**Phonetics and Phonology : Lesson 3**

**Vowels and consonants**

The words **vowel** and **consonant** are very familiar ones, but when we study the sounds of speech scientifically , we find that it is not easy to define exactly what they mean .The most common view is that vowels are sounds in which there is no obstruction to the flow of air as it passes from the larynx to the lips. But if we make a sound like /s/ and /d/ , it can be clearly felt that we are making it difficult or impossible for the air to pass through the mouth. Accordingly , most people would have no doubt that sounds like / s / or / d / should be called consonants .

However, there are many cases where the decision is not so easy to make. One problem is that some English sounds that we think of as consonants, such as the sounds / h / and / w / at the beginning of the words ''**h**ay'' and ''**w**ay'', do not really obstruct the flow of air more than some vowels do.

It is possible to establish two distinct group sounds (vowels and consonants) in another way.

When we study the different contexts and positions in which particular sounds can occur; this is called the study of the **distribution** of the sounds, and is of great importance in phonology. Study of the sounds found at the beginning and end of English words has shown that two groups of sounds with quite different patterns of distribution can be identified, and these two groups are those of **vowel and consonant**.

If we look at the vowel-consonant distinction in this way , we can say that the most important difference between vowel and consonant is not the way that they are made, but their different **distributions**. It is important to remember that the distribution of vowels and consonants is different for each language.

First , we will focus on vowel sounds . We need to know in what ways vowels differ from each other.

The first matter to consider is the shape and position of the tongue. It is usual to simplify the very complex possibilities by describing just two things:

1. **The vertical distance ( or height )** between the upper surface of the tongue and the palate . If the tongue is held up or raised close to the roof of the mouth , the sound is called **close** vowel , as the / i: / in the word **see .**  But when the distance is much greater , as in the vowel / a / in **cat** , we call the / a / as an **open** vowel .
2. **The part of the tongue** (front and back**)** which is raised highest . A vowel in which the back of the tongue is the highest point is called a **back vowel** , whereas a vowel in which the front of the tongue is the highest point is called a **front vowel** .

|  |  |  |
| --- | --- | --- |
|  | **Front** | **Back** |
| **Close** | **/ i: /** | **/ u: /** |
| **Open** | **/** æ **/** | **/ a: /** |

The difference between / i: / and / æ / is a difference of tongue height, and we would describe / i: / as a relatively close vowel and / æ / as a relatively open vowel. Tongue height can be changed by moving the tongue up or down, or moving the lower jaw up or down.

In making the two vowels described above, it is the front part of the tongue that is raised. We could therefore describe / i: / and / æ / as comparatively **front** vowels . Changing the shape of the tongue we can produce vowels in which a different part of the tongue is the highest point. A vowel in which the back of the tongue is the highest point is called a **back vowel**.

If you make the vowel in the word **''calm''** which we write phonetically as / **a:** / you can see that the back of the tongue is raised. The vowel in **too** / u: / is also a comparatively back vowel .

**3-Lip-position**. Although the lips can have many different shapes and positions, we will consider only three possibilities.These are:

**Rounded**, where the corners of the lips are brought towards each other and the lips pushed forwards. This is most clearly seen in cardinal vowel / u /.

**Spread**, with the corners of the lips moved away from each other, as for a smile. This is most clearly seen in cardinal vowel no. 1 / i /.

**Neutral**, where the lips are not noticeably rounded or spread. The noise most English people make when they are hesitating (written 'er) has neutral lip position.

**English short vowels**

English has a large number of vowel sounds; the first ones to be examined are short vowels . Short vowels are only relatively short , they can have quite different lengths in different contexts.

1. / i / (example words: 'bit; 'pin, 'fish') it is more open nearer in to the centre. The lips are slightly spread.
2. / e / (example words: 'bet, 'men, 'yes') This is a front vowel. The lips are slightly spread.
3. / æ / (example words: 'bat, 'man , 'gas') This vowel is front. The lips are slightly spread.
4. / ^ / (example words: 'cut, come, 'rush') This is a central vowel. The lip position is neutral.
5. / o / (example words: 'pot, 'gone 'cross') This vowel is not quite fully back . The lips are slightly rounded.
6. / u / (example words: 'put , pull , 'push') . The lips are rounded