

## Assimilation in English and the Problems Of Teaching and Learning it in Iraq

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### 1- Introduction :

In many languages it often occurs that in connected and rapid speech certain words change their phonetic shapes due to the effect of adjacent sounds on each other. This is referred to as **assimilation**, a process in which a certain sound is made similar to some extent to a neighboring one by taking on a feature (s) of that sound.

Assimilation may occur within words or at word boundaries. It may also occur within morphemes or at morpheme boundaries.

There are many instances of assimilation in which one may find a consonant taking on features of a vowel, a vowel taking on features of a consonant, a consonant influencing another consonant, or a vowel affecting another vowel (schane, 1973 : 49).

Since assimilation is a natural phenomenon in connected and rapid speech, it can be explained in terms of coarticulation in that the organs of speech need to glide smoothly and rapidly from the position of one sound to another in order to achieve **ease of articulation**, which consequently leads neighbouring sounds to be as similar as possible. This means that the possibility of assimilation increases in rapid speech and decreases in slow speech.

This study attempts at shedding some light on the process of consonant assimilation, its classification and description, with reference to the difficulties arise in teaching and learning it in Iraq.

### 2- Phonemic Vs. Allophonic Assimilation :

In the process of assimilation when two adjacent consonants affect each other, one of them is made similar to the other by means of substituting it by a third consonant that shares some features with the two consonants being assimilated. Hence, two types of assimilation can be distinguished; **phonemic** and **allophonic assimilation**. In the word bank / bank / the consonant / k /, which is velar, stop, voiceless, affects the consonant / n /, which is alveolar, nasal, voiced, and changes it into / ŋ /, which shares some features with the two consonants / k / and / n /, so the assimilated form of this word is / baŋk /.

This is an instance of phonemic assimilation, since the phoneme / n / is substituted by another phoneme, / ŋ /.

But in the word "tenth" / tenθ / the dental consonant / θ / affects the alveolar consonant / n / and changes it into the dental consonant [ n̠ ], so the assimilated form is [ ten̠ θ ]. This is an instance of allophonic assimilation because the phoneme / n / is substituted by [ n̠ ], which is not a phoneme, but another form (allophone) of the same phoneme.

Similarly, in the word "triumph" / traɪəmf / the labiodental consonant / f / affects the bilabial allophone [ m̠ ] of the phoneme / m / and changes it into [ m̠ ], the labiodental allophone of that phoneme, so the assimilated form is [ traɪəmf ].

Thus, in phonemic assimilation one phoneme is replaced by another phoneme, while in allophonic assimilation one allophone of a phoneme is replaced by another allophone of that phoneme.

As for phonemic assimilation, one consonant may affect the place of articulation, the manner of articulation, or the voicing of the other consonant. This is made a basis for the choice of the third consonant that replaces the original one in the assimilated form. The following are some instances of phonemic assimilation in which different features of consonants are assimilated:

- 1- that boy / θæt boi / → / θap boi /  
the bilabial consonant / b / affects the place of articulation of the alveolar consonant / t / and changes it into the bilabial consonant / p /.
- 2- Which side / wɪʃ saɪd / → wɪʃ saɪd /  
the fricative consonant / s / affects the manner of articulation of affricate consonant / tʃ / and changes it into the fricative consonant / ʃ /.
- 3- Five pence / faɪv pens / → / faɪf pens /  
the voiceless consonant / p / affects the voicing of the voiced consonant / v / and changes it into the voiceless consonant / f /.

However, there are some cases of assimilation in which one consonant is made exactly like the other one, e.g. one more

/ wʌn moː / → / wʌm moː /.

In this example / m / affects / n / and changes it into / m /.

### 3- Description of Assimilation:

Since there are different types of consonant assimilation it is necessary to classify and describe each type. Assimilation can be described according to three variables:

#### 3.1 Direction of Assimilation:

The first feature that is used to describe consonant assimilation is the direction of assimilation, which can be classified into three types:

- a. **progressive** : when the first consonant affects the second one and changes it into another consonant.

e.g. open / əʊpən / → / əʊpən /

/ p / affects / n / and changes it into / m /.

**b. regressive :** when the second consonant affects the first one and changes it into another consonant .

e.g. bank / bank /  $\longleftarrow$  bajk /  
/ k / affects / n / and changes it into / ŋ / .

**c. reciprocal ( coalescent ) :** when both consonants affect each other and are changed into another consonant .

e.g. sugar / sjuɡə /  $\longleftrightarrow$  / ʃuɡə /  
/ s / and / j / affect each other and become / ʃ / .

### 3.2 Degree of Assimilation :

The degree or the extent to which one consonant affects another differs according to the types and features of the adjacent consonants. Hence , two degrees of assimilation can be distinguished :

**a. complete :** when the assimilated consonant becomes exactly like the other one .

e.g. ten minutes / ten minits /  $\longrightarrow$  / tem minits /  
/ m / completely affects / n / and changes it into / m / .

**b. partial :** when the assimilated consonant is not made exactly like the other one , but is replaced by a third consonant which has some similarities with both consonants ( either in place of articulation , manner of articulation , or voicing ) .

e.g. think / θɪnk /  $\longrightarrow$  / θɪŋk /  
/ k / affects / n / partially and changes it into / ŋ / which is similar to / k / in place of articulation , and similar to / n / in manner of articulation and voicing .

### 3.2 Cause of Assimilation :

The main cause of assimilation is rapid and connected speech ; therefore , many words can be pronounced in two ways , i.e. in the **assimilated** and the **unassimilated** forms , according to the speed in which they are pronounced . However , there are some words that are understood only in their assimilated , but not their unassimilated forms .

Thus , two causes of assimilation can be recognized :

**a. Accidental :** in normal speech a word is pronounced in its unassimilated form , but in rapid speech it is pronounced in the assimilated form . In both forms the word can be understood easily .

e.g. good morning / gud mo:nɪŋ /  $\longrightarrow$  / gub mo:nɪŋ /

This phrase is understood easily when pronounced in the assimilated or the unassimilated form, because it is known that the assimilated form is used as a result of rapid speech .

**b. Historical :** in some words assimilation has taken place in the past and has become part of these words , so that the words have been

pronounced in the assimilated forms in normal and rapid speech ; this makes it difficult to understand such words when pronounced in their unassimilated forms .

e.g. soldier / sʊldʒə / → / sʊldʒə / .

This word is often pronounced and realized as / sʊldʒə / ( the assimilated form ), so when the unassimilated form is used , it may not be easily understood .

4- **Predicting the Type of Assimilation :**

As mentioned above , the process of assimilation may occur in various direction and degrees , and may have different causes ; therefore , it is necessary to know how to decide and predict the type of assimilation that is likely to occur in different instances .

**4.1 Direction : Progressive , Regressive , Reciprocal**

The direction in which assimilation takes place differs according to the types of sounds that are involved in the process of assimilation .

**Regressive assimilation** is the most frequent direction that is found in many instances ; it may exhibit assimilation of place of articulation ( especially when the alveolar consonants / t , d , n / are followed by nonalveolar ones ) , manner of articulation ( when a stop or an affricate consonant is followed by a fricative or a nasal one ) , or voicing ( when a voiced consonants is followed by a voiceless one ) .

**Progressive assimilation** is less likely to be found . It may exhibit assimilation of place of articulation ( when the consonant / n / is preceded by a bilabial or a velar stop consonant ) , or voicing ( when the suffix { -s } is preceded by a voiced or a voiceless consonant ) .

**Reciprocal ( coalescent ) assimilation** is found in cases where the two consonants are assimilated ( or merged ) into one consonant , as when / s , z , t , d / are followed by / j / and become / ʃ , ʒ , tʃ , dʒ / respectively . These can be summarized in the following rules :

Reciprocal	Progressive	Regressive
1) assimilation of place: / s / + / j / = / ʃ / / z / + / j / = / ʒ / / t / + / j / = / tʃ / / d / + / j / = / dʒ /	1) assimilation of place: bilabial / p / } + / n / = / m / stop / b / } velar / k / } + / n / = / ŋ / stop / g / }	1) assimilation of place: alveolar + non -alveolar { bilabial palato-alveolar velar }
	2) assimilation of voicing: voiceless + { -s } = / s / voiced + { -s } = / z /	2) assimilation of manner: { stop } + { fricative } { affricate } + { nasal }
		3) assimilation of voicing: voiced + voiceless

#### 4.2 Degree : Complete , Partial

The degree of assimilation is determined by the number of similar features between the two consonants involved in the process of assimilation .

In any assimilated form there should be at least one common feature between the two consonants .

In other words , assimilation means changing one feature of a consonant and making it similar to its counterpart in the other consonant . Thus , the two consonants that have no feature in common , will have one similar feature in their assimilated form . Sometimes the two consonants are originally similar in one of their features , so that after assimilation their similarity will increase to include another feature . In the two cases above the result of assimilation will be a third consonant , that shares one or two features with the two consonants in question , and will substitute one of them in the assimilated form . These are instances of partial assimilation because none of the two consonants is made exactly like the other one . On the other hand , when the two consonants originally have two common features , they will have the third feature assimilated , and they will be exactly the same in the assimilated form , so that the assimilation will be complete .

#### 4.3 Cause : accidental , historical

Since assimilation is characteristic of rapid , casual speech , it is normally not found in slow , careful speech . Thus , words may have two forms of pronunciation according to the speed in which they are spoken : assimilated and unassimilated (normal) form . If these two forms of pronunciation are used in free variation without making any vagueness of meaning or difficulty of understanding , the cause of assimilation is said to be **accidental** (i.e. resulting from rapid speech). But if the assimilated form is the only one used in both rapid and slow speech , and the unassimilated form is not normally used , because it causes difficulty of understanding a word or even vagueness of its meaning , the assimilation is said to be **historical** , as it has become part of the word and its meaning . This type of assimilation has also occurred in the past due to rapid speech , but what makes it different from accidental assimilation is that the assimilated form has been part of the historical development of a word , so that the word cannot be pronounced without it , because it has become fixed in its pronunciation .

5- Analysis of Assimilation :

Having decided the direction , the degree , and the cause of assimilation according to the rules given above , and in order to make sure that the resulting pronunciation of a word (s) is the appropriate assimilated form , one cannot rely only on his intuition or his own pronunciation , but he should analyse the two consonants involved into their features (place of articulation , manner of articulation , and voicing) and try to assimilate these features one by one until he arrives at the appropriate form , that is the most acceptable one . In the process of assimilation the first feature to be assimilated is the place of articulation , but if it does not give the appropriate form , the other feature that is assimilated is voicing , and if it does not give an acceptable form , the last feature to be assimilated is manner of articulation . In the following some instances of assimilation are analysed and described :

1) ten minutes	/ n /	/ m /
←	<b>alveolar</b>	bilabial
/ ten minits /	nasal	nasal
/ ten minits /	voiced	voiced

regressive , complete , accidental  
Assimilation of place of articulation

2) bad care	/ d /	/ k /
←	<b>alveolar</b>	velar
/ bad ke ə /	stop	stop
/ bag ke ə /	voiced	voiceless

regressive , partial , accidental  
Assimilation of place of articulation

3) That side	/ t /	/ s /
←	alveolar	alveolar
/ ʒ at said /	<b>stop</b>	fricative
/ ʒ as said /	voiceless	voiceless

regressive , complete , accidental  
Assimilation of manner of articulation .

4) Which section	/ tʃ /	/ s /
←	palato-alveolar	alveolar
/ wɪtʃ sekʃ n /	<b>affricate</b>	fricative
/ wɪʃ sekʃ n /	voiceless	voiceless

regressive , partial , accidental  
Assimilation of manner of articulation .

5) have to	/ v /	/ t /
←	labiodental	alveolar
/ hav tu /	fricative	stop
/ haf tu /	<b>voiced</b>	voiceless

regressive , partial , accidental

In this example we have assimilation of voicing , because the assimilation of place articulation doesn't give an acceptable pronunciation of the word.

6) happen	/ p /	/ n /
→	bilabial	<b>alveolar</b>
/ hap n /	stop	nasal
/ hap m /	voiceless	voiced

progressive , partial , accidental

Assimilation of place of articulation .

7) second	/ k /	/ n /
→	velar	<b>alveolar</b>
/ seknd /	stop	nasal
/ seknd /	voiceless	voiced

progressive , partial , accidental

Assimilation of place of articulation .

8) bags	/ g /	/ s /
→	velar	alveolar
/ bags /	stop	fricative
/ bagz /	voiced	<b>voiceless</b>

progressive , partial , historical

Assimilation of voicing

9) sure	/ s /	/ j /
↔	alveolar	<b>palatal</b>
/ sju ə /	fricative	glide
/ su ə /	voiceless	voiced

reciprocal , complete , historical

Here we have assimilation of place of articulation , but since the direction of assimilation is reciprocal , the place of articulation of the resulting consonant will be both palatal and alveolar , i. e. palato - alveolar . The other two features are of / s / , because the features of / j / do not give an acceptable sound . This is also true in the following example :

10) education	* / d /	/ j /
	<b>alveolar</b>	<b>palatal</b>
↗	stop	glide
/ edjukei ʃ n /	voiced	voiced
/ edʒ ukei ʃ n /		

reciprocal , complete , historical  
 Assimilation of place of articulation .

6- ***Problems Faced by Iraqi Learners of English :***

Since assimilation is characteristic of connected and rapid speech , one cannot expect learners to master the English language fully and to speak it fluently and rapidly as good as its native speakers . In fact , assimilation is one of the topics that need to be taught in a practical way in order to make learners recognize and understand easily what is going on in this process. But unfortunately this topic , like others , is being taught to learners as any other theoretical topic , which inevitably leads students to memorize its rules with some examples without real understanding of what is meant by **assimilation** or why it is used in rapid speech . In order to facilitate understanding assimilation , learners are often asked to relate rules of assimilation in English to those that they have studied in Arabic at school . But this is also of little use , since assimilation in Arabic has not been widely taught at schools until the last few years , so that students may not have enough knowledge about it .

7- ***Conclusions and Recommendations :***

Through this study the process of assimilation has been highlighted , and consequently a number of points and remarks have been arrived at . These can be summarized in the following :

- 1) sometimes assimilation extends to include more than one feature , i. e. more than one feature can be assimilated between two consonants , especially in more rapid speech , yet in this study assimilation of only one feature is expressed .
- 2) Adjacent phonemes may affect each other and result in assimilating one of them into another . The resulting sound may be a different phoneme or another allophone the same phoneme . This is dealt with in two types of assimilation : **phonemic** and **allophonic** . Since allophonic assimilation is not concerned with in this study , only phonemic assimilation is illustrated .
- 3) Assimilation is an aspect of connected speech and is based on the notion **'ease of articulation'** , so that the person himself can assimilate

\* The resulting consonant / dʒ / is considered ' stop ' , not ' affricate ' ; this is acceptable because an affricate consonant is a special type of stop consonants . (O'connor, 1984 : 46-7)

certain sounds into others that make the pronunciation of a word (s) easier and faster . However , there are some rules according to which one , whose pronunciation is not accurate , can make sure that the assimilated form he has pronounced is correct , or even choose the appropriate form of assimilation for a certain word (s) .

- 4) Iraqi learners of English face some difficulty in applying assimilation to their speech , which results from their inaccurate pronunciation of English words , especially in connected speech , which is due to lack of practice and communication with English speakers . Moreover , Iraqi learners of English have little practice and little knowledge about assimilation in Arabic , a case which prevents them from connecting and relating rules of assimilation in Arabic to those in English , which would otherwise facilitate learning English assimilation to a great extent .

In order to reduce this difficulty , a number of recommendations and suggestions can be stated :

- 1- Increasing the amount of teaching and practising assimilation in Arabic connected speech at schools , because this will make it easier for students to learn assimilation in English , as it is similar to a great extent to that in Arabic .
- 2- Modifying the teaching strategies at colleges , and dedicating enough time for free conversation and communication in English as well as listening to and imitating foreign models so as to improve the pronunciation of learners . Then giving them the rules of assimilation gradually , applying them to many English instances and relating them to Arabic instances . Consequently , this will make learners rely on their intuition or their own pronunciation of assimilated forms , rather than using and memorizing rules for that .

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