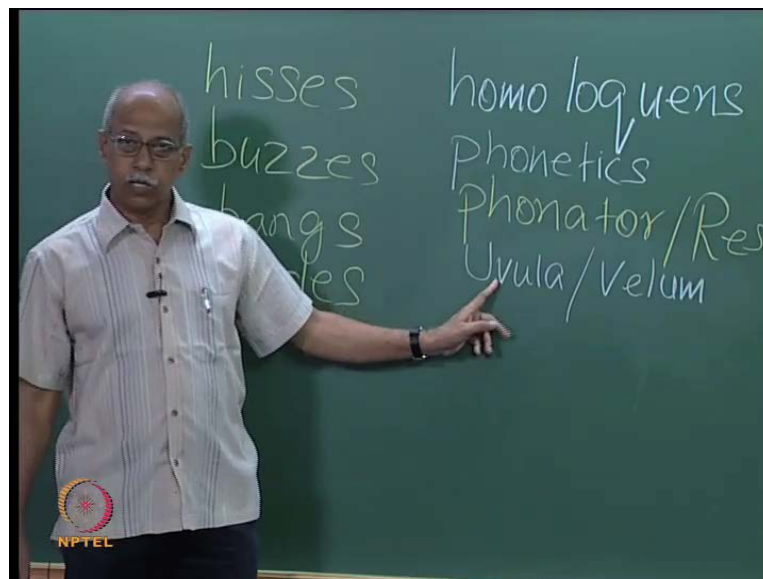
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That was great, but I cannot because, I come from village I can teach you more variety, but not on this course not on this course and my director will fire me if he and learn that I am teaching you whistling; but you know you can whistle in many many ways using your hands, curling your lips and putting fingers in to your mouth you know you can do a variety of things; all human beings can do that.

And only human beings can do that, no dog no matter how handsome the other dog is, no dog can whistle to another dog, no snake can whistle to another snake, no lion can whistle to another lion a lioness. We are the only one, who can whistle or we can hiss like snakes; somebody disturbing you, you are studying in term shshs do it.

shshshsh

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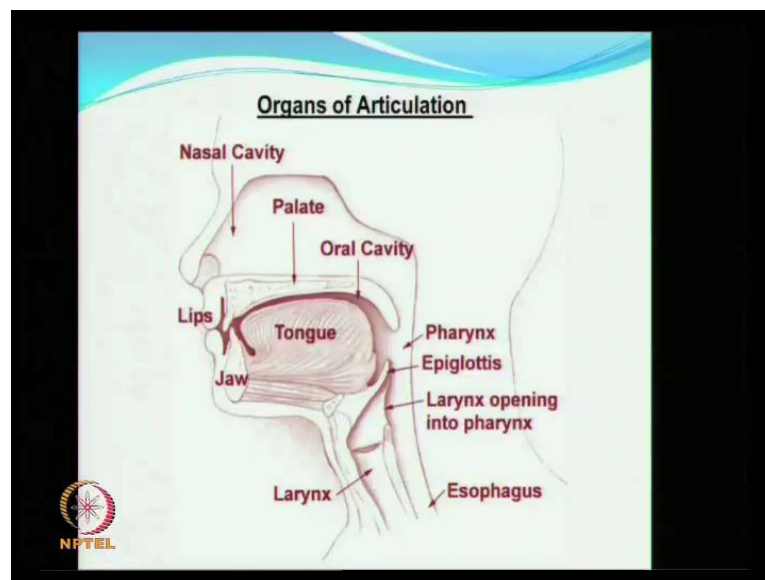


These are the kinds of sounds animals produce; reptiles, snakes and lizards hiss, bees and other worms, buzzes, birds whistle and mammals big animals, they are bangs, human beings can do all this hisses, buzzes, bangs and glides. How do human beings do that, what has gods giving them actually, one name for human beings is you know some Greek philosopher called human beings homo sapiens is because of other biological feature, this is homo what is it, homo loquens.

Speaking animal, talking animals you know human beings a talk constantly talking. You see two human being together have you ever seen them, sitting silently unless they are man and wife, talking all the time you know all the time go on a train, go on a plane, except in the class room you know where the teacher alone talks boring or otherwise.

We are talking animals, what has god given us, so that we talk you know as I told you earlier in an in another course, if you are interested do a course with me in a next semester in linguistics I will do this in 10 hours, but here I have to do it in a 50 minutes.

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This is what god has given us. I will give you 3 minutes exactly copy it with labels everybody please you are I am told you, you are a good at drawing. And you have also been given a course in engineering drawing am a right, I will give a exactly 3 minutes with labels and neat diagram, it should not look like the hood of the snack or an umbrella or a walking stick, give me a good drawing, your time begins now.

Come on hurry up ladies and gentleman finished finished I will copy this slide to you on the mail, I will sent to Kiran and Varun and anyone else who likes and you can copy. These diagrams are also available you just Google or you know organs of articulation, you will get it on the net or there are any number of books on phonetics and phonology you know, the science that studeis production of the speech sounds is called phonetics; this is the name of the subject, this is the name of the science that studies production of the speech sounds, production, transmission and reception of the speech sounds; phone

in Greek men sound and **ics** science; the science of speech sounds, if you are interested in learning more about it, you can read books on phonetics.

And this diagram is also available on the net; just Google organs of articulation and you will get it or look up the book. Let me continue talking about the production of the speech sounds, so that you know you you you are familiar with apparatus with tool you use to speak, so that you can use it better or still better. How do you you know this I mean, these are not the only organs, there are others.

Say, for examples these organs does not this diagram, does not show you lungs, without lungs in air in the lungs you cannot a speak, these organs only manipulate air that comes out of lungs, that is why when you speak you know your chest swells and shrinks; lungs swell and shrink, they puff and shrink, because of the air comes out that way you know. You also feel pressure on your stomach muscle, some people cannot speak without moving their hands, no matter what they say; they move their hands you know on this hand; I have love in my beloved and the other hand; they are my parents, who should I listen to my parents or my wife or husband you know lot of people speaking that manner, but that is not important.

If, somebody ties your hand, you can still be speak; I and my parents on my left hand side, my wife and children on the right hand side; who should I love more, I am giving you a dialogue from an old play. The modern play would be have a America on my left hand, my wife is in Infosys on the right or wife would say, my husband in some god forbidden company on the left hand and my America on the right, what should I do god, god should go to America get dollar of course, husband you can always pickup on the way right ok.

You can see hands do not directly participating am I right, say yes or no, hands do not then you can even if your hands are in your pocket or even if your hands are tied, you can still is speak. But, you cannot speak well; if your mouth is gagged, if your tongue is tight. Keep your tongue in place and then, try and speak, do not allow the tongue to move, do not let your do not let your vocal chords vibrate, then try to speak, if you do not allow it to vibrate nothing will move.

So, these organs participate in the production of the speech sounds directly, do you see the point. Next, next point is all speech sounds are nothing, but speech air coming out.

Whenever you speak you have a speech air coming out, keep your hand here and try and say something say, Jana Gana Mana or say [FL] say something please.

(())

Speak something or sing a song [FL] right can you speak without air coming out, yes or no, anyone you know. Why do dead people could not speak; dead people have lips, dead people have tongue, dead people have everything, except that they do not have air and their tongue does not move, there is no air and organs cannot be moved.

So, air cannot be manipulated, whatever we speak; we speak because of air coming out of our lungs through the oral passage. Can you see here, a lungs are not shown here, but lungs pump air air can you follow the cursor, lungs through air through the larynx; larynx has a box called vocal chords look at the picture of the vocal chords, these are the vocal chords, they are chords.

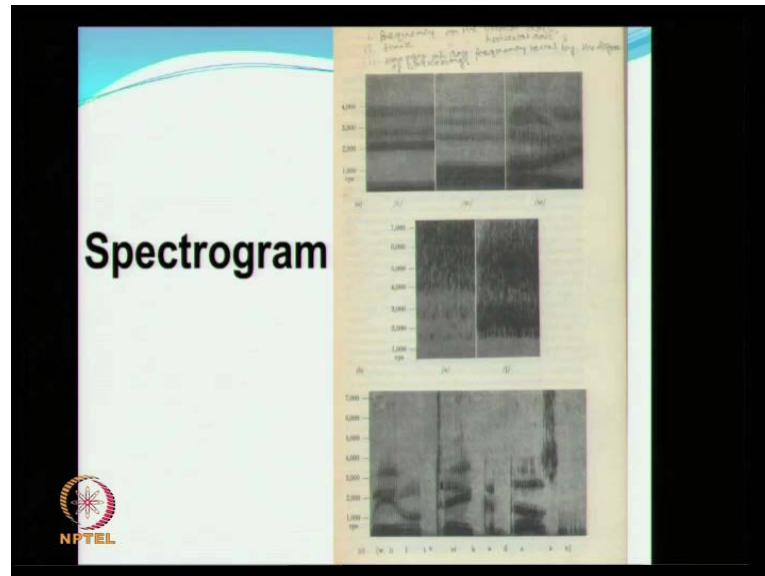
Any one here, who plays guitar or any other string instrument or wind instrument you know, when you strike the chords of the guitar, they vibrate and the chords you can strike them with different degrees of intensity at different points with different pressures, you get musical sounds. So, similarly here, air coming out of the lungs, strike these chords, they are known as vocal chords.

What are they known as vocal chords and vocal chords like here within the box, this box is called larynx or glottis call it what you like. And as air strikes them, air crosses through the vocal chords in the process the vocal chords vibrate, it is this vibration that you and I hear, when others speak. And when we speak, others hear us, because of this vibration. If you do not allow them to vibrate, if you keep them apart, you can do that at will, then you know you can still speak, but no one will hear you.

I am going to give you a demonstration now. I am speaking I am telling you all the story, there was a king, the king had three daughters; the eldest daughter was the ugliest, the youngest daughter was the prettiest as it always happened you change it; make the eldest daughter you know the prettiest, but without voice I cannot tell you that story, I can only throw air. Try and tell each other without voice, say some story to each other, air is still coming out right Aparna air is still coming out right Irfan, but you cannot hear it carry far

because of this because the air is strike these chords, there is resonance and this resonance comes out strikes the air waves, this is how the waves go.

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These are the air wave is it sorry can you see the waves this can you see the waves forms there, this is the picture of your speech sound, that is how we are heard we can have vibrated sound, we can have without vibration sound for instance try and say ah say it.

ah

There are people who can do it continuously for 90 seconds, how many seconds can you do it for, continuously. Anyone, who can do it for 100 seconds can you can you do it for 100 seconds. Can you, can you do it? There are people, there are colleagues you know who can my colleagues who can do it easily for 90 to 100 seconds you know, they begin doing ohm try and see, how many seconds you do it, 1 2 3 begin.

ahh

No cheating please, who did it the longest, so you did it almost 50 seconds.

(())

35 or 50 may be I counted with wrong, lets clap for him the you know it comes with practice. So, when you produce this, you know put your finger here and say, ah keep

your finger here now say ah and now say ah and now say ah, do you notice any difference, what is the difference?

hmm

When you say ahh, there is vibration, but when you say ssss there is no vibration, similarly try and say ssss, now say (()) keep your finger here, you hear a difference, is there a difference?

Yes yes.

What is the difference?

Vibration

Once again you see god has given us a very unique and power full apparatus, you can switch it on and off at your will. And you can shout, so loud that your friend sleeping in Alkananda hostel may get up and run to your rescue. What happened are you getting married or something right you know you can cry, friend save me save me or you can speak so soft.

These things can be manipulated can be controlled at will, that is why you know philosophers called the vocal box please write if you like, it is called phonator phonator, it gives the phone the voice, some people also call it resonator; it gives you resonance without this you cannot speak, without this you cannot be heard. You can speak of course, there are you know unfortunate people unlucky people, who sometimes have cancer of the vocal box you know vocal chords then, through surgery that vocal vocal chords are removed, they can still speak, but you will have to take your ears close to the lips, pay attention to the lip movement.

And then, you can understand them, because the loose the phonation of the voice, they loose resonances; it is this resonances that carries your voice not only that, you know are you aware of the word like tone, have you heard this word call tone; he has spoke to me in a pleasant tone, when some friends from some hostel speak to you in a pleasant tone you know you like that, you are happy, but when some friends speak to you in not a pleasant tone, you are very unhappy you have fight same words right.

But, if the tone changes; the meaning or the friendship changes. So, that tone is also the function of the vocal chords. You can say, Kiran is honest, but inefficient or you can say Kiran is efficient, but dishonest. What is worse, Kiran is honest, but inefficient or Kiran is efficient, but dishonest, what is worse. So, all these things happen because of change of tone. A tone is also a function of the vocal chords you know tone is also the function of the vocal chords vocal chords it start vibrating suddenly very rapidly, then its like you know loud voice like you are shouting come on stand up. But, when you speak politely, can you please come on, can you please sit down, can I have your name please as they speak in very polite places.

But, you know when you are rood, when you speak on the railway truck, leave my seat please its reserved for me, then you speak in rough voice, so that is falling tone. So, this kind of polite tone, rough tone, falling tone, these are all functions of movement of the vocal chords and you can control these movements.

Actually some people say, it does not matter is if you do not speak a grammatical sentence, it also does not matter, if your pronunciation at times is wrong, but your tone should be alright, it should be polite, it should be respectful, it should be you know endearing not like you are going to quarrel, but like your are going to make friends.

These functions are also performed by vocal chords that is why I am been telling you, speak slowly, speak with pauses, speak respectfully, do not speak too loud, too soft because meaning is conveyed by not only words meanings convert also by tone, by voice. All these things are called functions of the vocal chords; its (()) araises in the lungs and crosses the larynx crosses, this is the vocal chords crosses the vocal chords, then it comes here. Can you see the cursor please, everybody yes or no, everyone please?

Yes sir.

So, speech here comes here here near pharynx you know this little thing called, this thing is called uvula please write uvula or some people call it velum, some people call it velum. In some text books you find the word velum, it is also known as uvula; this performs a very important function in the production of the speech sounds you know. It is this thing here in this diagram I downloaded it from Google you know, it is not labeled here, but this piece is called uvula or velum; its performs a very important functions in the production of the speech sounds.

When this is lowered further, just now it is in the neutral position, when it is lowered further, then all its speech air comes to the nasal passage, then you know this does not allow... When it is lowered here then, its speech air cannot escape through the oral passage, then its speech air can go only through the nasal passage here in this manner.

So, for example, keep your hand here, close your mouth and say hmm.

hmmm

Where do you feel air is coming from?

(())

Through your nostrils that is feature, but when uvula is raised I have great difficulty to finding it, then uvula is raised, this passage is closed then its speech air goes only through the oral passage, then it comes only through the oral passage, there is no other escape for it.

So, when you produced sounds like ahhh or sound like kaaa it comes only through the oral passage. So, there are oral and nasal sounds. Some sounds can be both oral and nasal for example, in Hindi the word for mother, what is the Hindi word for mother Aman?

Maa

Maa you have both to keep your hand here and say maa call your mothers tell her that I ask you to call her today. You have both air coming through the both oral and nasal passage that is all we have some nasal sounds, we have some oral sounds, what are the nasal sounds in English? Maa, naa as in king, ring, long, bring. Do you have nasal sounds in your mother tongue? Do you have nasal sounds in your mother tongue? Yes or no, no difficulty with nasal sounds you know we can do it very very easily you know without, without any problem.

After the air moves from this point you know you know, the air it can be either, when it crosses through the oral passage then, you get oral sounds. When it goes through the nasal passage, then you get nasal sounds. And within the oral passage lots can happen you see that tongue here, tongue can raise you know construct the flow of the sound

tongue is highly flexible highly manipulatable and manipulating organ of articulation it can be a straight, when you say ahh say it?

ahh

Or it can curve, it can fold sideways, when you say hmm as you long, as you laugh, as you last, it can fold in this manner when you say rrrr do it or it can spread towards the teeth, when you say eeee your tongue is spread. So, in these ways depending upon whether they raise, whether they are steady, whether they go to left, go to right, you can produce the variety of sounds by manipulating the lips sorry by manipulating the tongue.

If the back of the tongue you know this is the back of the tongue, this is the center of the tongue, this is the blade of the tongue, this is the tip of the tongue (Refer Slide Time: 39:05). Suppose, the back of the tongue raises towards to hard palate then, you get sounds like ka ha say it.

haaa

But, it is the it is the it is the center of the tongue; it is the center of the tongue here you know this raises towards the palate, then you have cha say that, cha you see how you know the older engineer senior engineer organized the sounds together in our alphabet.

All sounds coming from back of the tongue ka kha ga gha, all sound coming from the palate of the tongue, palate in the mouth all together cha chha ja jha. What is the next, ta where should it be from where should it be from, it is from here, it is from here you know near the blade of the tongue and the alveolar ridge behind the teeth. Then, where should the next group of sounds be from, ta tta they look near the teeth and then, there are sounds like pa, where are they produced from lips.

So, you know both lips coming together both lips coming together unless, both lips are together you cannot produce sound like pa, keep your lips apart and say, pa. Keep your lips apart, put a pencil between, can you you can say ah, you can say oh, can you say pa, can you call your father papa without letting the lips meet without letting the lips meet can you do that, you cannot.

So, you know come back to the point and in very this is an this is an entire subject by itself you can do MSc in phonetic speech therapy, you can do PhD in speech production

in speech therapy, you can do today you know a lot of engineering is happening in in natural language processes.

Any one from computer science here, if you have time someday go to their speech (()) lab, they are people like Hemamurthy, Chandrasekhar, (()). And these are the people work, they are trying to create software, which can speak like human, talk like human beings, how how you know say, this is the current frontier of challenge in science engineering. Can you create machines, which can talk like human beings and believe me they can. There are software today, you type the words and machine speaks out for you, it can recognize the sound and it can produce those sound.

The only problem these machines are is; tones, do not vary, they are unable to copy the vocal chords, the movement of the vocal chords, but we are moving in a direction by the time you are my age I am very confident you know you would not need a secretary. You will just tell your machine what to do and the machine will talk for you, type for you, machine will do everything for you, except perhaps quarrel with you a more or less the kind of Tamil films actor, Rajnikanth made recently, what is that film called something like something like that.

Now, why it is important for us to know why is it important for us on this course in spoken English, why is it in important for us to know how different speech sound are produced? For the very simple reason that you know we do 80 to 90 percent of the pronunciation of English quite well, but we have vocational problems; what are those vocational problems, let us see what this is? And what is this? What is the difference in one case tell me in terms of tell me in terms of take your time please listen to the question everybody please in the last bench also or are you together last bench are you together I cannot see you, because of the light, but I hope you can see me right.

In terms of production of the speech sounds using the language of all organs of articulation, can you tell me if there is any difference between the production of this and this sound. Please write and tell me then, what is the difference I give you 30 seconds think about it and tell me what difference is there? Tongues towards sorry vocal chords do not vibrate for both the sounds ss, shh no vibration. The vibrate for zzzz they do not vibrate for sss vocal chords do not vibrate for either sss or shhh.

There is another difference, what is that difference, one man can you stand up please speak show that camera can catch you, look tell the camera tell the camera in case of not sip incase of tongue rolls backwards, is there any other thing, more air coming out, is there any other thing, do not say sip just say ship lips are a little round it that get it pressure you know difference between can you right come back to me please.

The difference between you you said it right, you know what I am I am I want it more mechanical language in a in a more technicality too it, difference between the sound sss and the sound shhhhh is the following in the former you have less air, less tension on the tongue and tongue is almost in the neutral position. You say, sss where as in the production of shhh tongue is rolled backwards; lips are slightly rounded and there is greater pressure on the blade of the tongue, you say shh right.

Look at something else this, try say this word vet and this is wet, what is the articulated difference please write and tell me 30 seconds first write. Make sure, what happens in one which does not happening in the other, it is like your it is like a apparatus. You are describing some mechanism please write, how is now tell me, what is happening here? Can you stand up, so that camera can catch you yes.

(()) wet the lips are rounded and initially there is a larger throughout of air and then, (())).

Rohan

Vet upper teeth touch the lower lips, so it is like (()) and wet the lips are rounded. So, in vet flow of air is more.

(())

(())

what happens here in this case lips comes close to the upper teeth, but do not do not bite it, it is not a chocolate, air comes close to and then, you know you blow voiced here then, friction here you know the vibration here. So, you say vvv say it.

vvv

In this case, lips are completely rounded like going to say vv round just round you say va. In this case, lips are flat, in this case lips are rounded, in this case lips comes close to the lower lip comes close the upper teeth, in this case teeth has no participation. The point I am making is, if you know about how speech sounds are produced, then you are able to do them produce the sound better. Tomorrow, I will take up some non standard English sounds that we use in India and how we can get their pronunciation right. Do you have any questions, thank you have a good day.