CHAPTER X

COMPARISON: SUPRA-SEGMENTALS OF BENGALI AND ORIYA

Languages differ not only in the number, type and distribution of the segmental phonemes but also with regard to supra-segmental features of speech which specify each language both phonetically and phonemically. This chapter discusses the major supra-segmental features like stress, intonation, juncture, nasalization and length or duration of sounds of both the languages on the basis of which comparison is made.

10.1 STRESS PATTERN IN BENGALI AND ORIYA

As described by Jones (1979, p.245) the term 'stress' is 'the degree of force with which a sound or syllable is uttered'. Therefore, it is the stress which gives prominence to particular
words in phrases or sentences and to particular syllables in words. From the functional point of view stress pattern can be discussed on two levels: the word level and the sentence level. Words in isolation in both Bengali and Oriya have at least one stressed syllable. But all the words in a sentence in both the languages are not stressed. Therefore, word-stress and sentence-stress of both the languages are discussed below separately.

10.1.1 WORD-STRESS IN BENGALI AND ORIYA

Word-stress indicates the particular syllable or syllables of words occurring in isolation with greater breathforce. For the practical purposes, only three types of word-stress, depending upon the degree of force, are preferred in both the languages. They are: (a) primary or strong stress which is marked by a raised vertical mark /`\/, (b) secondary or medium stress which is marked by a lowered vertical mark /\/, and (c) weak stress which is unmarked. In both Bengali and Oriya, primary stress occurs in the initial syllable of a word in isolation whereas secondary stress occurs in the initial syllable of the last part of a compound word. Stresses are weak when they occur after primary and secondary stresses.

In Bengali and Oriya, word-stress does not play a predominant role phonemically. Though there are three different types of word stress in both the languages, shifting of any
word-stress from one syllable to another in the same word does not create a contrast in the meaning of the word.*

Therefore, word-stress in Bengali and Oriya is not considered as phonemic. Still Bengali and Oriya words are stressed in isolation. Bengali words are stressed dominantly on initial syllable. In this regard Chatterji (1986) says, that stress is dominantly initial in isolated words. On the other hand, word-stress in Oriya occurs either on the first or the second syllable. Majumdar (1970) has observed that in Oriya, the stress always vacillates between first and second syllable. In both Bengali and Oriya, monosyllabic words, having only syllable, are always stressed e.g.:

Bengali - /*ma/'mother', */aek/'one', /*bon/'sister'
Oriya - /*tu/'you', /*an/'(you) bring', /*dekh/'(you) see'.

Word-stress in both the languages for the words having more than one syllable, do not follow the same pattern because words in Bengali are always initially stressed. But word-stress in Oriya, is, in fact, conditioned by the syllabic structure of the word. Therefore, word-stress in both the languages, is discussed according to syllabic structure of the word.

*However, Chatterji (1921) has cited the only example to show that change of word-stress may result in change of meaning in Bengali, e.g., /*tul/'a proper name', /*tul/ 'incomparable'. It may be noted that such an example is maintained only in sophisticated speech.
Disyllabic words of Bengali are always initially stressed.

- e.g., /ˈmala/ˈgarland′, /ˈsikkhal/ˈteacher′, /ˈchattro/
  'student′, /ˈəmən/ˈsuchl. On the other hand, in disyllabic
words of Oriya if both the syllables are open syllables of which
the second syllable does not have the vowel /a/, the stress
falls on the initial syllable. e.g., /ˈek/ˈone′, /ˈbhok/ˈhunger′. But in disyllabic words if both the syllables are open
syllables of which the second syllable only has the vowel /a/,
the stress falls on the second syllable. e.g., /ˈda/ˈginger′,
/ˈrɒj/ˈking′. The stress falls on the first syllable of a
disyllabic word if it consists of two open syllables having
the vowel /a/ in both. e.g., /ˈbhasa/ˈlanguage′. Disyllabic
words of Oriya are also initially stressed if the first
syllable is either a closed one or ends with a diphthong or
both the syllables are closed. e.g., /ˈbank/ˈmathematics′,
/ˈbasma/ˈgood smell′, /ˈĩTha/ˈoffal′, /ˈpīsa/ˈpaise′,
/ˈpɔnjab/ˈpunjab′.

Tri-syllabic words of Bengali are also initially stressed.

- e.g., /ˈandolon/ˈmovement′, /ˈɔcena/ˈunknown′. In Oriya,
on the other hand, tri-syllabic words are also initially
stressed if the initial syllable is a closed one or ends
with a diphthong or the subsequent syllables do not have
the vowel /a/. e.g., /ˈpɔnjab/ˈpeople of Punjab′,
/ˈbɔjkunTho/ˈheaven′, /ˈgɔrmɔ/ˈhot′, /ˈThakur/ˈGod′. In
tri-syllabic words of Oriya, the stress falls on the second
syllable if the second syllable is a closed one or it has
the vowel /a/ or a diphthong. e.g. /cu1 cunda/'a mole', /ho1 jara/one thousand', /khu1 alba/to feed'.

Words of more than three syllables are not very frequent in both Bengali and Oriya. The words of more than three syllables which are commonly used in both these languages, are either the derivational or the compound words. These words, generally, have two stresses. The stress which occurs initially on the first part of the word is primary or strong stress and the stress which occurs initially of the second part of the word is secondary or medium stress. e.g.

Bengali - /'mara, mari/fighting', /television/bhaja/fry in oil'.
Oriya - /ho1 Na, hoNia slaughtering', /phulog chho/a flower plant'. It may be worth mentioning that when both the stresses occur in polysyllabic or compound words, they occur according to the syllabic structures of the respective language. As the stress on the second part of the polysyllabic or compound words is always weaker, therefore, it is considered as secondary or medium stress.

10.1.2 SENTENCE-STRESS IN BENGALI AND ORIYA

Sentence-stress predominates over word-stress. With reference to Bengali, Chatterji (1986, p.22) said, 'word-stress is always subsidiary to sentence-stress.' Sentence stress in both Bengali and Oriya is syntactically significant. It has the capacity to change the meaning of the whole sentence.
In both Bengali and Oriya all the words of a sentence are not stressed. The stress of the words in a sentence depends on the importance of the words. In both these languages stress, generally, falls on the first important word of the sentence. It may be noted that if a sentence of both the languages begins with a word of less importance then the stress does not fall on it.* In Bengali and Oriya, however, it is observed that the nouns, pronouns, adjectives and verbs are normally considered to be important words. But when an adjective precedes its noun, the adjective is stressed and the noun loses it. Similarly, in compound verbs, the principal verbs are stressed and not the auxiliaries. In order to indicate sentence-stress, two raised vertical marks /'V are used before the word that is stressed.

Both Bengali and Oriya, generally, have stress in the beginning of a sentence if the sentence is a simple statement. For example, 

Bengali - /'V bangla amar matribre/sa/Bengali is my mother-tongue/'

Oriya - /'V ODIa moro matrubhasa/Oriya is my mother-tongue/.

But there are other sentences in both the languages in which the speaker desires to attach special importance to a 

*Chatterji (1986, p. 23) with reference to Bengali, says 'Pronominal words, conjunctions and other particles, as a rule, are not stressed even when they begin a sense-group'.


particular word by giving special emphasis and thus the word is stressed. The emphatic stress in Bengali and Oriya are of two types: contrast stress and emotional stress.

In contrast stress of Bengali and Oriya, emphasis is given on a particular word to show its contrast with the other. For example:

Bengali - /'se amar bhai/'He is my brother'.
Oriya - /'se moro bhai/'He is my brother'.

The above two sentences express that he only and not anybody else is my brother. But if the stress is shifted, meaning is changed. For example,

Bengali - /'se amar bhai/'He is my brother'.
Oriya - /'se moro bhai/'He is my brother'.

These two sentences say that he is the brother of nobody else but mine.

Emotional stress of Bengali and Oriya is used to express different shades of emotion. For example,

Bengali - /'apni asun/'You come'.
but, /'apni asun/'You may go now (with anger)'.
Oriya - /'tu ja/'You go'.
but, /'tu ja/'You go (with anger)'.

All the examples cited above show the shifting of stress in a sentence resulting a change of meaning. It is the sentence-stress which controls the meaning of the sentence in both Bengali and Oriya. The sentence-stress, therefore, in both
the languages is phonemically significant. Finally, it may be said that both Bengali and Oriya bear the same sentence stress patterns and there is no significant difference between them.

10.2 INTONATION IN BENGALI AND ORIYA

Jones (1979, p. 275) defines intonation as variations which take place in the pitch of the voice in connected speech, i.e., the variations in the pitch of musical note produced by the vibration of the vocal cords. Such a modulation in pitch occurs in Bengali and Oriya as in all other languages. Both in Bengali and Oriya intonation is phonemic which involves pitch levels and terminal contours. Both these languages have four pitch levels: /1, 2, 3/ and /4/, /1/ being the lowest and /4/ being the highest. Following are the examples cited from both the languages to establish the contrast between some of the pitch levels:

**Bengali**

<table>
<thead>
<tr>
<th>Pitch Level</th>
<th>Bengali Word</th>
<th>Bengali Meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>/apni bagla janen/</td>
<td>&quot;You know Bengali.&quot;</td>
</tr>
<tr>
<td>2 1</td>
<td>/apni bagla janen/</td>
<td>&quot;do you know Bengali?&quot;</td>
</tr>
</tbody>
</table>

**Oriya**

<table>
<thead>
<tr>
<th>Pitch Level</th>
<th>Oriya Word</th>
<th>Oriya Meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>/subasa micho ko he/</td>
<td>&quot;Subas tells lie.&quot;</td>
</tr>
<tr>
<td>2 1</td>
<td>/subasa micho ko he/</td>
<td>&quot;Does Subas tell lie?&quot;</td>
</tr>
</tbody>
</table>
Bengali and Oriya have three terminal contours: rise /\(^{+}\)/, fall /\(^{-}\)/, and level /\(^{=}\)/. Following examples are cited from both the languages to establish the contrast between the contours:

**Bengali**

/ se badi jacche /\(^{-}\)/ 'He is going home' (Statement)
/ se badi jacche /\(^{+}\)/ 'Is he going home ?' (Question)
/ se badi jacche /\(^{=}\)/ 'He is going home !' (Surprise)

**Oriya**

/ ramese puri gala /\(^{-}\)/ 'Ramesh went to Puri' (Statement)
/ ramese puri gala /\(^{+}\)/ 'Did Ramesh go to Puri ?' (Question)
/ ramese puri gala /\(^{=}\)/ 'Ramesh went to Puri !' (Suspicion)

So, it is the intonation which makes it easier to understand the mood of the speaker and what exactly he intends to convey. It may be noted that in both Bengali and Oriya four intonation patterns are available. These four intonation patterns are presented below:

(a) Intonation pattern for a statement sentence is high falling. e.g.,

**Bengali**

/ amar badi bapor pure /\(^{-}\)/ 'My house is at Barrackpore'.

**Oriya**

/ se jone lekhako /\(^{-}\)/ 'He is a writer'.

(b) Interrogative sentence for yes-no answer has low rising pattern. e.g.,

**Bengali**

/ ei boita ki amnar /\(^{+}\)/ 'Is this book yours ?'
Oriya
/apaNa koo Na boDi pDechanti ↑ /'Are you reading a book?'

c) Interrogative sentence for specific answer has high falling pattern. e.g.,

Bengali
/se kakhon badi phirlo↓ /'When did he return home?'

Oriya
/apaNa kemiti ccchanti↓ /'How are you?'

d) Intonation pattern is level all along the sentence expressing exclamation, hesitation and suspicion. e.g.,

Bengali
/tomake dekhe bhari khuli holam↓ /'How nice to see you!'

Oriya
/phonTo keDe sundo↓ /'How beautiful is the flower!'

Finally it may be said that formally both Bengali and Oriya have four pitch levels and three terminal contours as phonemes. Functionally both these languages have similar intonation patterns.

10.3 JUNCTURE IN BENGALI AND ORIYA

Juncture is related to 'the way in which phonemes follow each other or are 'joined' in the stream of speech' (Hall Robert A (Jr.), 1969, p.111). In Bengali and Oriya two types of juncture are observed which are termed as open juncture
and close juncture. These two types of juncture are phonemically significant in both the languages, as they can present a contrast resulting a change in meaning.

10.3.1 OPEN JUNCTURE IN BENGALI AND ORIYA

In both Bengali and Oriya, open juncture is considered as an external juncture or word juncture. It is characterised by the non-occurrence of sandhi and the pause between the two consecutively spoken words. So, it is the pause which intervenes between the two spoken words without making them into a compound form. Open juncture, in both the languages is marked with /-/. Examples of open juncture from both Bengali and Oriya are presented below:

**Bengali**

/pa-nama/ (you) put down the leg

/ca-i/ "tea only"

**Oriya**

/ca-puDa/ "tea packet"

/kaLi-a/ "kaLi, (you) come"

10.3.2 CLOSE JUNCTURE IN BENGALI AND ORIYA

When two consecutive words are combined, a close juncture takes place. In other words, it is a close juncture which occurs between words when they are combined or joined.
combining the words, no pause, unlike an open juncture, occurs in between them. A close juncture is characterised by a quick transition and as a result, it reduces two words into a compound form. A close juncture, in both Bengali and Oriya, is marked with /+/. Examples of close juncture from both the languages, are presented below:

**Bengali**

/ cun + kali / > / cunkali /"disgrace"
/ bhag+ne / > / bhagne /"nephew"

**Oriya**

/ ka + haro / > / kahr+o /"whose"
/ peTua + a / > / peTu+a /"pot bellied man"

### 10.3.3 CONTRASTS OF OPEN AND CLOSE JUNCTURES

Both Bengali and Oriya show contrasts of open and close junctures resulting in a change of meaning and this proving that juncture is phonemic. The minimal pairs are presented below for both the languages.

**Bengali**

/ bon-na /"sister not" / jama-i /"shirt only"
/ bon+na /"flood" / jama+i /"son-in-law"

**Oriya**

/ ja-buDi /"(you)sink" / baLO+kaTi/"to cut hair"
/ ja+buDi /"to embrace" / baLO + kaTi/"a place name"
However, it can finally be said that both in Bengali and Oriya juncture marks the word-boundary in a sentence and its distribution is quite similar.

10.4 NASALIZATION IN BENGALI AND ORIYA

Nasalization both in Bengali and Oriya is a suprasegmental feature. It always occurs with the vowels. From the phonetic point of view while producing any vowel sound if the air is allowed to pass through both oral and nasal passages, the vowel sound is nasalized. In both Bengali and Oriya all the vowels can be nasalized. Nasalization is phonemic in both these languages as nasalized vowels show contrasts with oral vowels (as has already been discussed in Secs. 3.3 and 4.3). Besides, the contrast, in Oriya, is valid even after a nasal consonant. For example - /nɔ/ /nine/; /nɔ/ /you bend/. This kind of contrast is not available in Bengali. This is considered as a significant point of difference between Bengali and Oriya. However, it may be mentioned that slight nasalization of vowels in Bengali as well as in Oriya seems to take place in some cases by the associative influence of nasal consonants. For example - Bengali - /ma/ > /mɑ/ 'mother'; Oriya - /mɪnɑ/ > /mɪnɑ/ 'sweet'. In most of the cases native ears are not trained to detect this kind of nasalization. This kind of nasalization in both the languages is treated as incidental as suggested by Jones (1979, p. 99).
Another significant difference is that in a vowel combination nasalisation takes place with the first component in Bengali whereas in Oriya it takes place with the second component of the combination. For example - Bengali - /khāi/ 'demand', but Oriya - /paĩ/ 'for' (see also Sec. 5.3.2).

10.5 DURATION OR LENGTH OF A SOUND IN BENGALI AND ORIYA

Duration or length of a sound in Bengali as well as in Oriya is also considered as a supra segmental feature as it does not occur in isolation. It occurs always either with a vowel or with a consonant in both the languages.

It has earlier been discussed that the vowel length in Bengali and Oriya is not phonemic (see Sec. 5.3.1). Duration or length of a consonant, in Bengali and Oriya is not considered as phonemic. Length of a consonant, in these two languages, is observed only in geminate consonants. Geminate consonants are also considered, in both the languages, as double consonants (see Secs. 6.5 and 7.5). In this regard Refiquil Islam (1977, p. 29) comments, 'in pronouncing the double consonant amount of time taken is twice that of a single consonant.' Although the double consonants or geminate consonants, in both the languages, present contrasts with single consonants, they do not form minimal pairs, because the geminate consonants are distributed in such a way in the words that the first one closes that syllable and the second one begins the next syllable.